

62.180.128.0 195.38.128.16 2001:638::/35 193.0.0.203 211.213.192.100 193:0:0:2

Information bulletin for the members of the RIPE Network Coordination Centre

April 2005

The RIPE NCC Member Update is intended for LIR contacts.

If you are not the right person to receive this update, please forward it to the appropriate colleague.

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AfriNIC to Emerge as Fully Recognised Regional **Internet Registry**

At the time of going to print, it is expected that AfriNIC will gain full ICANN recognition at ICANN's meeting in Mar del Plata, Argentina, from 4 – 8 April 2005.

This would signify that AfriNIC has been formally recognised as the Regional Internet Registry (RIR) for the African and Indian Ocean region, assuming operations of the region previously managed by APNIC, ARIN and the RIPE NCC.

AfriNIC History

AfriNIC was first conceived at the INET '95 conference in Honolulu, Hawaii. The first public announcement of the plans to establish an African RIR was made in June 1997 and AfriNIC has been evolving ever since.

In 2003, AfriNIC development was aided by the training of AfriNIC staff at ARIN and the RIPE NCC. Around the same time, the RIRs' communities adopted an initial allocation policy for the African region and the first policy drafts were developed.

During 2004, AfriNIC became even more tangible as it was incorporated as a legal entity and held its

New RIPE NCC Standard Service Agreement

Over the last six months, the RIPE NCC has sent its revised Standard Service Agreement to members. As a result, there has been extensive communication with members regarding this new agreement

The reason for this increased communication is due to the fact that, during the RIPE NCC General Meeting, May 2004, the RIPE NCC members approved a new Clearing House Procedure, a new Standard Service Agreement and a new Standard Terms and Conditions for the RIPE NCC.

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first member meeting. AfriNIC IP Resource Analysts have been co-operating with the other RIRs in the evaluation of resource requests from the African region since then.

Transition to AfriNIC operations

At the end of 2004, preparations began for the last phase in AfriNIC's transition to becoming an RIR before full ICANN recognition. During this final phase, AfriNIC co-evaluated resource requests but registered and processed all data using its own infrastructure.

The RIRs assisted AfriNIC in preparing for this phase: a customer registry was built by ARIN, while the RIPE NCC adapted the Whois Database code to AfriNIC needs. Data was imported and reverse DNS zone content generation was co-ordinated between the relevant RIRs.

On 21 February 2005, the relevant registration data from the RIRs was transferred to AfriNIC and AfriNIC started evaluating requests using its own infrastructure. AfriNIC also became responsible for

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The mission of the RIPE NCC is to perform activities for the benefit of the membership; primarily activities that the members need to organise as a group, although they may compete with each other in other areas.

AfriNIC to Emerge as Fully Recognised Regional Internet Registry

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generating reverse DNS zone content for the address space it maintains allocations for.

The RIPE NCC transferred database objects for over 100 LIRs to AfriNIC. In this process about 12,000 objects were transferred from the RIPE Database to the AfriNIC Whois Database.

AfriNIC's future

Regional policy development is performed using open, bottomup processes and implemented by the RIRs. AfriNIC's service region will cover a landmass of 30,000,000 square km (the second largest on the planet) and it will provide service to a region of about 700,000,000 people with an enormous diversity of tradition, language and culture.



To reflect this diversity, the AfriNIC Board of Directors is composed of seven members, six of whom represent different regions of Africa.

At its next meeting in April 2005, the current AfriNIC draftpolicies will be presented to the community for approval. It is

Consultation on Whois Usage

The Whois protocol has been in use since the mid-1980s and there has been a RIPE Whois server since before the RIPE NCC was formed in 1992. Consequently, there is a long history to how address space and contact information are registered there.

It is a good idea to re-examine the practises used for IPv4 as IPv6 joins the network. IPv6 address space management will work differently.

