

行政院及所屬各機關出國報告

(出國類別：其它－國際會議)

出席「亞太國際學術網路年會
APRICOT 2004 會議」報告

服務機關：教育部（電算中心）

出國人職稱：資料管理師

姓名：李長樹

出國地點：馬來西亞吉隆坡

出國期間：93年2月22日至27日

報告日期：93年5月20日

18 / 09301818

系統識別號：C09301818
行政院及所屬各機關出國報告提要
頁數：32
含附件：是

報告名稱：亞太國際學術網路二〇〇四年年會（APRICOT 2004 Conference）
主辦機關：教育部
聯絡人／電話：馬淑珍／23565907
出國人員／電話：李長樹 教育部 電算中心 資料管理師 / 27377010#297
出國類別：其它
出國地點：馬來西亞
出國期間：民國 93 年 2 月 22 日 - 民國 93 年 2 月 27 日
報告日期：民國 93 年 5 月 20 日
分類號／目：I8／資訊科學
關鍵詞：APRICOT2004

內容摘要：

APRICOT 會議的全稱是 Asia-Pacific Region Internet Conference of Technology，它是亞太區域最主要的網際網路年會，每年定期在亞太地區各國輪流舉行，此一會議不僅提供亞太區域各國網際網路社群交流的平台；也邀請世界各國網際網路發展的先驅到場分享他們寶貴的經驗，並且讓世界各國人士依據不同角度來提供亞太地區網路發展與合作的建議；同時討論過去一年重要的議題並介紹未來一年新興的技術及應用。今年的 APRICOT 會議包含了 APNIC、APCERT Security、MINC International Domain Names、VoIP、Internet Routing & Operations、IPv6、Asia Pacific Peering 及 APCAUCE Anti-SPAM & Net Abuse 等七個主題。APNIC 的主題中包含了 IX、IPv6、DNS、Routing 等 SIG (Special Interest Group)；APCERT Security 主題則是討論及說明 APCERT CSIRT project 的成果；MINC 主題是探討多國語言的 Domain name 合作與運作的問題；VoIP 主題包含了介紹 VoIP 核心技術、實際建置經驗交流及討論；Internet Routing & Operations 主題介紹盛行的 L2 及 L3 VPN、Traffic Engineering、QoS 及實務運作經驗交流等；IPv6 主題是延續近年來 IPv6 實作與應用的討論；Asia Pacific Peering 主題是討論歐美各國 peering 的運作模式及現況，並由與會人士分享及討論亞太各國 peering 的運作及狀況；Anti-SPAM & Net Abuse 主題是討論 Anti-SPAM 及 Abuse 的現況。

本文電子檔已上傳至出國報告資訊網

目 次

會議基本資料、會議目的	1
會議資訊、背景及會議議程、內容	2
會議心得	10
對未來國內網路發展及建議	12
附件一	14
附件二	18

出席「亞太國際學術網路年會 APRICOT 2004 會議」

心得報告

一、 會議基本資料

會議名稱：亞太國際學術網路年會 APRICOT 2004 會議

時間：93 年 2 月 23 日 至 93 年 2 月 26 日

地點：馬來西亞

參加國家人員：亞太地區各國網際網路相關組織及人士

二、 會議目的

APRICOT (Asia-Pacific Region Internet Conference of Technology) 會議是由 APNIC (Asia Pacific Network Information Center) 所發起，第一屆的會議於 1996 年在新加坡召開，爾後定期每年二或三月於亞太各國輪流舉辦，會中的主題以網路實作應用技術為主，同時也有關於亞太區域相關的網路運作議題。APRICOT 也同時提供亞太區域網際網路經驗分享及交流的平台，促進亞太國家的網路交流與技術，且間接引導各國政府發展與制定網路相關策略。近年來每次與會人數均達六百人以上、參與的國家含括亞太區域三十多個國家，是亞太區域最大的網際網路會議，與會人員含括各國 ISP 網路相關技術人員與主管、跨國的網路設備與電路供應商、網路相關的管理及策略制定組織、及少部分政府與學界人士等。今年的會議主題除了近來發展快速的 IPv6 與 Security 外，還特別探討 AS (Autonomous System) Peering 的相關議題，Peering 的策略及發展是影響一個地區網路發展的重要因素，希望能藉這次會議擷取各國的經驗，供我國未來的網際網路發展與管理作為參考。

三、 APRICOT 2004 Tutorial/ APRICOT 2004 Conference

會議資訊及背景資料

APRICOT 2004 是由 APNIC (Asia Pacific Network Information Center) 所發起的年度亞太區域網路研討會，為目前亞太區域網際網路研討會中最具歷史及最具規模的會議。除可透過此會議觀摩、學習亞太區域各國 Internet 之發展經驗及技術外，會議主辦單位並希望可以透過此一會議讓亞太區域國家能夠同步提昇網際網路技術與經驗。

本次為 APRICOT 第九次之會議，由馬來西亞 PIKOM 主辦，馬來西亞能源、通信及多媒體部 (Ministry of Energy, Communication and Multimedia Malaysia) 協辦，於 2 月 23 至 26 日在馬來西亞吉隆坡 Palace of the Golden Horses 飯店的國際會議廳舉行。今年有來自三十多個國家，超過六百人與會。本次研討會的主題是針對目前及未來 IPv6 實際應用的問題及技術等問題作研討及報告；Security 相關問題的討論；還有亞太區域 AS (Autonomous System) Peering 的相關議題。相關資訊已在 Internet 上：
<http://www.apricot2004.net> 或 <http://www.apricot.net/>。

四、 會議議程 (Program Schedule) 及會議內容

(一) 議程：詳細資料請參考附件一

Monday, 23 February

08:30 ~ 18:00 Registration

09:00 ~ 12:30 Technical Tutorials (10 concurrent sessions)

12:30 ~ 14:00 Lunch

14:00 ~ 17:30 Technical Tutorials (10 concurrent sessions)

Tuesday, 24 February

08:30 ~ 18:00 Registration

09:00 ~ 12:30 Technical Tutorials (10 concurrent sessions)

12:30 ~ 14:00 Lunch

14:00 ~ 17:30 Technical Tutorials (10 concurrent sessions)

Wednesday, 25 February

08:30 ~ 18:00 Registration

09:00 ~ 10:30 Opening Plenary Session

11:00 ~ 12:30 Concurrent Sessions (APNIC 、 APCERT 、 MINC 、 VoIP 、
Internet Routing)

12:30 ~ 14:00 Lunch

14:00 ~ 15:30 Concurrent Sessions (APNIC 、 APCERT 、 MINC 、 VoIP 、
Internet Routing)

16:00 ~ 17:30 Concurrent Sessions (APNIC 、 APCERT 、 MINC 、 VoIP 、
Internet Routing)

Thursday, 26 February

08:30 ~ 18:00 Registration

09:00 ~ 10:30 Concurrent Sessions (APNIC 、 IPv6 、 Asia Pacific Peering 、
Anti-SPAM & Abuse 、 Internet Routing)

11:00 ~ 12:30 Concurrent Sessions (APNIC 、 IPv6 、 Asia Pacific Peering 、
Anti-SPAM & Abuse 、 Internet Routing)

12:30 ~ 14:00 Lunch

14:00 ~ 15:30 Concurrent Sessions (APNIC 、 IPv6 、 Asia Pacific Peering 、
Anti-SPAM & Abuse 、 Internet Routing)

16:00 ~ 17:30 Concurrent Sessions (APNIC 、 IPv6 、 Asia Pacific Peering 、
Anti-SPAM & Abuse 、 Internet Routing)

(二) 會議內容：

1. 技術性研討會（2月23日至24日），共有26場分別是：

- Practical Deployment Guidelines for MPLS
- APNIC Internet Routing Registry
- ISP Security Deploying and Using Sinkholes
- Creating and Managing Computer Security Incident Response Teams
- BGP Introduction and Deployment for Service Providers
- Advance Routing & Traffic Control in Linux
- Internet Bandwidth Management and Web Caching with Squid
- Metro Ethernet: The First/Last Mile Technology
- Various Technique in Mitigating D/DOS Attacks
- Source Specific Multicast and Nextgen Media Distribution Technologies
- Developments in MPLS Technology and Deployments
- Network Security: Essential Steps to Secure Carrier Scale Networks
- Packet Voice Backbone Network Design
- Anti-Spam & Anti-Net Abuse
- APNIC Internet Resource Management Essentials
- Network Security: The Principles of Threats, Attacks, Intrusions
- Beyond Fault Management – Implementing a Network Operations Center to Maintain High Availability
- Convergence of Data Network Technologies to a Common Packet Backbone
- 802.11 Tech for Hotspots and WISPs
- Constructing Internet Exchanges
- Introduction to IPv6

- Traffic Engineering Beyond MPLS
 - 3G Data Network: Design Issues & Case Studies
 - APTLD Technical Workshop
 - Next Steps in Broadband Services and Network Designs
 - Introduction to SIP and VoIP Open Source Implementations
- 2.研討會總共有八個主題，分爲 37 個子題（場次）
 - 3.實際應用展示會有 5 場
 - 4.大會專題討論 1 場

（三）研討會內容分爲八個主題

- 1.亞太網路資訊中心特別議題（APNIC (Asia Pacific Network Information Center) SIG (Special Interest Group)）
- 2.亞太網路危機處理中心網路安全議題（APCERT Security）
- 3.多國語言網際網路名稱協會議題（MINC International Domain Names）
- 4.網際網路語音系統議題（VoIP）
- 5.網際網路路由及運作議題（Internet Routing & Operations）
- 6.第六代網際網路協定議題（IPv6）
- 7.亞太網際網路互聯議題（Asia Pacific Peering）
- 8.垃圾郵件及網路濫用議題（APCAUCE Anti-SPAM & Net Abuse）

