

7th IPv6 Task Force Meeting

CITC
October 25th, 2009

Agenda



Start	End	Presentation
■ 08:30	09:00	Registration
■ 09:00	09:10	Introduction and Welcoming (Atheeb)
■ 09:10	09:20	Saudi Arabia IPv6 Strategy Update (CITC)
■ 09:20	10:00	IPv6 support in Microsoft Products and Services (Microsoft)
■ 10:10	10:30	Evolution Towards IPv6, STC High-level Plan (STC)
■ 10:30	11:00	<i>Tea Break</i>
■ 11:00	11:40	Enabling IPv6 Access (gogo6)
■ 11:40	12:00	BlueCoat IPv6 test lab results (BlueCoat)
■ 12:00	12:25	Task force members status update and discussion

Recap of Previous Meetings

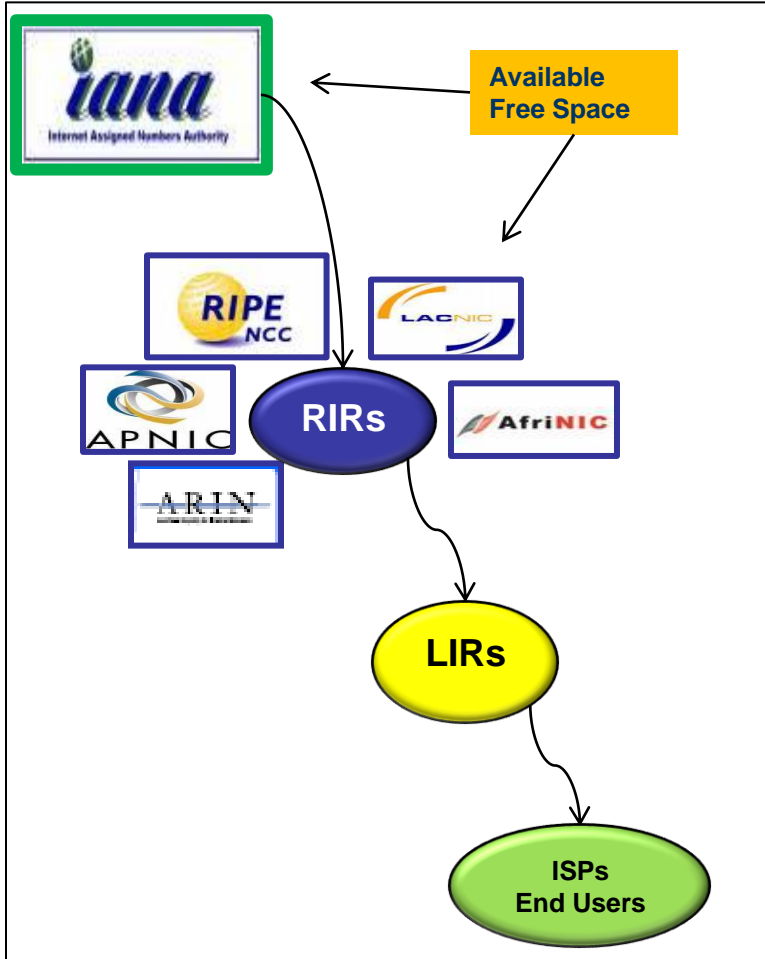
- Kick-off meeting of the National IPv6 Task Force (July 30, 2008)
- 2nd Meeting, September 21st, 2008 (CITC)
- 3rd Meeting, November 18th, 2008 (CITC)
- 4th Meeting, January 21st, 2009 (KACST)
- 5th Meeting, March 15th, 2009 (STC)
- 6th Meeting, May 17th, 2009 (Mobily)
- 7th Meeting, October 25th, 2009 (Atheeb)
- 8th Meeting, Q1 2010 ? (Sponsor Open)

- 2nd National Internet Event (Q2 2010 ?)