At RIPE 49, Eva Ericsson Rabete from TeliaSonera, Sweden, asked the community to think about changing Whois registration for the new era:

http://www.ripe.net/ripe/meetings/ripe-49/presentations/ripe49ap-whois-ipv6.pdf

The issues discussed included:

Should residential users' networks be registered in Whois?

expected that these policies will be further refined to meet the needs of the African region.

AfriNIC and the RIPE NCC

The RIPE NCC is in the process of formally transferring its members from the African continent to AfriNIC. Members that are being transferred are contacted individually. AfriNIC and the RIPE NCC are co-operating to make this transition as smooth as possible.

The RIPE NCC and AfriNIC will remain in close contact and will continue to collaborate on issues of importance to their members.

The RIPE NCC welcomes AfriNIC to the RIR community, and wishes the AfriNIC staff and its customers every success.

More information

More information about AfriNIC is available form the AfriNIC website at: http://www.afrinic.net

The list of countries that make up the AfriNIC service region is available at: http://www.afrinic.net/about.htm

Information about the Number Resource Organization (NRO) and its support of AfriNIC, on behalf of the Regional Internet Registries, is available at: http://www.nro.net/

- How can LIRs know when to register a /48 network in Whois?
- How can LIRs assigning /64s be evaluated for a new allocation?
- How should the "country:" attribute be used?

Eva was asked to take the discussion on to the RIPE Address Policy Working Group's mailing list and has been drafting a document to start discussion there. It will be published in the next few weeks.

Everyone is welcome to take part in RIPE community discussions, including End Users, LIRs, governments and regulators. If you want to contribute, you can do so by subscribing to the <address-policy-wg@ripe.net> list at: http://www.ripe.net/mailman/listinfo/address-policy-wg

The mailing list archive is available at:

http://www.ripe.net/ripe/maillists/archives/address-policywg/index.html •

New RIPE NCC Standard Service Agreement

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Following changes made to these documents, the RIPE NCC replaced the existing Standard Service Agreement with a revised version for all current RIPE NCC members. The RIPE NCC has been sending the new Standard Service Agreement to its members to sign and return to the RIPE NCC.

As this affects more than 3,600 members, based in more than 90 countries, this has been a time-consuming and complicated process. In order to allocate internal RIPE NCC resources in an effective way, an inter-departmental project team was created. New software was written, postal addresses were verified and/or updated and logistics were arranged.

In addition, a dedicated e-mail account for our members was created. Spread over a period of four months, the new agreements were sent to over 3,600 members.

The project provided an added benefit as it also gave the RIPE NCC the opportunity to update outdated address and contact details for our members. Over 800 postal addresses have been updated in the process.

Currently, six months after the start of this project, 65% of our members have returned their signed agreements. We thank all our members for their co-operation in returning the signed Standard Service Agreement.

For those members who have not yet returned their signed contracts, we kindly ask you to return a signed copy as soon as possible.

Further information about the new RIPE NCC Standard Service Agreement and the changes made to the document is available at:

http://www.ripe.net/contracts

If you have any questions, or if you have not received the agreement, please contact us at: •

RIPE NCC Annual Report 2004

The RIPE NCC Annual Report 2004 will soon be published and available online at:

http://www.ripe.net/ripe/docs/ar2004.html

Independent Report Confirms RIPE Routing Registry a Useful Tool for Network Operators

A recent independent report by Georgos Siganos and Michalis Faloutsos at the University of California, Riverside has concluded that, for 97% of prefixes, it is possible to validate their origin Autonomous System (AS) using the RIPE Routing Registry.

Additionally, it was found that, for 60% of the networks, their policy is fresh and can be used to check their routing for abnormal routing behaviour.

The full report is available at: http://www.cs.ucr.edu/~siganos/papers/security.pdf

The RIPE Routing Registry, part of the RIPE Whois Database, contains Autonomous Sytem Number objects, "route" objects, and other related objects used to describe Border Gateway Protocol (BGP) routing policy.