依各項分類分別說明如下：

- 1.亞太網路資訊中心特別議題（APNIC (Asia Pacific Network Information Center) SIG (Special Interest Group)），分成七個子題：
 - 網際網路互聯交換中心（IX SIG）議題：供亞太區域網際網路互聯交換中心現況及活動交流，除了亞太區域日本的 JPNAP、印尼的 IIX、紐西蘭的 APE 及 WIX、澳洲的 WAIX 現況及活動報告外，還

邀請歐洲的 Euro-IX 及英國的 LINX 與會討論 IX 的運作及經驗分享。

- 第六代網際網路協定技術 (IPv6 Technical SIG) 議題：提供第六代網際網路協定實作經驗分享，並回顧過去一年來的技術及應用相關問題。
- 網路位置發放及管理 (Policy SIG) 議題：提供 APNIC、各個國家網路註冊中心 (NIR) 及 ISP 網際網路位置 (IP) 資源管理及發放相關策略的探討及制定。
- 網際網路管理資訊資料庫 (Database SIG) 議題：驗證 APNIC Whois 資料庫運作，並探討網路資訊註冊實作、資料庫安全、資料庫功能等相關議題。
- 網路領域名稱伺服器運作 (DNS Operations SIG) 議題：驗證亞太區域網路領域名稱反解的實作及策略問題，其中包含 IPv6、動態更新、安全網路領域名稱伺服器、現行的網路領域名稱伺服器軟體等。
- 網路路由協定 (Routing SIG) 議題：討論網際網路路由協定與策略的重要議題，包含網際網路路由表的成長、路由穩定、路由安全、及網際網路路由註冊等等。
- 國家網際網路註冊組織 (NIR SIG) 議題：供各個國家網路註冊中心 (NIR) 分享運作及管理策略，並探討相關的合作議題。

2. 亞太網路危機處理中心網路安全議題 (APCERT Security)，分成三個子題：

- 網路入侵議題：報告網路危機處理小組 (CSIRT) 一年來處理網路病蟲問題的經驗，報告網路犯罪的相關議題，及處理網路攻擊的經驗分享。
- 網路危機處理小組 (CSIRT) 現況及技術議題：介紹網路攻擊的方法及型態，說明流量監控對網路入侵的幫助，報告用數值分析評估分析 IDS 系統的演進。

- 處理網路入侵時的合作議題：介紹亞太網路危機處理中心(APCERT)的工作及提供的服務，網路入侵及網路安全的策略建議報告，各個組織間遭遇網路安全問題時的合作方式討論。

3.多國語言網際網路名稱協會議題 (MINC International Domain Names) :

- 分別探討多國語言網際網路名稱標準訂定，多國語言網際網路名稱應用程式的支援及計算運作問題。

4.網際網路語音系統議題 (VoIP) :

- 介紹 VoIP 技術，VoIP 實作經驗討論，討論 VoIP 實作及策略相關議題。

5.網際網路路由及運作議題 (Internet Routing & Operations) :

- 分別討論網路流量管理，路由技術及技巧，路由運作準則及原理，及網路頻寬保障及對網路運作影響等問題。

6.第六代網際網路協定議題 (IPv6) :

- 分別討論 IPv6 網路實際運用經驗，IPv6 相關應用程式，亞洲各國 IPv6 工業發展等。

7.亞太網際網路互聯議題 (Asia Pacific Peering) ，分成四個子題：

- 網際網路互聯生態介紹：說明美國現有的網際網路互聯狀況、美國網際網路交換互聯交換中心的運作，並討論網際網路互聯的效益等。
- 亞太區域國際網際網路互聯座談會：亞太區域國家與國際的網際網路交換互聯合作及經驗報告，並由與會人士討論亞太區域國家與國際網際網路互聯的狀況，並給予相關建議。
- 亞太區域網際網路互聯座談會：報告亞太區域國家間的網際網路互聯現況，並討論亞太區域國家間的互聯問題。
- 亞太區域國家內部網際網路互聯座談會：報告亞太區域國家內部網

際網路互聯現況，並分享各國網際網路互聯相關議題。

8. 垃圾郵件及網路濫用議題 (APCAUCE Anti-SPAM & Net Abuse) :

- 分別討論 DNS 阻斷垃圾郵件的方式及亞太區域 ISP 的防治現況，發表反制垃圾郵件相關報告等等。

(四) 實際應用展示會內容 (Demonstration) : 對新的網路技術實作經驗及相關的實作研究討論。內容包括韓國使用 IPv6 網路攝影機實作遠端監控、網路設備廠商提供網路設備與新的技術整合應用展示、海纜及網際網路服務提供業者現行架構及網路服務展示等等。

(五) 大會專題討論 (Plenary Panel) : 分別發表對網際網路安全議題看法的演說；及對網際網路的未來目標發表意見。網際網路安全主題由 Suguru Yamaguchi 博士擔任演說者，其演說內容討論目前網路安全架構，並說明因應網路安全問題所需要的解決方法，新的解決方法將需要包含：(1)全面式（內部網路也可能是可疑的入侵點）的弱點防護；(2)需要經常性檢視分析網路安全紀錄；(3)使用者需要的應用不能因為網路安全管理而犧牲；(4)網路安全管理不可影響網路效能。另外針對網路入侵回應，Suguru Yamaguchi 博士也提出了以下幾點看法：(1)需要專業人員處理相關問題的經驗及能力；(2)對單一網路安全事件需要有更廣泛的視野及研究；(3)需要良好的網路安全資訊管理及分享。這些建議對於現行的網路安全並不是明確不變的答案，網路安全的技術不斷演進，所以最重要的是網路安全經驗的分享、訓練與準備。

對網際網路的未來目標發表演說的是 Dave Crocker，他首先說明他個人對於現在網際網路的一些經驗及看法：如新的網路應用傳播較慢、網際網路架構趨於分散、網際網路規模越來越大等。他並建議與

會人員：(1)設計單純化：雖然未來對網路的需求很多，但是其實目前真正需要的只是其中的一小部份，不需要在現在就將所有的需求都全部加在網路上；(2)加速網際網路規格循環：允許網際網路技術透過經驗法則累加演進，理論基礎與實務驗證的循環必須要更快速才能滿足未來的環境；(3)需要更多、更快的跨領域合作：網路應用、網路運作、網路安全、網路管理等領域需要更密切的合作，才能讓網際網路繼續演進。綜合上述建議，Dave Crocker 希望能讓未來的網際網路依據這些方法同時保留原有的優點並快速進步。

五、 會議心得

- (一) 亞太地區的網際網路發展並非均衡的，亞太地區的網際網路發展較健全的分別是日本、韓國、澳洲、新加坡及我國，其他的國家因為經濟或者其他因素的影響發展較慢，APRICOT 會議的主要目的之一就是希望透過亞太地區國家之間的網際網路現況交流，促進各國均衡發展網路環境，並且促成亞太地區網際網路合作及互聯等。這次的會議中，不僅有往常的網路技術交流、網路應用探討、網路發展策略等議題，還特別增加了三個亞太區域網際網路互聯的座談會，藉由這幾個座談會可以讓各國汲取其他國家的網際網路互聯與合作經驗，了解其他國家網路的環境及文化，進一步拉近各國網際網路的距離，也為未來各國網際網路互聯與合作開啓了另一個聯絡的管道。對於亞太區域國家間的網際網路合作及互聯都有正面的幫助。
- (二) 網路安全及網路合理使用的議題是近年來一直被討論的，在這次的會議中也不列外，網路安全的議題因應網路技術的進步，每次都有新的入侵或攻擊形態產生，軟體的漏洞對於網路使用者來說已經是一個無可避免的夢靨，近年來每年都有大規模新病毒及病蟲感染的問題出現，每年的網路安全技術因此也都有相當大的進步，但這終究是後期的治標方法，對於網路的維運及管理者來說，這些技術及技巧只能對可能的問題作先期阻擋或是對已經發生的問題作適當的反應處理，但是最終的問題解決還是在伺服器或是軟體本身，一方面需要軟體供應商致力於避免漏洞的產生，另一方面則是需要加強網路使用者的知識，選用適當的且較安全的作業系統軟體、養成良好的網路使用習慣等等，這些基礎的措施及知識才是對於網路安全及合理使用最根本的解決方法。

- (三) 以往 IPv6 發展以亞太及歐洲地區發展最快也較重視，去年一年來也可以感受到美國政府方面對 IPv6 發展開始積極投入，近年來美國主要的網路設備廠商、作業系統廠商、設備供應商也都積極投入 IPv6 支援及研發。無可避免的這次的會議中也討論相關的應用及發展趨勢，IPv6 議題討論的重點已經由最先開始的網路基礎建設漸漸轉向到 IPv6 的網路應用層面，IPv6 能否順利轉移的關鍵將會落在 IPv6 相關的應用上，網路基礎建設將不是影響 IPv6 能否普及使用的關鍵，當出現只有 IPv6 適合的網路應用環境時，IPv6 自然會逐漸壯大成形。
- (四) 多國語言網路領域名稱的議題是亞太地區各國積極參與及制定國際標準的一個主題，亞太地區參與熱烈的原因在於亞太地區國家的語言文字之特殊性。這個主題中我國的 TWNIC 也多次代表我國出席國際間相關會議、參與各個國際間的討論。

六、 對於未來國內的網路發展及建議

國內網路的使用人口與家庭普及率在連年推廣及價格下降後，都有相當多的成長，但是在成長之後伴隨而來的是網路安全問題及網路濫用問題，越來越多的資訊透過網路流通，所以每一個網路使用者對於網路安全的概念都應該有一定程度的了解，並且對網路濫用的影響等問題要有深刻的認識。近年來網路相關的入門課程著重的是網路的使用，而網路安全及網路濫用的問題卻沒受到應有的重視，如果能在教導網路使用的同時一併教育使用者安全及合理使用的相關知識，從開始使用網路時就能認識網路安全及網路合理使用範圍，對網際網路的應用及發展都是正面的。另外，對於惡意的網路濫用及網路入侵的法律管制及相關法令的宣導對網路安全也是有很大的助益。