IPv6 Current State Assessment



IPv4 Address Delegation Hierarchy



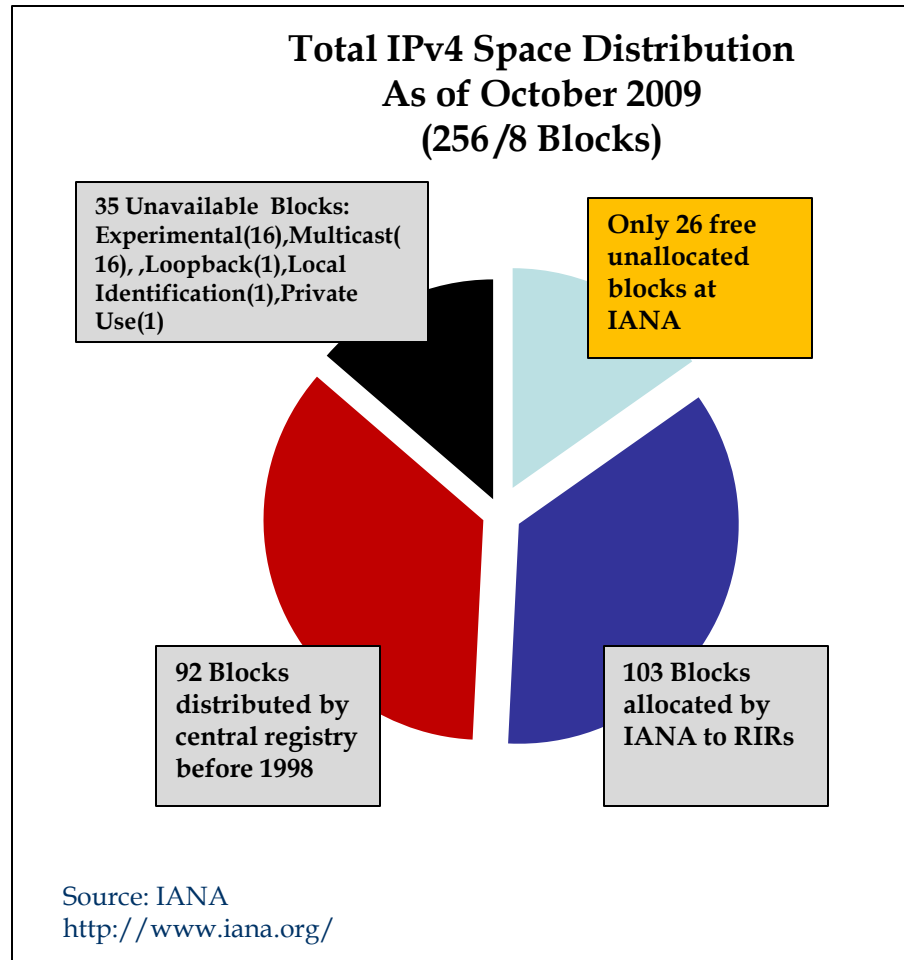
RIRs Geographical Scope



October 2009: 93 LIRs in KSA
(Source: RIPE NCC)



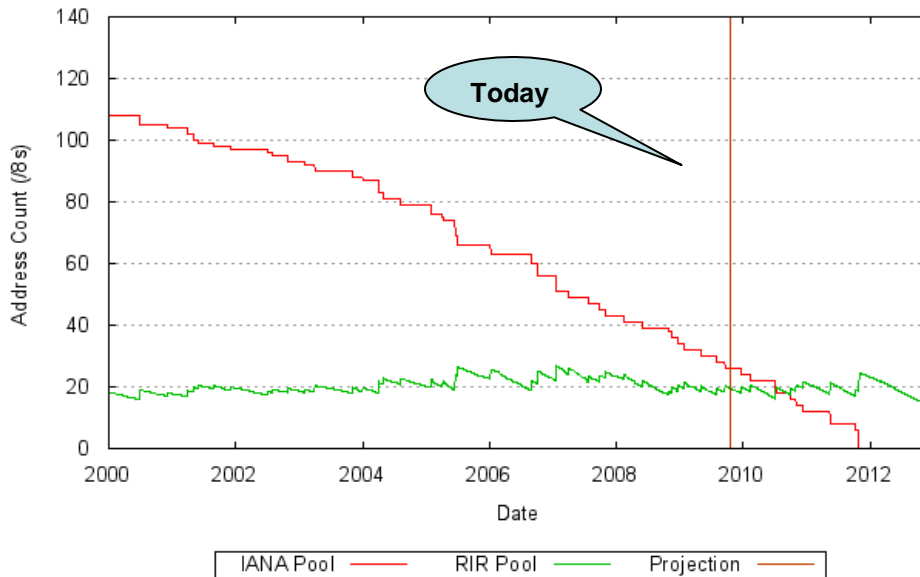
IPv4 Address Space Status



IPv6 Current State Assessment



IPv4 Depletion Predictions at IANA and RIRs



As of October 2009:

**Projected Depletion date at IANA:
October 2011**

**Projected Depletion date at RIRs:
January 2013**

Source:

**“The IPv4 Address Report”
By Geoff Huston**

<http://www.potaroo.net/tools/ipv4/>

IPv4 Exhaustion Counter

▼ Present status

Reserved blocks (IANA)

10%

28/256 blocks

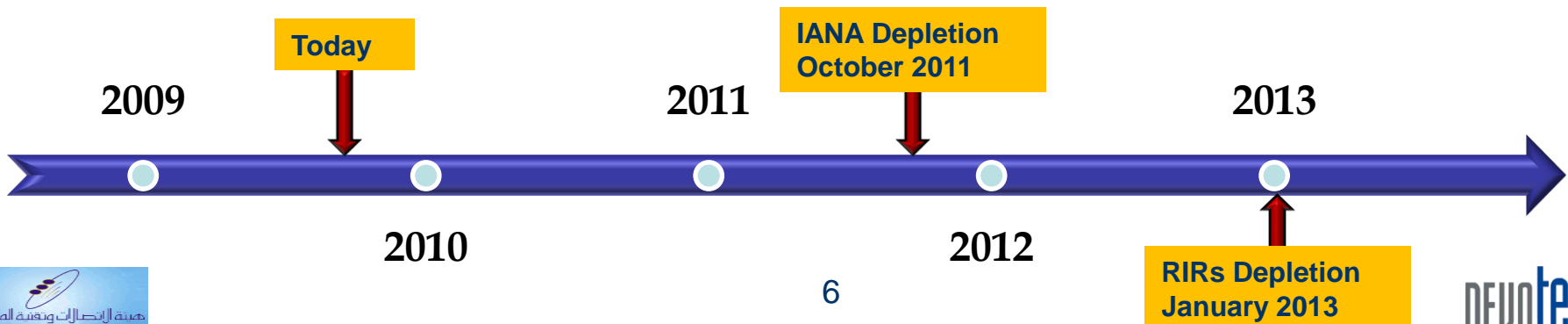
Until X-day (estimation)