The RIPE NCC offers one-day Routing Registry training courses. It is one of the advanced, technical courses that the RIPE NCC offers to its members. The course provides a hands-on introduction to the Internet Routing Registry (IRR) use, related tools and RPSL (Routing Registry Specification Language). The course is meant for network operators and engineers who wish to make use of the Routing Registry for router configuration and troubleshooting.

Routing Registry Training Courses in the first half of 2005 will be held in Amsterdam (15 April), St Petersburg (22 April), London (18 May) and Paris (17 June).

To register for any of these courses, please use the online registration form available on the RIPE NCC LIR Portal: https://lirportal.ripe.net/lirportal/index.html

Note: You must be logged in to the Portal to fill out the online registration form.

More information about the RIPE NCC's Routing Registry course is available at: <u>http://www.ripe.net/training/rr/</u>

RIPE Whois Database

Information on the latest developments of the RIPE Whois Database is available from: http://www.ripe.net/db/news/_____

An overview of the support offered for RIPE Whois Database users is available from: http://www.ripe.net/db/support/

An Update on IPv6 Deployment

Worldwide deployment of IPv6 addresses began in July 1999, following several years of development. Regional Internet Registries (RIRs) are responsible for address allocation. Generally they only give IPv6 address space to organisations in a position to immediately deploy an IPv6 infrastructure and provide IPv6 services in the near future.

Although IPv6 provides an extremely large pool of address space, address policies should avoid wasteful practices. Requests for address space need supporting documentation and stockpiling of unused addresses should be discouraged. Unlike with IPv4, RIRs currently assign IPv6 address space in fixed amounts (e.g. /48). The actual usage of addresses within each assignment will be low when compared to IPv4 assignments. In IPv6, "utilisation" is only measured in terms of the bits to the left of the /48 boundary. In other words, "utilisation" refers to the assignment of /48s to End Sites and not the number of addresses assigned within individual /48s at those End Sites. RIRs must apply procedures that reduce the possibility of fragmented address space that may lead to a loss of routability. RIRs apply a minimum size for IPv6 allocations to assist with prefix-based filtering. The minimum allocation size that RIRs make for IPv6 address space is /32.

In Europe, the RIPE NCC allocated the largest block of IPv6 addresses to date to Deutsche Telecom. The allocation was many times larger than the total number of addresses currently available on the entire Internet. By the end of January 2005, the RIPE NCC had made 437 allocations of IPv6 address space including 51 assignments to Internet Exchange Points.

Ways that IPv6 addresses seem likely to be assigned would be according to geographical location and network topology. One proposal is that the first byte might pinpoint the address to a continent. The next could narrow that down to a specific nation. The third might work on a state and provincial level. A fourth could identify the ISP responsible for assigning the remaining 12 digits of the IP address within that region.

There is some opposition to the administration and allocation of IPv6 addresses regionally through the RIRs. End Users point to conflicting rules, fees and requirements, something that is vital to tackle. Routers are located geographically and the way of allocating regionally helps simplify routing tables. The RIRs were initially only given 4 or 6 /8 space and thus had far less freedom when giving out space.

Although IPv6 is deployed worldwide today, some of the early interest came from the Far East. In the autumn of 2000, the Japanese government announced that it would actively pursue solutions for global issues on the Internet. It set 2005 as the deadline for the upgrading of existing systems in every business and public sector to IPv6. An IPv6 Promotion Council was established with members from the public and private sectors. The programme assumed that for "net home appliances" connected to the Internet, each would need an IP address. Japan sees IPv6 as one of the ways of helping the country use the Internet to revive its economy. There are pilot projects that rely on IPv6 technology and its ability to let devices keep their addresses as they switch from network to network. One such project was launched in February 2001 in Yokohama. Around 300 vehicles, ranging from taxis and service trucks to public buses were continuously connected to the Internet. This project allowed users to monitor traffic conditions by detecting their car's speed, road conditions by how many times they used the anti-lock brake system and the weather by the movement of the windshield wipers.