國內網際網路互聯交換中心（IX）的發展算是相當早的，因為網路使用環境及外在環境的關係，導致國內網際網路互聯交換中心所發揮的功能僅對於國內業者有幫助，但是網際網路是跨國性的，對於國際上有意與我國 ISP 互聯的網際網路業者來說，我國的網際網路互聯交換中心他們無法了解其運作及進入的方式，最主要的問題是：「缺乏英文資訊」，國內的四個網際網路互聯交換中心所提供的資訊絕大部分都缺乏英文資訊供其他國家參考，這樣間接提高我國網際網路與其他國家互聯的困難度，使有意要進入我國網際網路互聯交換中心的國際型 ISP 或業者有相當大的困難，幾乎這次與會的跨國 ISP 對我國網際網路互聯交換中心都是相同的反應，建議引導我國網際網路互聯交換中心提供英文化的資訊，以促進我國網際網路與國際網際網路交流與合作。

七、 本次研討會的相關資料於下列網頁中

<http://www.apricot2004.net/papers.asp>

八、 附錄

<附件一> 會議議程

<附件二> 會議內容資料

附件一

	18-Wed	19-Thur	20-Fri	21-Sat	22-Sun	23-Mon	24-Tue	25-Wed	26-Thur	27-Fri	
Day Program	Pre-Conference Workshops					Apricot Tutorials		Apricot Plenary & Conference Sessions			
						NIR Tech Resource Mgmt	EC Meeting	Newcomers Breakfast	AC Breakfast Meeting	APNIC Members Meeting	
							APIA Board Meeting	APIA AGM			
						APNIC HMC					
									APTLD AGM		
						APSIRC Closed WS	APSIRC Members Meeting				
						APCERT Steering Committee Meeting					
						APSIRC Members Reception					
					AP* Retreat						
	Night Program						Birds of a Feather				
						NIR WS	APOPS				
								APNIC Social			
									CERT Seminar		
					WS Social		APRICOT Opening Social		APRICOT Closing Social		

Tutorial Day 1 (23rd February 2004)										
9:00 - 10:30 AM	Practical Deployment Guidelines for MPLS - Monique Morrow - Cisco	APNIC Internet Routing Registry (IRR Tutorial)	ISP Security: Deploying and Using IPSec - McPherson - Cisco Networks	Creating and Managing Complex Security Teams (CSRT) - Mark Zabeck - Software Engineering Institute (SEI) at Carnegie Mellon University	BGP Introduction and Deployment for Service Providers - Philip Smith - Cisco	Advance Routing & Traffic Control in Linux - Kabor Parth - Kalmharnd College of Management	Internet Bandwidth Management and SQUID - Ghan Das - ICT Agency	Metro Ethernet: The First Last Mile Technology - Lim Wong - Cisco	Various techniques in mitigating DDOS attacks - Seb Bion - Fg - Cisco	Source Specific Multicast Distribution Technologies - Mark Williams - Juniper
10:30 AM	Morning									
11:00 AM - 12:30 PM	Practical Deployment Guidelines for MPLS - Monique Morrow - Cisco	APNIC Internet Routing Registry (IRR Tutorial)	ISP Security: Deploying and Using IPSec - McPherson - Cisco Networks	Creating and Managing Complex Security Teams (CSRT) - Mark Zabeck - Software Engineering Institute (SEI) at Carnegie Mellon University	BGP Introduction and Deployment for Service Providers - Philip Smith - Cisco	Advance Routing & Traffic Control in Linux - Kabor Parth - Kalmharnd College of Management	Internet Bandwidth Management and SQUID - Ghan Das - ICT Agency	Metro Ethernet: The First Last Mile Technology - Lim Wong - Cisco	Various techniques in mitigating DDOS attacks - Seb Bion - Fg - Cisco	Source Specific Multicast Distribution Technologies - Mark Williams - Juniper
12:30 PM	Lunch									
2:00 - 3:30 PM	Practical Deployment Guidelines for MPLS - Monique Morrow - Cisco	APNIC Internet Routing Registry (IRR Tutorial)	Development in MPLS technology and deployments - Andrew Coward - Juniper Networks	Creating and Managing Complex Security Teams (CSRT) - Mark Zabeck - Software Engineering Institute (SEI) at Carnegie Mellon University	BGP Introduction and Deployment for Service Providers - Philip Smith - Cisco	Advance Routing & Traffic Control in Linux - Kabor Parth - Kalmharnd College of Management	Internet Bandwidth Management and SQUID - Ghan Das - ICT Agency	Metro Ethernet: The First Last Mile Technology - Lim Wong - Cisco	Network Security Essential Steps to Secure Career - Wayne Chan - Juniper	Packet Voice Backbones Design - Matthew Koton - Juniper
3:30PM	Afternoon Tea									
4:00 - 5:30 PM	Practical Deployment Guidelines for MPLS - Monique Morrow - Cisco	APNIC Internet Routing Registry (IRR Tutorial)	Development in MPLS technology and deployments - Andrew Coward - Juniper Networks	Creating and Managing Complex Security Teams (CSRT) - Mark Zabeck - Software Engineering Institute (SEI) at Carnegie Mellon University	BGP Introduction and Deployment for Service Providers - Philip Smith - Cisco	Advance Routing & Traffic Control in Linux - Kabor Parth - Kalmharnd College of Management	Internet Bandwidth Management and SQUID - Ghan Das - ICT Agency	Metro Ethernet: The First Last Mile Technology - Lim Wong - Cisco	Network Security Essential Steps to Secure Career - Wayne Chan - Juniper	Packet Voice Backbones Design - Matthew Koton - Juniper
Tutorial Day 2 (24th February 2004)										
9:00 - 10:30 AM	Anti-Spam & Anti-Hel - Anil Suresh - Renukubharaman	APNIC Internet Resource Management Essentials	Network Security: The principles of Threats Attacks, Intrusions - Ray Hunt	Beyond Fault Management - Implementing a Network Operations Center (NOC) to Maximize High Availability - Jim Thompson - Cisco	Convergence of Data Network Technologies to a Common Packet Backbone - David O'Leary - Juniper	802.11 Tech for Hotspots and WSP's - Matt Peterson - BAVUG	Conducting Internet Exchanges - Bill Woodcock - Packet Clearing House	Introduction to IPv6 - Jeff Doyle - Juniper	Traffic Engineering Beyond MPLS - Armin Marghobian - Cisco Networks	3G Data Network Design Issues & Case Studies - Suresh Nivasekar - Juniper
10:30 AM	Morning Tea									
11:00 AM - 12:30 PM	Anti-Spam & Anti-Hel - Anil Suresh - Renukubharaman	APNIC Internet Resource Management Essentials	Network Security: The principles of Threats Attacks, Intrusions - Ray Hunt	Beyond Fault Management - Implementing a Network Operations Center (NOC) to Maximize High Availability - Jim Thompson - Cisco	Convergence of Data Network Technologies to a Common Packet Backbone - David O'Leary - Juniper	802.11 Tech for Hotspots and WSP's - Matt Peterson - BAVUG	Conducting Internet Exchanges - Bill Woodcock - Packet Clearing House	Introduction to IPv6 - Jeff Doyle - Juniper	Traffic Engineering Beyond MPLS - Armin Marghobian - Cisco Networks	3G Data Network Design Issues & Case Studies - Suresh Nivasekar - Juniper
12:30 PM	Lunch									
2:00 - 3:30 PM	Anti-Spam & Anti-Hel - Anil Suresh - Renukubharaman	APTLD Technical Workshop	Network Security: The principles of Threats Attacks, Intrusions - Ray Hunt	Beyond Fault Management - Implementing a Network Operations Center (NOC) to Maximize High Availability - Jim Thompson - Cisco	Convergence of Data Network Technologies to a Common Packet Backbone - David O'Leary - Juniper	802.11 Tech for Hotspots and WSP's - Matt Peterson - BAVUG	Conducting Internet Exchanges - Bill Woodcock - Packet Clearing House	Introduction to IPv6 - Jeff Doyle - Juniper	Broadband Services and Network Design - Robert Healey - Juniper	Introduction to SIP and VoIP Open source implementations - Suresh Nivasekar - Cisco Networks
3:30PM	Afternoon Tea									
4:00 - 5:30 PM	Anti-Spam & Anti-Hel - Anil Suresh - Renukubharaman	APTLD Technical Workshop	Network Security: The principles of Threats Attacks, Intrusions - Ray Hunt	Beyond Fault Management - Implementing a Network Operations Center (NOC) to Maximize High Availability - Jim Thompson - Cisco	Convergence of Data Network Technologies to a Common Packet Backbone - David O'Leary - Juniper	802.11 Tech for Hotspots and WSP's - Matt Peterson - BAVUG	Conducting Internet Exchanges - Bill Woodcock - Packet Clearing House	Introduction to IPv6 - Jeff Doyle - Juniper	Broadband Services and Network Design - Robert Healey - Juniper	Introduction to SIP and VoIP Open source implementations - Suresh Nivasekar - Cisco Networks