740 days

Num of IPv4 Address

415,248,525

NetCore

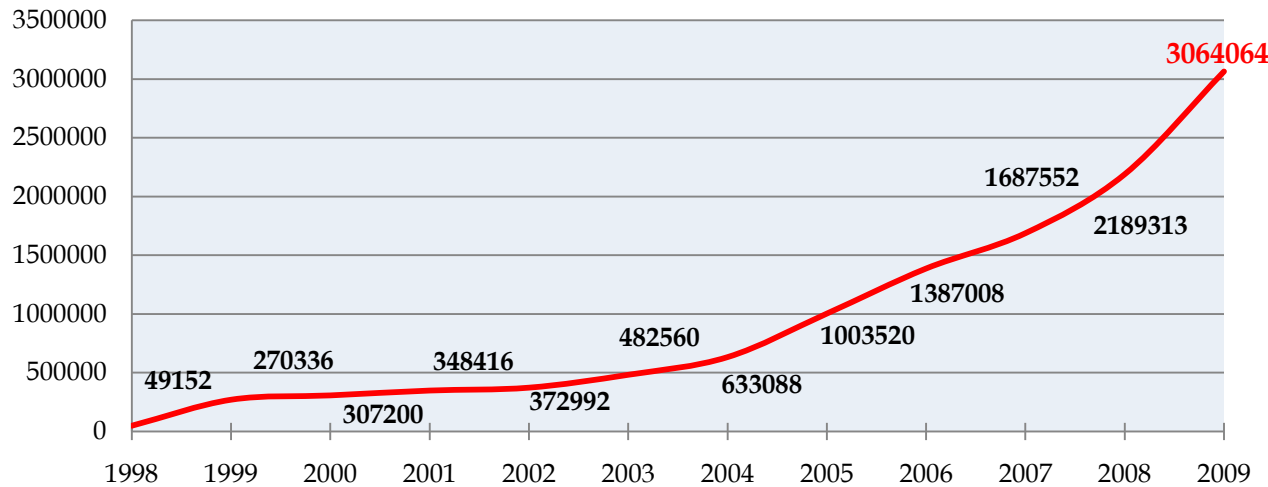


IPv6 Current State Assessment



IPv4 Status Locally

IPv4 Cumulative Status KSA
As of October 2009 - RIPE NCC



3.06 Million IPv4 Addresses -
October 2009

75.64 % Advertised

0.348 IPv4 Address Per Capita

(Source:
<http://resources.potaroo.net/iso3166/v4cc.html>)

IPv6 Status (Source: RIPE NCC):

KACST (2001:1490::/32)
STC (2001:16a0::/32)
ATHEEB (2a02:0888::/32)
Mobily (2a02:9b0::/32)
BAYANAT (2a02:ce0::/32)
SAHARA NETWORK (2a02:d70::/32)
AL Faisaliah (2a02:df0::/32)
SPSNET (2a02:fc0::/32)

Biggest IPv4 Allocations

Date	Size	LIR	Date	Size	LIR
20090218	/13	STC	19990128	/16	KACST
20080625	/14	STC	20030820	/16	Orbitnet
20090806	/15	Ettihad Etisalat	20050428	/16	Bayanat
20090624	/15	Atheeb	20050905	/16	STC
20050209	/15	Arabic Com. Sys	20061208	/16	STC
20060523	/15	Nesma	20070719	/16	AL Faisaliah
20080131	/15	STC	20071228	/16	Ettihad Etisalat