On 22 February 2001, the Republic of Korea followed Japan by announcing plans to roll out IPv6. China and Japan have held joint talks to promote IPv6.

Elsewhere, the United States launched an initiative towards the establishment of a North American IPv6 Task Force in December 2001. In contrast to the Asia-Pacific region, the commercial rollout of IPv6 in the European Union (EU) was marginal, limited to test beds. This motivated the European Commission to launch its industry-led IPv6 Task Force in April 2001. It includes a broad range of representatives from the mobile communications and Internet industries. On 29 January 2002, the IPv6 Task Force released its report, 'IPv6 2005 Roadmap Recommendations: Internet for everyone'. The report proposed a number of recommendations to the EU Member States, the European Commission and industry at large. It goes beyond the action needed to structure, unite and combine European efforts on IPv6 and calls for:

- Increased support towards IPv6 in public networks and services;
- The establishment and launch of educational programmes on IPv6;
- The adoption of IPv6 through awareness raising campaigns;
- The continued stimulation of the Internet take-up across the EU;
- An active contribution towards the promotion of IPv6 standards work;
- The integration of IPv6 in all strategic plans concerning the use of new Internet services.

Although IPv6 appears to be superior to IPv4 in many respects, it is a common industry opinion that the transition from IPv4 to IPv6 will be long (perhaps more than a decade) and difficult. Many organisations have made large investments in IPv4 technology. They may not yet be willing to speed up the transition. IPv4 is a well-known and thoroughly tested technology. Its reliability and its widespread use represent a major slowing factor in the development of IPv6.

RIPE Meetings

Next RIPE Meeting: RIPE 50

The RIPE 50 Meeting will take place from 2 – 6 May 2005 at the Clarion Hotel in Stockholm, Sweden.

New at RIPE 50

Still RIPE @ 50

Following comments from RIPE Meeting attendees and members of the RIPE Working Groups, the RIPE Working Group Chairs and the RIPE Chair have proposed a new structure for RIPE Meetings. As a result, the

program for RIPE 50 has been modified so that all presentations will be given during the first three days in a single stream. The last two days will be dedicated to the RIPE Working Groups.

This RIPE meeting will see the introduction of day tickets for those who are unable to attend the full meeting. Preregistration for day tickets and/or the full RIPE Meeting ticket is advised.

More information about the upcoming RIPE 50 Meeting is available at:

http://www.ripe.net/ripe/meetings/ripe-50/

Upcoming RIPE Meetings

RIPE 50: 2 - 6 May 2005, Stockholm, Sweden RIPE 51: 10 - 14 October 2005, Amsterdam, the Netherlands

Next RIPE NCC General Meeting

The next RIPE NCC General Meeting (GM) will be held adjacent to RIPE 50 in Stockholm, Sweden, and will take place on Thursday, 5 May 2005 from 17:00.

In previous years, the RIPE NCC has presented its organisational updates in the RIPE NCC Services Working Group and at the RIPE NCC GM. In order to prevent this duplication of presentations, it was decided to move the RIPE NCC GM so that it would follow the RIPE NCC Services Working Group. The updates from the RIPE NCC will be given at the end of the RIPE NCC Services Working Group, which will then be directly followed by the RIPE NCC GM.

The RIPE NCC GM will be open to members and nonmembers, but only RIPE NCC Members who have registered in advance will be entitled to vote.

More information about RIPE NCC General Meetings is available at: http://www.ripe.net/membership/gm/

RIPE NCC Membership Survey 2005

In the summer of 2002, the RIPE NCC commissioned KPMG Consulting to carry out an independent survey of the RIPE NCC members and stakeholders. This was the second RIPE NCC survey in the organisation's history and the first to be conducted by an independent organisation. Responses to the survey were processed by KPMG without revealing identities or sources. The focus of the survey was to give the membership and stakeholders a formal opportunity to voice their opinions on the services provided by the RIPE NCC. Subsequently, the RIPE NCC has implemented many of the suggestions that resulted from the survey.