Wednesday Feb 25 Conference Day 1						
	APNIC I	APNIC II	APCERT Security (Yuri Ito)	MINC International Domain Names (Tan Tin Wee)	VoIP (Garub Raj Upadhaya)	Internet Routing & Operations I (Ananth Nagarajan)
9:00 - 10:30	Plenary Session					
10:30 - 11:00	Break					
11am - 12:30	IX SIG	IPv6 technical SIG	CSIRT, Incident Response, and APCERT	Basic primer on IDN RFCs and IDN Interoperability	Core VoIP Technology	Supporting Wholesale & Multi-carrier environments
12:30 - 14:00	Lunch					
14:00 - 15:30	Policy SIG		Updating CSIRT Projects and Technologies	IDN implementation and roll out in different gTLDs and ccTLDs, Languages and scripts	Deployment Experiences	Traffic Engineering
15:30 - 16:00	Break					
16:00 - 17:30	Policy SIG		Cooperation Model among Multiple Sectors: CERT Bridging between Governments, Industry, Law Enforcement, and Academy	IDN-enabled applications, Email Addresses & Language vs Script computing problems	Deployment & Policy Issues	Routing Technologies & Techniques

Thursday Feb 26 Conference Day 2						
	APNIC I	APNIC II	IPv6 (Takashi Arano)	Asia Pacific Peering (Bill Norton)	APCAUCE Anti-SPAM & Net Abuse (Suresh Ramasubramanian)	Internet Routing & Operations II (Ananth Nagarajan)
9:00 - 10:30	Database SIG		IPv6 Opening Ceremony & Keynote Panel	Introduction to the Internet Peering Ecosystem	APCAUCE Keynote: Dave Crocker	Services on IP Networks (L2 & L3 VPNs)
10:30 - 11:00	Break					
11am - 12:30	Policy SIG		IPv6 Production Network Experiences	Panel: International Asia Pacific Peering: Seasoned Peering Coordinators share their experiences	Panel: DNS Block Lists and Asian ISPs	Routing and operations - guidelines & philosophies
12:30 - 14:00	Lunch					
14:00 - 15:30	DNS operations SIG		IPv6 Applications	Panel: Regional Asia Pacific Peering: Individual Peering Ecosystems and peering dynamics	Anti-Spam Papers	Routing Experiences
15:30 - 16:00	Break					
16:00 - 17:30	Routing SIG	NIR SIG	Panel: Asian Industry and IPv6	Panel: Domestic Asia Pacific Peering: Internal country peering related issues	Panel on RMX record proposals (SPF, DRIP, AMTP etc)	Panel Discussion: IP QoS and its impact on scalability



17th APNIC Open Policy Meeting

23-27 February 2004 · Kuala Lumpur · Malaysia



Schedule

Floor plans are available in [Onsite Notice Board](#).

	Tutorials		Policy meetings		Member meeting
	Monday 23 February	Tuesday 24 February	Wednesday 25 February	Thursday 26 February	Friday 27 February
Minutes					
Programme	8:30		Registration		
HM consultation		Internet resource management essentials	APRICOT plenary	Database SIG	APNIC Member Meeting
EC election	9:00	IRR			
Social event			Morning tea		
Sponsorship	10:30				
Photo gallery		Internet resource management essentials	IPv6 technical SIG	IX SIG	Policy SIG
Past meetings	11:00	IRR			APNIC Member Meeting
APRICOT 2004	12:30		Lunch		
APNIC 17 home					
APNIC home	14:00	APTLD technical workshop	Policy SIG	DNS operations SIG	APNIC Member Meeting
	15:30		Afternoon tea		
	16:00	APTLD technical workshop	Policy SIG	Routing SIG	NIR SIG
	17:30		Break		
	18:00	APOPS	APNIC website BOF	APNIC/APCERT whois database BOF	CRISP/EPP BOF
	19:00	APRICOT opening event	APNIC social event	APRICOT closing reception	



[Programme](#) | [HM consultation](#) | [EC election](#) | [Social event](#) | [Sponsorship](#) | [Future meetings](#) | [Past meetings](#) | [APRICOT 2004](#) | [APNIC 17 home](#) | [APNIC home](#)

Last modified: Wednesday, 25-Feb-2004 13:38:53 EST | © 1999 - 2004 APNIC Pty. Ltd. webmaster@apnic.net

附件二

- HOSTS
- VENUE
- PROGRAM
- CALL FOR PAPERS
- FELLOWSHIP
- ABOUT APRICOT
- PAST APRICOTS
- ABOUT MALAYSIA
- ENTERING MALAYSIA

- TRANSPORTATION
- ACCOMMODATIONS
- SIGHT-SEEING
- SITEMAP



PROGRAM

The APRICOT 2004 - KL program is as listed below.

18 - 22 February 2004: [Workshop](#)
23 - 24 February 2004: [Tutorial](#)
25 - 26 February 2004: [Conference](#)

[Download Program Masterlist](#)
[Download Tutorial Program](#)
[Download Technical Conference Program](#)

Tutorial speakers Biodata and Abstracts

- [Tutorial Day 1](#) (23rd February 2004)
- [Tutorial Day 2](#) (24th February 2004)

Conference Program Schedule

- [MINC Conference](#) (25th February 2004)
- [APCERT Security Conference](#) (25th February 2004)
- [VoIP Conference](#) (25th February 2004)
- [Internet Routing and Backbone Operations](#) (25 & 26 February 2004)
- [APNIC Conference](#) (25 & 26 February 2004)
- [APCAUCE Conference](#) (26th February 2004)
- [IPv6 Conference](#) (26th February 2004)
- [Asia Pacific Peering](#) (26th February 2004)

Birds of a Feather

- [WSIS / Internet Governance BoF](#) (22nd February 2004)
- [PGP key Signing BoF](#) (24th February 2004)
- [APNIC Website BoF](#) (25th February 2004)
- [APNIC / APCERT Whois Database BoF](#) (25th February 2004)
- [Microsoft - Agilent Security BoF](#) (25th February 2004)
- [Enum / SIP BoF](#) (25th February 2004)

Other Events

[Native Names Promotion Seminar](#) (23rd February 2004)