/13 block equates to 524,288 IPs

/14 block equates to 262,144 IPs

/15 block equates to 131,072 IPs

/16 block equates to 65,536 IPs

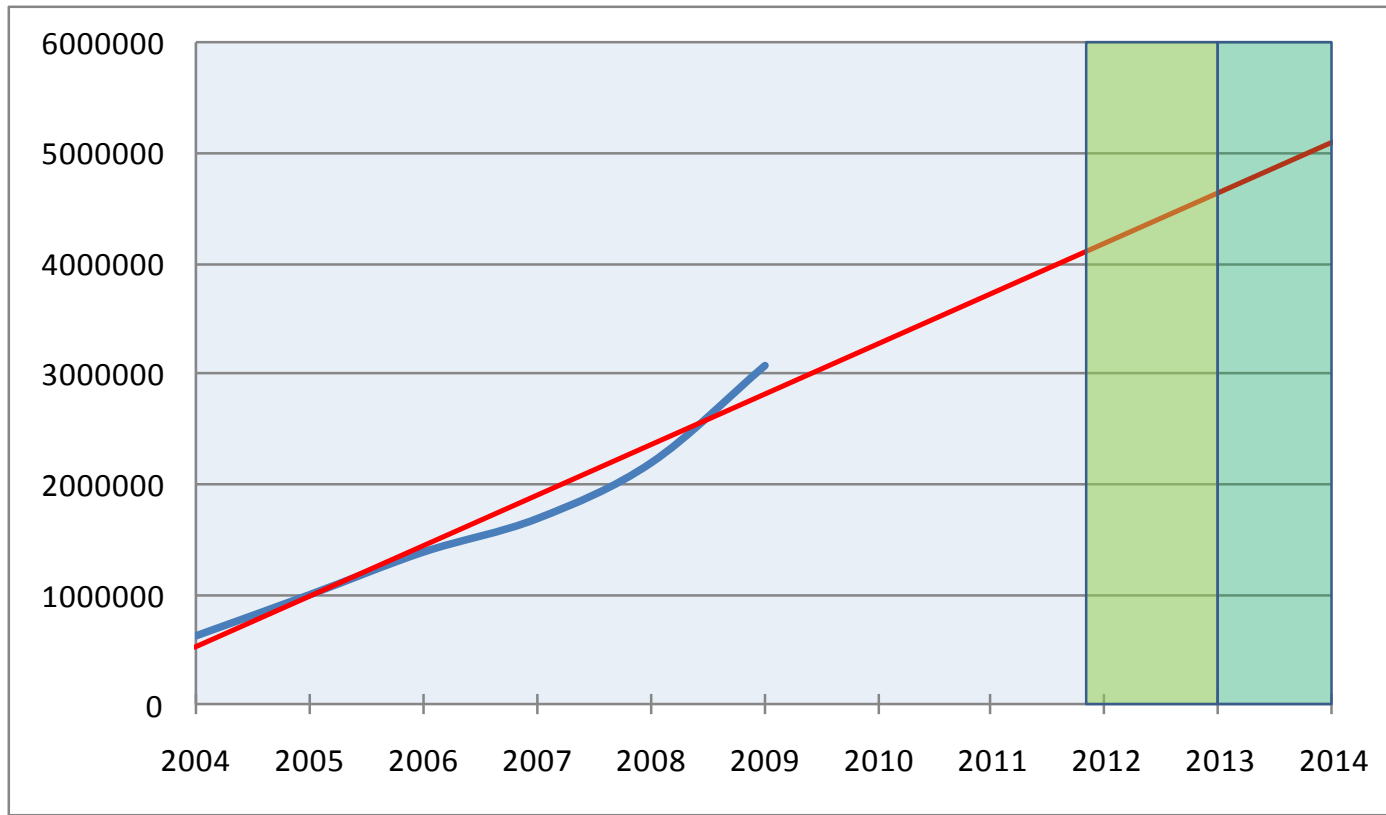
IPv6 Current State Assessment



KSA Allocation Forecast: 2010-2014

Linear Regression based on past data from: 2004-2009.

Assumptions: Same growth, no acceleration/deceleration



- Pre-Depletion Phase
< Oct. 2011
- Depletion Phase
Oct. 2011 - Jan. 2013
- Post-Depletion Phase
> Jan. 2013
- Actual IPv4 Allocation Status
- Linear Forecast of IPv4 Allocation (2013)

Proposed Objectives & Strategy Tracks



Strategy Tracks

Strategy Objectives

- Prepare for the IPv4 exhaustion by supporting IPv6 and ensure stability, business continuity and room for continued growth of the internet in Saudi Arabia
- Ensure a smooth adaption of IPv6 by stakeholders so as to minimize risks
- Raise overall IPv6 awareness nationwide by approaching stakeholders of both the public and private sectors highlighting the necessity to adopt IPv6

Infrastructure

- Five (5) Initiatives:
 - IPv6 Addressing
 - IPv6 Commercial Support for Nation Wide Infrastructure
 - .SA ccTLD IPv6 Compliance
 - IPv6 Compliant Internet Filtering
 - IPv6 Lab

Awareness

- Five (5) Initiatives:
 - IPv6 Task Force
 - Outreach Activities
 - International Cooperation
 - IPv6 Training
 - IPv6 Compliant Procurement

Milestones & Timeline



Milestone	Why?	Target Date	Note
Basic IPv6 Connectivity available at <u>ONE</u> FBPs	Essential and Enough to start offering IPv6 to ISPs and End Users	Early 2009	✓
IPv6 Task Force Saudi Arabia	Essential to raise awareness and encourage deployment	End of 2008	✓
Establish an IPv6 Lab	Establish and Disseminate practical IPv6 Experience	End of 2008	✓
IPv6 National Event	Raise awareness and encourage the IPv6 deployment	Early 2009	✓
IPv6 at <u>Multiple</u> FBPs	Important for ISPs and End Users to have more than one Choice	End of 2009	⌚
IPv6 Compliant.SA ccTLD Registry	Essential to run IPv6-only hosts or an IPv6-only infrastructure	End of 2009	✓ Pending connectivity
Commercial IPv6 Services available from Five (5) ISPs	More choices to end users	End of 2010	⌚



Thank You!