To assess the current activities and services provided by the RIPE NCC, it has again commissioned KPMG, represented by Dr. John Earls, to carry out a 2005 Membership Survey. This survey will be conducted in a different manner than the 2002 survey, with the biggest change being fewer workshops taking place across the RIPE NCC service region. Instead, members will be able to download the survey and send their responses directly to Dr. Earls. This will ensure anonymity, enabling members to confidently evaluate the current and future services of the RIPE NCC.

The 2005 Membership Survey will be split into two sections. The first section will ask respondents to assess the present services offered by the RIPE NCC. The second section will address what members perceive to be the future priorities for the RIPE NCC in the allocation of resources for services and activities.

Based on the outcome of the 2005 survey, and in close interaction with the members and stakeholders, the RIPE NCC will continue to improve its operational quality and organisational structure. The results of the survey are scheduled to be made public in July 2005.

RIPE NCC Activity Plan and Budget 2005

The RIPE NCC Activity Plan and Budget for 2005 was approved by the RIPE NCC Executive Board in December 2004.

The RIPE NCC Activity Plan is available at: http://www.ripe.net/ripe/docs/ap2005.html

The RIPE NCC Budget is available at: http://www.ripe.net/ripe/docs/budget2005.html •

APNIC Update

Asia Pacific discussions on Internet governance

APNIC is currently supporting a project by the Asia-Pacific Development Information Program (APDIP) called the Open Regional Dialogue on Internet Governance (ORDIG).

ORDIG's major activities include a multi-stakeholder survey and a community-managed portal on Internet governance priorities for the region, as well as research on best practice policies and the development of Internet governance training materials.

The UNDP-APDIP Asia Pacific Internet governance portal is at: http://www.igov.apdip.net

ERX project completed

In December 2004, APNIC finished importing all appropriate records from the ARIN database under the Early Registration Transfer (ERX) project.

ERX is a coordinated, cross-RIR effort to move whois records for address space registered before the advent of the RIRs into the whois database of the RIR in whose region the registrant is based.

The coming emergence of AfriNIC is likely to require a small ERX-like transfer process. ${\ensuremath{\bullet}}$

Membership Category Study

In an effort to gain greater insight into the make-up of our membership, the RIPE NCC recently launched a membership study focusing on the industries with which they are associated.

On Thursday, 17 February 2004, a short pop-up questionnaire became visible on the LIR Portal when members logged onto the site. Members were asked to categorise themselves by various industry groups. The main categories included ISP, ISP GPRS, Telecom, Media, Academic, Medical, Logistics, Banking, Government, Not-For-Profit and Other.

If you have not yet categorised your organisation, please visit the LIR Portal to do so. The form only takes a few seconds to complete.

Information gleaned from the survey results will act as a reference guide for the RIPE NCC in determining the best ways to enhance outreach efforts towards specific industries.

NRO Response to ICANN Draft Strategic Plan

The Number Resource Organization (NRO), on behalf of the Regional Internet Registries (RIRs), has responded to the draft strategic plan recently published by ICANN.

The NRO's comments on the draft strategic plan focused on four main areas:

- Important aspects of the draft plan that require RIR input and agreement
- Inaccuracies in the plan that are directly relevant to IP number resources
- Budget and financing issues
- Inconsistent descriptions of the ICANN mission

The NRO response to the ICANN draft strategic plan is available at:

http://www.nro.net/documents/nro21.html •

The Number Resource Organization (NRO) Executive Council

As of 1 January 2005, the NRO Executive Council (EC) consists of:

- Chairman: Axel Pawlik (RIPE NCC)
- Secretary: Raúl Echeberría (LACNIC)
- Treasurer: Ray Plzak (ARIN)
- Member: Paul Wilson (APNIC)

The above positions will be rotated on an annual basis along with the NRO secretariat role that is residing at LACNIC during 2005.