NO	CODE	NAME	COMPANY	TITLE OF TUTORIAL	BIOGRAPHY OF SPEAKER	ABSTRACT OF TUTORIAL
7	MTR-RRR Tutorial	Meva Fiala Andry Utison	APNIC	MTR-RRR Tutorial (Full Day Tutorial)	Meva Fiala Andry Utison	<p>The APNIC Routing Registry is fully integrated in the existing APNIC Whois Database and is available to all APNIC members. This tutorial provides opportunities for participants to learn features of Routing Registry, basics of Routing Policy Specification Language (RPSL), how to express routing policies using RPSL, and how to extend routing policies from the APNIC Routing Registry using RPSL. There will be some hands-on demonstrations on the use of the APNIC database tools.</p> <ul style="list-style-type: none"> - What is RRR - Why use an RRR or APNIC database and the RRR is using the Routing Registry is beneficial of using RRR - RRR objects review is using RPSL. In practice is RRR updates of Address prefix announcements is Action specification in Syntax of policy actions and filters. - RRR toolset options is RRR command is Case studies is Using RRR toolset command - The tutorial is aimed at people who are already familiar with the APNIC Whois Database and want to learn more about the APNIC Routing Registry. A basic understanding of RRR routing and the APNIC Whois Database is assumed. <p>The high cost of Internet bandwidth, both international and national, continues to be a major constraint for users and service providers in the region. Optimizing the use of available bandwidth while providing a good service to users is a prime concern of network managers. Since much Internet traffic is due to web access, web caching is widely used solution. However, other types of traffic, such as multimedia and video, are also important. Network traffic can be categorized as real-time, on-line, and offline, and this tutorial will show how to deal with each of these types of traffic to make the most of your Internet access in particular. Participants will learn how to deal with each of these traffic types in a way that is optimized for each type of traffic. The tutorial will set up of a set of low-connectioned cache.</p> <p>Major Network, with Ethernet as the main access technology, can deliver a variety of broadband services to the home and businesses. The tutorial discusses the architectural options for delivering high-quality video, voice, and Internet services to the home, and how VPN services can be offered with User Service Level Agreement Subscribers. What Internet technology, security and Quality of Service mechanisms are needed to offer these services? Topics to be covered:</p> <ul style="list-style-type: none"> - SON, DSL, CDM4, QoS, DMZ, DMVPN - MPLS switching concepts, E-MPLS, MPLS/VPN - MPLS service - MPLS and Internet services - L2 VPN - MPLS Video - QoS and QoS <p>The tutorial explores the practical aspects of planning and deploying an MPLS/VPN network. It is assumed that the participant (attendee) has a basic knowledge of MPLS protocols and procedures. The tutorial will address planning and deployment of RRR/VPN, IPsec, and other protocols, such as IPsec, and how to integrate these protocols with MPLS. The tutorial will further highlight MPLS/VPN mechanisms in conjunction with Diff-Serv, Traffic Engineering, RSVP, the hierarchical yet flat MPLS/VPN development for operational consideration.</p> <p>MPLS Tutorial - 1 Day</p> <p>The tutorial is designed to provide an overview of MPLS, its history, and the most recent developments with MPLS related protocols. Topics covered include a high-level overview, implementations and case studies for the following:</p> <ul style="list-style-type: none"> - MPLS L2 & L3 VPNs - MPLS and Traffic Engineering - MPLS and QoS - MPLS and DMZ migration <p>The session is suitable for attendees interested in learning and how each service can be layered into.</p>
8	MTR Interim	Ghan Dae	ICT Agency	Internet Bandwidth Management and Web Caching at Full Day Tutorial	Ghan Dae	<p>Dr. Ghan graduated from the University of Melbourne in Electronics and Telecommunications Engineering in 1988 and was a Senior Lecturer in the Department of Telecommunications in the Department of Computer Science and Engineering, University of Melbourne. He has been a Senior Lecturer in the Department of Computer Science and Engineering, University of Melbourne, and served as the Head of the Dept. from 1987 to 1989. He was instrumental in setting up and leading the Institute for Information Technology (IIT) at the University of Melbourne. He has been a Senior Lecturer at the Department of Information Systems, University of Melbourne since 1997. He has worked for several universities, government, and private sector organizations in the area of networking, software, information systems, and security. His research focus is in the area of bandwidth-constrained networking.</p> <p>He has been in IT and network industry for 21 years. In 1997, he led a team with Cisco Systems to set up a network for the Government of Victoria. He has been in IT and network industry for 21 years. He has been a Senior Lecturer in the Department of Telecommunications in the Department of Computer Science and Engineering, University of Melbourne. He has been a Senior Lecturer in the Department of Computer Science and Engineering, University of Melbourne, and served as the Head of the Dept. from 1987 to 1989. He was instrumental in setting up and leading the Institute for Information Technology (IIT) at the University of Melbourne. He has been a Senior Lecturer at the Department of Information Systems, University of Melbourne since 1997. He has worked for several universities, government, and private sector organizations in the area of networking, software, information systems, and security. His research focus is in the area of bandwidth-constrained networking.</p> <p>He has been in IT and network industry for 21 years. In 1997, he led a team with Cisco Systems to set up a network for the Government of Victoria. He has been in IT and network industry for 21 years. He has been a Senior Lecturer in the Department of Telecommunications in the Department of Computer Science and Engineering, University of Melbourne. He has been a Senior Lecturer in the Department of Computer Science and Engineering, University of Melbourne, and served as the Head of the Dept. from 1987 to 1989. He was instrumental in setting up and leading the Institute for Information Technology (IIT) at the University of Melbourne. He has been a Senior Lecturer at the Department of Information Systems, University of Melbourne since 1997. He has worked for several universities, government, and private sector organizations in the area of networking, software, information systems, and security. His research focus is in the area of bandwidth-constrained networking.</p>
9	MTR Ethernet, Fiber and Video Technology	Lim Wong	Cisco	Ethernet, Fiber and Video Technology (Full Day Tutorial)	Lim Wong	<p>Monique Morrow is currently a GTD Consulting Engineer at Cisco Systems, Inc. She has 20 years experience in IP Networking that includes design, implementation of complex customer projects and service development for service providers. Monique has been involved in developing managed network services for Telecom Access and Enterprise Network services in the United States and Europe. Monique and the Engineering Project team for one of the first European MPLS/VPN deployments in 1999 for a European service provider. Monique has been a speaker in the following conferences: MPLS Congress-Paris, 2002; IPSEC 2000, London; MPLS 2000, APNIC01, Paris; MPLS 2003, Lisbon; MPLS 2003, Bangalore; MPLS 2003, Sao Paulo; MPLS 2003, Mexico City. She has co-authored several articles on MPLS/VPN, QoS and Video Technology for the book, "International QoS Architecture and Mechanisms," Zheng Wang (Morgan Kaufmann, 2003), who has contributed a chapter on MPLS in "Video Content Services as the Vice President of Technical Operations, Asia Pacific for Juniper Networks. He is responsible for pre-sales and engineering support services to customers in Asia Pacific. Prior to Juniper, Andrew launched the Asia Pacific operation of Ustream Networks in May 1999. He led a team of system engineers to provide technical pre-sales and architectural design services, and support engineering services to customers in the region on IP access technologies, first with Bay Networks and later with Nortel, once he designed and planned some of the largest IP networks in Asia Pacific. Andrew started his career in government as an IP network engineer and progressed to role of Network Manager responsible for a 70-site United Kingdom wide network. Later, with Angliad Ltd, he was responsible for delivery of the first 600 frame access networks in South Africa. Andrew is currently based in Tokyo.</p>
10	MTR Protocol Development for MPLS/VPN Networks	Monique Morrow	Cisco	Practical Deployment of MPLS/VPN Networks (Full Day Tutorial)	Monique Morrow	<p>Monique Morrow is currently a GTD Consulting Engineer at Cisco Systems, Inc. She has 20 years experience in IP Networking that includes design, implementation of complex customer projects and service development for service providers. Monique has been involved in developing managed network services for Telecom Access and Enterprise Network services in the United States and Europe. Monique and the Engineering Project team for one of the first European MPLS/VPN deployments in 1999 for a European service provider. Monique has been a speaker in the following conferences: MPLS Congress-Paris, 2002; IPSEC 2000, London; MPLS 2000, APNIC01, Paris; MPLS 2003, Lisbon; MPLS 2003, Bangalore; MPLS 2003, Sao Paulo; MPLS 2003, Mexico City. She has co-authored several articles on MPLS/VPN, QoS and Video Technology for the book, "International QoS Architecture and Mechanisms," Zheng Wang (Morgan Kaufmann, 2003), who has contributed a chapter on MPLS in "Video Content Services as the Vice President of Technical Operations, Asia Pacific for Juniper Networks. He is responsible for pre-sales and engineering support services to customers in Asia Pacific. Prior to Juniper, Andrew launched the Asia Pacific operation of Ustream Networks in May 1999. He led a team of system engineers to provide technical pre-sales and architectural design services, and support engineering services to customers in the region on IP access technologies, first with Bay Networks and later with Nortel, once he designed and planned some of the largest IP networks in Asia Pacific. Andrew started his career in government as an IP network engineer and progressed to role of Network Manager responsible for a 70-site United Kingdom wide network. Later, with Angliad Ltd, he was responsible for delivery of the first 600 frame access networks in South Africa. Andrew is currently based in Tokyo.</p>
11	MTR Development in MPLS technology	Andrew Conrad	Juniper	Developments in MPLS Technology and Deployment (1/2 Day Tutorial)	Andrew Conrad	<p>Wayne Chen has more than six years experience in the networking and information technology. He is currently a product manager in Asia Pacific for Juniper Networks, he is responsible for the industry-leading M and T series routers (10.1Gb). Wayne Chen has more than six years experience in the networking and information technology. He is currently a product manager in Asia Pacific for Juniper Networks, he is responsible for the industry-leading M and T series routers (10.1Gb).</p>
12	MTR Network Security	Wayne Chen	Juniper	Network Security - External Access (1/2 Day Tutorial)	Wayne Chen	<p>Wayne Chen has more than six years experience in the networking and information technology. He is currently a product manager in Asia Pacific for Juniper Networks, he is responsible for the industry-leading M and T series routers (10.1Gb).</p>
13	MTR Design for Backbone Network	Matthew Lubin	Juniper	Practical Design for Backbone Network (1/2 Day Tutorial)	Matthew Lubin	<p>Matthew Lubin has more than six years experience in the networking and information technology. He is currently a product manager in Asia Pacific for Juniper Networks, he is responsible for the industry-leading M and T series routers (10.1Gb).</p>

NO	CODE	NAME	BI	PI	P	Paper	COMPANY	TITLE OF TUTORIAL	BIOGRAPHY OF SPEAKER	ABSTRACT OF TUTORIAL	
										Summary	Abstract
10	TTT APJLD Technical Workshop	Chris Hwang, Jeff Yin & Hsinshun Hsiao					APTLD	APTLD Technical Workshop (2 Day Tutorial)	Chris Hwang is Chief Technology Officer of Autologity Inc. USA, the company engaged with having the an system for mobile devices... (text continues)		
11	TTT Introduction to P4G	Jeff Doyle	1	0			Control abacus Inc	Introduction to P4G (1 Day Tutorial)	Jeff has the joined VMware (Eaton Network Automation Center) since February 2021. He is mainly responsible for... (text continues)		
12	TTT Network Design principles of 5G	Ray Hurd	1	1			University of Canterbury	Network Security: The principles of 5G (1 Day Tutorial)	Ray has been in the University of Canterbury for 20 years, he has been a member of the Department of... (text continues)		
13	TTT Introduction to SaaS & SaaS Delivery	Nathan Shaw					SaaS Delivery Services	Introduction to SaaS & SaaS Delivery (1 Day Tutorial)	Nathan Shaw is a senior software engineer with 15+ years of experience in SaaS delivery... (text continues)		
14	TTT Network Design	Robert Henley					Network Design Services	Network Design (1 Day Tutorial)	Robert Henley is a senior network engineer with 20+ years of experience in network design... (text continues)		



**MINC IDN 2004 Conference at APRICOT 2004
Kuala Lumpur, Malaysia, 25 February 2004 (Day 1 of APRICOT conference)**

Date: 1100-1730h 25 Feb 2004 MINC-APRICOT IDN 2004 Conference (open to all registrants of APRICOT 2004)

Venue: Palace of the Golden Horses, Kuala Lumpur, Malaysia

This hotel is a world class luxury resort and conference centre with stunning Malaysian-Moorish architecture overlooking a magnificent 150 acre lake at the Mines Resort City in Kuala Lumpur.

<http://www.apricot2004.net/venue.asp>

- [Call For Participation and Draft Program](#)
- [APRICOT 2004 Conference Website](#)
- [APRICOT 2004 Technical Conference Program](#) - MINC IDN Track 1100-1730h 25 Feb 2004
- **Registration**
APRICOT Registration Fees: As this is an APRICOT-MINC joint effort, participants to this conference are to register with APRICOT. Early Bird US\$190 by 15 January 2004. Regular Fees US\$150 (See [APRICOT Registration](#)).
- [Registered Participants](#) (to be updated)
- MINC IDN 2004 Carthage Meeting Report | [html](#) | (after the conference)
- MINC Kuala Lumpur Declaration | [html](#) | [doc](#) | (after the conference)
- Report on MINC Carthage IDN/ML UDRP Initiative | [html](#) | [doc](#) | (after the conference)
- Report on MINC Carthage IDN/ML-IETF Coordination Initiative | [html](#) | [doc](#) | (after the conference)

Papers and Presentations

- 1100h Opening Speech and Welcome - Local Organising Committee **Tan Tin Wee** and **Bilal Kisswani**
- **Session 1: Basic primer on IDN RFCs and IDN Interoperability**
- 1110h **MINC Introduction - Khaled Fattal**



- **BioData:** Khaled Fattal is the Current Chairman of MINC. He is CEO, International Business Enterprises Limited. United Kingdom;.President: Waqalat arbitration Centre. Online and off line domain name dispute resolution centre. New Delhi, India.
- **Abstract:** Ever since its founding, MINC has been actively promoting IDN and Multilingual keywords worldwide. Its efforts have led to a heightened awareness amongst many organisations and individuals on the need for an internationalised solution to domain names. It has also pioneered Interoperability testing and testbed operations and played key roles in helping and coordinating language groups using the following scripts: Arabic, Tamil, Cyrillic, Han characters, etc . This brief introduction to MINC will cover the aims and objectives of MINC, its achievements and its future initiatives.
- [PPT](#) Introducing MINC (ready)

- 1130h **MINC IDN Interoperability Testing - Bill Manning and presented by Milton Choo**



- **BioData:** **Bill Manning** is founder of EP.Net LLC. He is also staff of the HPCC Division, ISI and Project Manager, Routing Arbiter, USC/ ISI based in Marina del Rey, CA, USA. EP.NET, LLC. provides a variety of services to the Internet community. These include publication of Internet exchange facilities worldwide, links to supporting organizations, documentation on exchange creation and operation, and statistical information. EP.NET LLC. also offers consulting and support services and unique identifier management for neutral exchange point operations. These identifiers may include ASN's, IPv4 and IPv6 prefixes, and VPI/VCI assignment.
- **Milton Choo** is the founder of Borq.net.
- **Abstract:** The essentials of the MINC Interoperability Testbed is described and outlined. The objectives will be clarified, and the operational processes and procedures will be discussed.
- [PPT](#) (not ready)

- 1200h **MINC, WSIS and ITU's Internet Governance and its impact on IDN Deployment - Discussion Session chaired by K Fattal and T.W. Tan**



- **BioData:** **T.W. Tan** is the earliest implementor of IDN solutions using the earliest precursor of ACE (UTF5) and a proxy IDN server method of intercepting and converting multilingual script into DNS compatible form for resolution of IDNs. Unknown to many, he has always been concurrently a professor in the Biochemistry Dept of the National University of Singapore specialising in Bioinformatics. He has been involved with many Internet organisations such as APNG, APTLD, WWTL, CCIRN, APRICOT, APNIC, APAN, APBioNet, INFITT, MINC, etc in the past 10 years.
- **Abstract:** This discussion will include the latest update on the initiatives on Internet Governance in WSIS and ITU, and will reflect on the impact now and the future on IDN deployment and implementation vis-a-vis the reform process going on in ICANN.
- [PPT](#) Summary of Discussion (not ready until after the conference)

- 1230h **LUNCH**

- **Session 2 IDN implementation and roll out in different gTLDs and ccTLDs, Language and Scripts.**

- 1400h **IDN Deployment: DNS Applications, WHOIS, & Other Services - Edmon Chung, Neteka(Afilias)**



- **BioData:** I originally founded Neteka which was a pioneer in the development and deployment of IDN (Internationalized Domain Names) technologies. When Afilias Ltd., acquired the assets of Neteka earlier this year, I joined the Afilias team. As you may be aware, Afilias runs the backend registry system for .ORG and .INFO, and we also provide technologies to 11 ccTLDs around the world. Personally, I also gave a couple of presentations on IDN and EPP respectively during APRICOT 2003 in Taipei.
- **Abstract:** After three years of contentious debate, the IETF have finally found consensus to publish a set of RFCs regarding the Internationalization of domain names in the spring of 2003. Upon this and a complementing IESG statement, ICANN have also published an IDN guidelines for TLD registries around the world, of which a handful of registries have already signed on to. All these pave a clear path towards global deployment of IDN by registries... Or do they? The establishment of the standards and relevant documents is only the beginning of the challenges to the deployment of IDN. In fact, in the IESG statement, it is also clearly explained that the set of IDN RFCs do not provide all that is necessary to make IDN deployment successful. This presentation will explore the IDN challenges and discuss the industry experiences in the following areas:

- DNS Applications (e.g. Browsers)
- WHOIS
- Registration Systems
- Other Services (e.g. Email, Digital Certificates, Network tools, etc.)
- o PPT IDN implementation (ready)

• 1430h **IDN Deployment in ML,ML and ML.ascii - HuiMin Lim, i-DNS.net International Inc**



- o **BioData:** Lim HuiMin is Vice President (technology) of i-DNS.net
- o **Abstract:** i-DNS.net is the pioneer of IDNs in ML,ML and ML.ascii, as well as IDN email, since early research in 1997/8 and commercial deployment in 1999. An overview of our own experience in deployment as well as those by others worldwide since the very beginning is presented.
- o PPT IDN Deployment in ML,ML and ML.ascii (ready)

• 1500h **Discussion on Language vs Script computing problems: Arabic as an example- Bilal Kisswani, TAGI and Charles Shaban and Khaled Fattal**



- o **BioData:** Bilal Kisswani is the Internet Officer of the regional office of Abu-Ghazaleh Intellectual Property (AGIP), member of Talal Abu-Ghazaleh Organization (TAGO). He is a member of the Digital Office Committee (DOC) of the group. Chairman Talal Abu-Ghazaleh formed DOC with the specific mission to fully digitize the operations of the different TAGO companies. Bilal is responsible for Internet connectivity and security of TAGO network. Mr. Kisswani has 5 years experience in Internet networking and applications as he was working in a local ISP in Jordan as a Network engineer. Mr. Kisswani holds a Bachelor degree in computer engineering from Yarmouk University, Irbid-Jordan. He is responsible for managing the MINC website and the new Secretariat.
- o **Abstract:** MINC AL WG aims to co-ordinate efforts to develop and deploy Arabic Internet name system and applications. Providing users with the capability of using Arabic language and its standard character set to write domain names in Arabic and navigate the Internet, the WG has come a long way. In this paper, the progress will be reviewed, especially focussing on Arabic language specific issues, the nature of the Arabic script and the linguistic issues impacting IDN..
- o PPT Arabic Language and Script computing problems (ready)
- o PPT Latest Efforts on Arabic Internet (ready)

• 1530h TeaBreak

• **Session 3 IDN-enabled applications and IDN Email Addresses**

• 1600h **IDN and Native Language Internet Address service - Taeha Park, Netpia**



- o **BioData:** Taeha Park received Ph.D degrees in computer science from KAIST in addition to BS degree in computer engineering from Seoul National University. He worked at Inet Inc and PSINet Korea as CTO for 8 years, where he designed and deployed large scale Internet backbone and services. He joined Netpia in 2003 as CTO. He worked on network systems including network operation of the first internationally connected Internet in Korea, called Hana network in 1990, at computer center of KAIST. He established KRNIC in 1993 with Prof. Kilnam Chon and operated KRNIC until the task was migrated to NCA in 1994.
- o **Abstract:** Netpia provides NLIA (Native Language Internet Address) services since 1997, and the service is being expanded to many countries. The service has been most successful with 20 million queries a day in Korea. The status of keyword service and IDN service in Korea will be described in this presentation, and its Global Architecture and its value-added applications will be introduced.
- o PPT IDN and Native Language Internet Address service (ready) (Huge 11 Mbytes)

• 1630h **MINC Initiatives:** WSIS, ITU and UN processes on Internet Governance and its impact on IDN Deployment. Discussion chaired by **Khaled Fattal and T.W. Tan**



- o PPT MINC Commissions

• 1700h MINC IDN Conference 2004 closing remarks

Remote VideoConferencing Participants

- MINC IDN Conference 2004 Wed 11-5pm 25 Feb Kuala Lumpur
- For those who are unable to attend the MINC IDN Conference, we are trying to arrange an online web audioconferencing at 11am Wednesday +800h GMT in Kuala Lumpur to 6pm for our MINC IDN 2004 conference.
- As it is 11am in KL, it should be 05:00:00 Wed Feb 25 2004 in Asia/Amman 12nn on Wednesday in Tokyo 7pm in California on Tuesday 22:00:00 Tue Feb 24 2004 in America/New_York 06:00:00 Wed Feb 25 2004 in Europe/Moscow
- To attend the meeting, please register with me. tinwee@bic.nus.edu.sg There is a limit to the number of participants.
- If your registration is successful, you will be invited into the session and you have simply to click on the following URL for example http://emeet.nus.edu.sg/main/User/GuestAttend.jhtml?s_guid=0000019299f5000000facc9ffdb28734 and key in your email address, the one you registered with, and it should get into the audioconference.
- You have log into this teleconferencing system using a Windows Internet Explorer web browser. For full audio reception, your computer should have a speaker. If you wish to participate, it is compulsory for you to have a headset microphone-earpiece to prevent a feedback loop which will destroy the teleconferencing quality of every one else.. You will be able to see the ppt presentations and hear the audio.
- When you click on the above URL, you will be brought to the online teleconferencing system, and your Microsoft IE web browser will download an applet. It will control your audio reception and teleconferencing system. If you don't have microphone, you can lurk in listen mode with your speaker switched on but mute your microphone please. There is a text chat mode, which you can familiarise yourself by visiting the teleconferencing room right now by clicking on the URL below.
- Note that this technology claims it can work with a 56kbps dialup link. Any one care to test it?
- Present at the venue in Kuala Lumpur APRICOT 2004 will be Bilal Kisswani and Khaled Fattal, and hopefully myself Tin Wee.
- To ensure you have the correct time at your location: please use <http://www.timezoneconverter.com/> to ascertain when 11am to 5pm Kuala Lumpur time is at your place.