The RIPE NCC performed the role of NRO and ASO secretariat during 2004.

RIPE NCC Roundtable Meetings



The RIPE NCC holds Roundtable Meetings to discuss Internet management issues relevant to governments, regulators and industry partners.

The most recent meeting was the RIPE NCC Roundtable for Governments and Regulators. The meeting took place on Wednesday, 30 March 2005 in Amsterdam.

The next RIPE Roundtable is expected to take place alongside the ICANN meeting in July.

More information is available at: <u>http://www.ripe.net/meetings/roundtable</u> •



Current Policy Developments in RIPE

The RIPE Policy Development Process

Following the presentation by RIPE Chair, Rob Blokzijl, at RIPE 49, a draft document has been published on the RIPE Draft Documents web page. The document is meant to formalise and document the RIPE Policy Development Process (PDP). It defines the procedures to be followed when setting policies affecting the RIPE community, together with timelines and responsibilities of those involved. It is hoped that by having the PDP formalised, the community will find it easier to participate in policy discussions.

The RIPE Policy Development Process draft document can be found at:

http://www.ripe.net/ripe/draft-documents/pdp.html

The draft is still open for comments. You can send your feedback to <ripe-pdp@ripe.net> by subscribing to this list at: http://www.ripe.net/mailman/listinfo/ripe-pdp

HD Ratio for IPv4

Use of the HD ratio to measure IPv4 usage was raised at RIPE 48 with a presentation by Paul Wilson, Director General, APNIC: <u>http://www.ripe.net/ripe/meetings/ripe-48/presentations/ripe48-ap-hd-ratio.pdf</u>

HD ratio utilisation was further discussed on the RIPE Address Policy Working Group mailing list following RIPE 48 and a policy proposal was posted to the list. The proposal suggests changing the current policy criteria to receive an additional IPv4 allocation and set it to use the HD ratio to measure IPv4 usage. The proposal uses the template proposed by the draft for RIPE Policy Development Process (see above) and can be found at: http://www.ripe.net/ripe/maillists/archives/address-policywg/2005/msg00020.html

IP Assignments for Anycasting DNS Servers

The discussion on allowing special IP assignments to enable zone operators to anycast some of their DNS servers was restarted at RIPE 47 and has continued on the RIPE Address Policy Working Group mailing list. It is expected that there will be a policy proposal sent to the RIPE Address Policy Working Group mailing list soon.

IPv6 Initial Allocation

Following presentations and discussions at RIPE 48, there was consensus that the initial allocation criteria for IPv6 should be further discussed. A presentation on changes to initial IPv6 allocation criteria made at RIPE 49 can be found at: http://www.ripe.net/ripe/meetings/ripe-49/presentations/ripe49-ap-ipv6-criteria.pdf

Following this presentation, there was an action point on the RIPE Address Policy Working Group list to have a proposal to realise a change in the policy. It is expected that such a proposal will be circulated to the mailing list soon.

IANA to RIR IPv6 Allocations

A draft proposal has been published on the RIPE Draft Documents web page describing the policy governing the allocation of IPv6 address space from the IANA to the RIRs in August 2004. The proposal can be found at: <u>http://www.ripe.net/ripe/draft-documents/ipv6.html</u>

As this is a common proposal, consensus for it is sought in all regions. There seems to be a common agreement that the current allocation principles for IPv6 from IANA to RIRs should be improved. However, the specifics of this proposal are still under discussion.

This proposal was also discussed during RIPE 49. As a result, there is now an action point in the RIPE Address Policy Working Group agenda to pursue further discussions on the mailing list. An integrated document summarising the discussions is being written in the LACNIC region. It is expected that this document will be circulated in the RIPE Address Policy Working Group mailing list soon.