APSIRC 2004

Wed. 25 Feb. 2004

Reference : APSIRC 2003 (24-25 February 2003)

APCERT Open Session (held as an APRICOT2004 Conference Track)

Room: Auditorium

8:30-9:00 Registration

9:00-10:30 APRICOT Plenary
Prof. Suguru Yamaguchi, NAIST

10:30-11:00 Break

11:00-12:30 **Session (1) - CSIRT, Incident Response, and APCERT**
This session starts with a brief introduction of CSIRTs and the relation to APCERT. The CSIR Team members in AP will share their experience of handling incidents such as Dvldr32, Blaster, and Nachi worms. The methodology of detecting a new worm, such as by traffic monitoring and filtering to control the spreading of worms, will be discussed. The presentation also includes how they assisted their constituencies in combating and curbing the major incidents in 2003 and the effective preventive measures against such incidents that can be used in the future.

11:00-11:20 **Welcome Greeting**

YBhg. Datuk Dr. Halim bin Shafie
Secretary General, Ministry of Energy, Communications and Multimedia (MECM), Malaysia

11:20-11:40 **[Case Study: Internet Worms of 2003 and CCERT Response]**

Haixin Duan, CCERT, CN [Summary | Presentation (ppt, 1.051KB)]

11:40-12:00 **[Analysis and Trend of Security Crimes in Taiwan]**

Chia-Mei Chen, TWCERT [Summary | Presentation (ppt, 150KB)]

12:00-12:20 **[Case Study: Incidents of this Year - MyCERT Experience]**

Solahuddin Shamsuddin, MyCERT, MY [Summary | Presentation (ppt, 611KB) revised]

12:20-12:40 **[The Optus Hack]**

Graham Ingram, AusCERT [Summary | Presentation]

12:30-14:00 Lunch

14:00-15:30 **Session (2) - [Updating the CSIRT Projects and Technologies]**

Detecting a computer incident in its early stage is critical in preventing or minimizing the damage caused by the incident. The real time scan detector and scan data acquisition system are some of the ways to combat computer attacks which are becoming increasingly sophisticated. In this session, the speakers will present their projects about handling computer security incidents and discuss about the problems in monitoring and analyzing the data as well as the policy for implementing the projects

14:00-14:20 **[A Taxonomy of Network and Computer Attack Methodologies]**

Ray Hunt, University of Canterbury [Summary | Presentation (ppt, 347KB) Presentation (PDF, 467KB)]

14:20-14:40 **[Sharing Information of Traffic Monitoring (I)]**

Jungu Kang, CERTCC-KR [Summary | Presentation (PDF, 3.78MB) revised]

Yurie Ito, JPCERT/CC [Presentation (ppt, 335KB) revised]

14:40-15:00 **[Identifying Pervasive Malicious Activity: The CERT/CC Approach]**

Roman Danyliw, CERT/CC [Summary | Presentation (PDF, 246KB)]

15:00-15:20 **[Analysis on IDS evaluation using a quantitative assessment approach]**

Hatim Mohamad Tahir, Universiti Utara, MY [Summary | Presentation (ppt, 864KB)]

15:30-16:00 Break

16:00-17:30 **Session (3) - [Cooperation Model among Multiple Sectors: CERT Bridging between Governments, Industry, Law Enforcement, and Academia]**

Global coordination and collaboration as well as cross sector coordination are vital in handling security incidents. The presenters in this session are not only from Asia Pacific region, but also from the Americas and Europe, who also represent the network providers, governments as well as security related vendors. They will introduce their models, address the benefits and issues, and seek a way of improving the current situation to close a gap among the multiple players in the security arena in order to improve the efficiency and effectiveness in responding to the computer incidents.

16:00-16:30 [CERT - An Ideal Organization]
Mohammad Sabzwari, CER I PK [Summary | Presentation (ppt. 287KB)]
16:30-17:00 [Security and Incident Response - Strategy and Initiatives]
Meng-Chow Kang, Microsoft [Summary - Presentation (ppt. 4.1MB)]
17:00-17:30 [Cooperation models and compelling issues amongst participating parties]
Aisah Zainab Mahmud, Jagat Technology, MY [Summary | Presentation (ppt. 157KB)]

17:30-18:00 Break

18:00-19:00 APNIC/APCERT Whois Database BoF (Room:Unity 2)
In this BoF, the participants will discuss the use of the IRT object
in the whois database. [Meeting Minutes]

VoIP Program
(held as an APRICOT 2004 Conference Track)
25 Feb 2004, Kuala Lumpur, Malaysia

➤ [HOSTS](#)

➤ [VENUE](#)

➤ [PROGRAM](#)

➤ [CALL FOR PAPERS](#)

9:00 - 10:30 - Plenary Session

➤ [FELLOWSHIP](#)

10:30 - 11:00 - Break

➤ [ABOUT APRICOT](#)

11:00 - 12:30 - Core VoIP Technology

➤ [PAST APRICOTS](#)

Ran Atkinson, Extreme Networks, "Application of IP DiffServ and Ethernet QoS (802.1p) to VoIP networks"

➤ [ABOUT MALAYSIA](#)

➤ [ENTERING MALAYSIA](#)

Balan Sinniah, KDU College SDN BHD, "Distributed Echo Cancellation for Multimedia Conferencing System"

➤ [TRANSPORTATION](#)

Dr. Fu Cheng Peng, Frankii "VMCC: Veno-based Multicast Congestion Control over Hybrid Wired/Wireless Networks"

➤ [ACCOMMODATIONS](#)

12:30 - 14:00 - Lunch

➤ [SIGHT-SEEING](#)

14:00 - 15:30 - Deployment Experiences

➤ [SITMAP](#)

Tim Youm, Nortel Networks, "Integrating next generation multimedia services to existing telephones."



Bill Woodcock, Packet Clearing House, "INOC-DBA - Increased expectations and deployment"

Joe Abley, Internet Software Consortium, "Experiences with a Distributed SIP-Based PBX at ISC"

15:30 - 16:00 - Break



16:00 - 17:30 - Deployment and Operational Issues

Aarti Ananth, Motorola Consultant "VoIP Technology Mix - Which one fits where"

Sachin Natu, Redback Network "Strategies to deliver real time services like VoIP over Broadband"

Neil Dimalanta Quiogue, Telic.net, "Operational Issues and Challenges in VoIP"

Internet Routing and Backbone Operations Program
(held as an APRICOT 2004 Conference Track)
25 & 26 Feb 2004, Kuala Lumpur, Malaysia

- [HOSTS](#)
- [VENUE](#)
- [PROGRAM](#)
- [CALL FOR PAPERS](#)
- [FELLOWSHIP](#)
- [ABOUT APRICOT](#)
- [PAST APRICOTS](#)
- [ABOUT MALAYSIA](#)
- [ENTERING MALAYSIA](#)
- [TRANSPORTATION](#)
- [ACCOMMODATIONS](#)
- [SIGHT-SEEING](#)
- [SITEMAP](#)



Day 1 (25 Feb 2004)

11.00am - 12.30pm: Wireless Networking

- 11.00 - 11.45am: Danny Ng, Nortel Networks - Ad Hoc Networking with Wireless Mesh Technology
- 11.45 - 12.30pm: Simon Newstead, Juniper Networks - WiFi hotspot control architectures

2.00 - 3.30pm: Traffic Engineering

- 2.00 - 2.30pm: Arman Maghbouleh, Cariden Technologies - Metric-Based Traffic Engineering: Panacea or Snake Oil? A Real-World Study
- 2.30 - 3.00pm: John Evans, Cisco - Fast IGP Convergence in SP Backbone
- 3.00 - 3.30pm: Matthew Kolon, Juniper Networks - Bidirectional Forwarding Detection

4.00 - 5.30pm: Routing Technologies and Techniques

- 4.00 - 4.30pm: Danny McPherson, Arbor Networks - BGP: Good MEDs Gone Bad
- 4.30 - 5.00pm: Hong-Wei Kong, Agilent China - Verification of Zebra as a BGP instrument
- 5.00 - 5.30pm: Mark Williams, Juniper Networks -Recent developments in Multicast technologies for Media distribution

Day 2 (26 Feb 2004)

9.00 - 10.30am: Services on IP Networks (L2 and L3 VPNs)

- 9.00 - 9.45am: Andy Malis, Tellabs - Layer 2 (ATM and FR) transport over MPLS networks
- 9.45 - 10.30am: Kireeti Kompella, Juniper Networks - Virtual Private LAN Services

11.00am - 12.30pm: Services on IP networks (continued)

- 11.00 - 11.30am: Yogesh Jiandani, Cisco - InterAS MPLS VPN Overview
- 11.30am - 12.00pm: Ray Irani, Cisco - Building Next Generation Networks Using IP/L2TPv3 VPN Technology
- 12.00 - 12.30pm: Rajiv Asati, Cisco - Carrier Supporting carriers

2.00 - 3.30pm: Routing Experiences, operations and guiding principles

- 2.00 - 2.30pm: Robert Rockwell, Sprint - Tier 1 ISP routing architecture and principles
- 2.30 - 3.00pm: Donald Troshynski, Avici - Techniques and Protocols for Improving Network Availability
- 3.00 - 3.30pm: Vinai Sirkay, Reliance Infocomm - The Dos and Don'ts of designing a large Metropolitan Area Network

4.00 - 5.30pm: Panel Discussion (IP QoS and its Impact on Scalability)

- Panelists:
Arun Rajagopal, Reliance Infocomm
Robert Rockwell, Sprint
Travis O'Hara, Juniper Networks

APCAUCE Anti-Spam & Net Abuse Conference Program
(held as an APRICOT 2004 Conference Track)
26 Feb 2004, Kuala Lumpur, Malaysia

➤ **HOSTS**

➤ **VENUE**

➤ **PROGRAM**

➤ **CALL FOR PAPERS**

➤ **FELLOWSHIP**

➤ **ABOUT APRICOT**

➤ **PAST APRICOTS**

➤ **ABOUT MALAYSIA**

➤ **ENTERING MALAYSIA**

➤ **TRANSPORTATION**

➤ **ACCOMMODATIONS**

➤ **SIGHT-SEEING**

➤ **SITEMAP**



Program

9.00 - 10.30am Session 1. Keynote Speech - Dave Crocker, Brandenburg Internetworking (Introduced by James Lick, tcp.com / APCAUCE chair)

10.30 - 11.00am Break

11.00am - 12.30pm Session 2. Panel Discussion on DNS Blocklists and Asian ISPs
Moderator: Suresh Ramasubramanian, Outblaze Ltd / APCAUCE Coordinator)
Richard DG Cox, Spamhouse.Org
Syahrul Sazli, Jaring, MY

12.30 - 2.00pm Lunch

2.00 - 4.00pm Session 3. Regional Updates on Spam
Chair: Josh Rowe, AusPost Australia, APCAUCE Deputy Chair
MY - Shamsul Jafni Shafie, Malaysian Communications and Multimedia Commission
CN - Yu Xiao Li, Internet Society of China
NZ - David Harris, InternetNZ

SG - James Seng, InfoComm Development Authority of Singapore
USA - James Lick, tcp.com / Chair APCAUCE
AU - Andrew Maurer, National Office of the Information Economy
TW - Arthur Shay, Shay & Partners
KR - Jeonghye Choi, Internet Association of Korea / APCAUCE Secretariat
TH - Abhisak Chulya, IA Thai

4.00 - 4.30pm Break

4.30 - 5.30pm Session 4. Panel Discussion on RMX Records
Moderator: James Seng, Infocomm Development Authority of Singapore
Dave Crocker, Brandenburg Internetworking
Meng Weng Wong



Program
Speaker Profile

2nd IPv6 Summit in Asia Pacific (held as an APRICOT 2004 conference session)

26 Feb 2004
Kuala Lumpur, Malaysia

This track serves as a continuation to the initial Global IPv6 Summit in AP, staged parallel to APRICOT 2003 in Taipei. It also marks the establishment of the Asia Pacific IPv6 Task Force (APIIPv6TF), a regional task force currently made up of national IPv6 promotional and research groups from nine AP economies.

Sessions will provide a snapshot of IPv6 network services and application developments across the AP region. The track will culminate with a look toward the expected impact of IPv6 on Asian industry.

Program

- 9:00 **Opening Remarks**
 - Dr. Mohamed Awang Lah, CEO, Jaring, Malaysia
 - Asia Pacific IPv6 Task Force (APIIPv6TF) Introduction
 - Takashi Arano, IPv6 Promotion Council of Japan

Presentation [ppt, 55KB]

- 9:20 **Keynote Panel: APIIPv6TF Advisory Board Panel Session**
 This panel brings together the founders and leaders of regions major national IPv6 promotional organizations to discuss the establishment of the Asia Pacific IPv6 Task Force (APIIPv6TF) and its role in the of a regional IPv6 organization. strategy, collaboration and vision.
 Panel Coordinator:
 Jun Murai, President, IPv6 Promotion Council of Japan
 Panelists:
 Vincent WS Chen, Executive Secretariat, IPv6 Steering Committee
 NICI (National Information and Communication Initiative), Taiwan

Presentation [ppt, 891KB]

 Mohamed Awang Lah, CEO, Jaring, Malaysia

Presentation [ppt, 1,002KB]

 James Seng, Assistant Director, Enabler Technologies
 Technology Group, Infocomm Development Authority (IDA) of Singapore
 Reference:
 Liu Dong, Chairman, China IPv6 Council

Reference File [ppt, 1,307KB]

- 10:30 **Break**

- 11:00 **Session I: Network**
 20 min. presentations on IPv6 Network developments, trials and strategies from around the region.
 IPv6 Activities and Deployment Strategy in KT
 HyoungSoo Kim, Next Generation Internet Division
 Technology Lab. Korea Telecom. Korea

Presentation [ppt, 1,307KB]

 My6 Initiatives
 Parimalam Krishnamurthy, Assistant Manager, NEO
 Maxis Communications, Malaysia

Presentation [ppt, 2.59MB]

 MyREN Status Update
 Dr. Sureswaran Ramadess, University of Science Malaysia (USM), Malaysia

Presentation [ppt, 358KB] revised

 HiNet's IPv6 Trial Network
 Hong-Ren Lo, Network Engineer, Internet Services Department
 Data Communication Business Group, Chunghwa Telecom. Taiwan

Presentation [pdf, 8.13MB]

 KDDI's ADSL IPv6 Trial
 Toru Maruta, Manager, IPv6 Network Development Section,
 IP Network Department, KDDI Corporation, Japan

Presentation [pdf, 646KB]

- 12:30 **Lunch**

- 14:00 **Session II: Applications**
 20 min. presentations on the latest IPv6 applications from varied fields and economies.
 NEC's IPv6 Solutions
 Keiichi Imai, Group Manager, Business Development, NEC Corporation, Japan

Presentation [ppt, 2.54MB] revised

IPv6 Application Showroom for Business
Jaeho Lee, Senior Researcher, NCA (National Computerization Agency),
Korea
Presentation [ppt, 10.8MB]

IPv6 Video Conferencing Tools
Gopinath Rao Sinniah, Lecturer, Faculty of Engineering and Computer
Technology
Asian Institute of Medicine Science and Technology
Presentation [ppt, 1.287KB]

Perspective of IPv6 Applications in Taiwan 2004 (Tentative Title)
Han-Chieh Chao, Deputy Director, IPv6 R&D Division
NICI (National Information and Communication Initiative), Taiwan
Presentation [pdf, 3.44MB]

Reference
Samsung's IPv6 Digital World
Pyungsoo Kim Ph.D., Senior Researcher, Mobile Platform Lab
Digital Media R&D Center, Samsung Electronics, Korea
Presentation [pdf, 1.143KB]

15:30 Break

16:20 Session II: Applications (cont.)
20 min. presentations on the latest IPv6 applications from varied fields and
economies.
Micronode Applications
Masahiro Ibaragi, Micronode Group, Network Development Center
Yokogawa Electric Corporation, Japan
Presentation [pdf, 3.77MB]

16:40 Session III: Panel: Asian Industry and IPv6
IPv6 can connect not only computers but also all "objects" with each other in a
seamless way. By utilizing new networked "objects" and information retrieved from
these objects, new applications and new services will be developed to change
business and human processes in various industries such as automobile, home
electronics, medicine, agriculture, etc.

In this sense, one assumption of this panel is that IPv6 is one of the key items to
strengthen Asian economy and industries. The panel will discuss future perspectives
about how and in what industrial areas we can utilize IPv6.

Panel Coordinator
Kazuhiko Yamamoto, Internet Initiative Japan, Inc./WIDE Project
Panel Outline [pdf, 3.75KB]

Panelists
Han-Chieh Chao, Deputy Director, IPv6 R&D Division
NICI (National Information and Communication Initiative), Taiwan
Presentation [ppt, 450KB]
Masahiro Ibaragi, Micronode Group, Network Development Center
Yokogawa Electric Corporation, Japan
Jaeho Lee, Senior Researcher, NCA (National Computerization Agency),
Korea
Presentation [ppt, 5.86MB]
Hiroaki Sadata, IPv6 Promotion Council, Japan
Presentation [ppt, 798KB]
Norehan Yahya, General Manager, Network Architecture and Development
Maxis Communications, Malaysia

17:30 Closing

Asia Pacific Peering Program
(held as an APRICOT 2004 Conference Track)
26 Feb 2004, Kuala Lumpur, Malaysia

HOSTS

VENUE

PROGRAM

CALL FOR PAPERS

FELLOWSHIP

ABOUT APRICOT

PAST APRICOTS

ABOUT MALAYSIA

ENTERING MALAYSIA

TRANSPORTATION

ACCOMMODATIONS

SIGHT-SEEING

SITEMAP

9:00 - 10:30am: Track Opening: Introduction to the Internet Peering Ecosystem - The Evolution of the U.S. Peering Ecosystem

During the last few years there have been major disruptions in the U.S. Peering Ecosystem, leading to a new system of interconnections rising from the ashes. Recent research has identified several groups of operators, some survivors and some emerging players, each with similar motivations and observed behaviors. This presentation presents a nomenclature and lexicon to illustrate this evolution in the U.S., and also as a method to describe and understand the Asia Pacific Peering Ecosystem.

Track Chair: William B. Norton (Co-Founder and Chief Technical Liaison, Equinix, Inc.)

11:00-12:30 International Asia Pacific Peering

In this panel we will explore some of the challenges Peering Coordinators face as they build Internet infrastructure into and between Asia Pacific countries.

Nigel Titley - Commerical Peering Manager, FLAG
Erasmus Ng - Peering Coordinator, T-Systems
Twicky Cheung - Peering Coordinator, Asia Netcom

2:00-3:30 Regional Asia Pacific Peering

In this panel we continue the exploration of AP Peering but migrating from a regional to an in-country focus.

Akinori Maemura - Peering Coordinator, France Telecom: Peering Across Asia
James Spenceley - Peering Manager, Comindico: Peering in Australia
Tom Vest - Consultant: Peering in China

4:00-5:30 Exploration of Peering from the Content Provider Perspective

Brokaw Price - Peering Coordinator, Yahoo!: Peering from a Content Provider Perspective across Asia
Christian Nielson - Peering Coordinator, Microsoft/MSN: Peering into Asia
Sharad Sanghi - CEO, NetMagic Solutions: Peer Ecosystem Evolution in India

5:30-6:15 Peering Coordinator Social

build contacts, exchange cards, start peering across Asia discussions.