You can subscribe to the RIPE Address Policy Working Group mailing list at:

http://www.ripe.net/mailman/listinfo/address-policy-wg

An archive of this mailing list is available at: http://www.ripe.net/ripe/maillists/archives/address-policywg/index.html •

Regional Meetings 2005

In 2004, the RIPE NCC held two successful Regional Meetings in Moscow and Nairobi. To continue evaluating and addressing the changing needs of RIPE NCC members across our service region, the RIPE NCC will hold two Regional Meetings in 2005. Due to the issues that arose from the Regional Meeting in Moscow, we have decided to hold a follow-up meeting on 17 June 2005 in Kazan, Russia. This will enable us to evaluate and discuss the changes that have taken place since June 2004. We will visit the Middle East region towards the end of the year, and a date and location will be announced at a later stage.

Regional Meetings help the RIPE NCC to initiate local contact and support, and to gather valuable input and comments from members in particular areas of its service region. Regional Meetings also bring the RIPE NCC closer to its members who are not able to participate in RIPE Meetings, providing a perfect opportunity for establishing direct contact and promoting open dialogue. Additionally, the Regional Meetings bring members from a specific region closer to the RIPE community and encourage their participation in RIPE Meetings, RIPE Working Groups and the policy-making process.

RIPE NCC Training Courses

LIR Training Courses

Sarajevo, Bosnia and Herzegovina Friday, 1 April 2005

Amman, Jordan Monday, 4 April 2005

Amsterdam, the Netherlands Wednesday, 13 April 2005

Kiev, Ukraine Friday, 15 April 2005

London, United Kingdom Thursday, 19 May 2005

London, United Kingdom Friday, 20 May 2005

Prague, Czech Republic Friday, 27 May 2005

Munich, Germany Friday, 3 June 2005

Poznan, Poland Friday, 10 June 2005

Sochi, Russia Friday, 24 June 2005

Routing Registry Training Courses

Barcelona, Spain Friday, 18 March 2005

Amsterdam, the Netherlands Friday, 15 April 2005

St Petersburg, Russia Friday, 22 April 2005

London, United Kingdom Wednesday, 18 May 2005

Paris, France Friday, 17 June 2005

DNSSEC Training Courses

Amsterdam, the Netherlands Thursday, 14 April 2005

Brussels, Belgium Friday, 13 May 2005

Conference Calendar

Conferences and meetings that may be of interest to RIPE NCC members:

April 2005

ICANN Meeting Mar del Plata, Argentina

ARIN and NAv6TF Orlando, Florida

3rd Meeting of the WGIG Geneva, Switzerland

AfriNIC II Maputo, Mozambique

May 2005

RIPE 50 Stockholm, Sweden

INET 2005 Cairo, Egypt

June 2005

Global IPv6 Summit Barcelona, Spain

4th Meeting of the WGIG Geneva, Switzerland

LACNIC VIII Lima, Peru

July 2005

ICANN Luxembourg City, Luxembourg 11 - 15 July 2005

IFTF 63 Paris, France http://www.icann.org/meetings/ 4 - 8 April 2005

http://www.arin.net/membership/meetings/index.html 17 - 21 April 2005

http://www.wgig.org/ 18 - 20 April 2005

http://www.afrinic.net/events.htm 25 - 27 April 2005

http://www.ripe.net/ripe/meetings/ripe-50/ 2 - 6 May 2005

http://www.isoc.org/isoc/conferences/inet/ 8 - 10 May 2005

http://www.ipv6-es.com/05/in/i-index.php 6 - 10 June 2005

http://www.wgig.org/ 14 - 17 June 2005

http://lacnic.net/en/eventos/index.html 27 - 30 June 2005

http://www.icann.org/meetings/

http://www.ietf.org/meetings/meetings.html 31 July - 5 August 2005

September 2005

3rd Meeting of the Preparatory Committee (PrepCom-3) TBD http://www.itu.int/wsis/preparatory2/calendar.html