IANA Numbers Function Update

Elise Gerich ICANN, VP, IANA Functions PTI, President

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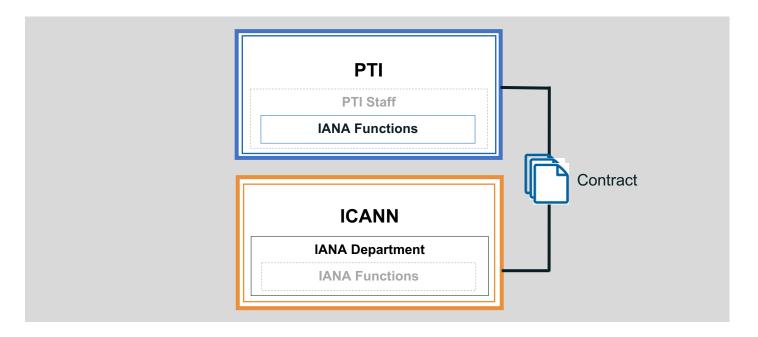
ICANN | IANA Functions

Update on IANA Numbers Function

- What is PTI?
- Who do you contact?
- IPv4 Recovered Pool Allocations
- Performance
 - Third Party Audit
 - Monthly Reporting

What is PTI?

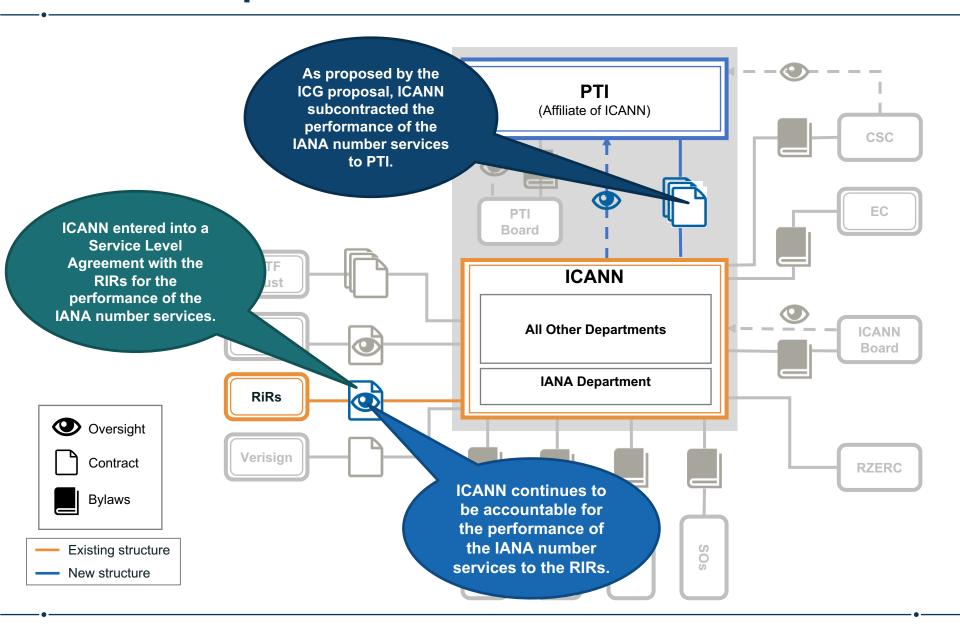
Public Technical Identifiers (PTI) is an affiliate of ICANN that is responsible for performing the IANA functions and delivering the IANA Services, on behalf of ICANN.



PTI implements agreed policies and principles developed by the ICANN multistakeholder community.

ICANN employees are seconded to PTI to deliver the IANA Services.

Relationship between RIRs and PTI



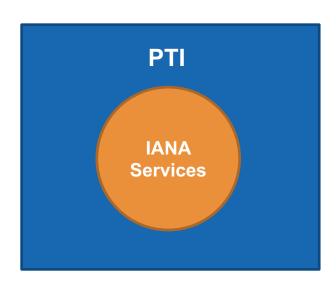
Who Do I Contact?



Who do I contact?

I have a question about the IANA services, who do I contact?

To find governance documents, directors, agreements, and meetings of PTI, visit pti.icann.org.



To find the operational reports of the IANA services, including deliverables and information on the IANA functions visit iana.org.

Operational questions can still be sent to:

iana@iana.org

PTI staff will receive emails sent to either an ICANN or IANA email address:

elise.gerich@icann.org or elise.gerich@iana.org

Instruction Page for Number Requests

About IANA

Introduction to IANA
Performance Reporting

Procedures

Presentations

Public Reports

Framework Documents

Reviews

Audits

Excellence & Quality

Glossary of terms

Contact us

http://www.iana.org/help/inr-request-procedure

Making Internet Number Resource Allocations to Regional Internet Registries

IPv4 Address Allocations

When an RIR has less than half a /8 in its inventory it should notify ICANN to begin allocations to all the RIRs from the Recovered IPv4 Pool. This is a one-time event, as allocations are made on a schedule and not in response to specific requests from each RIR; only one RIR needs to make the request for ICANN to begin allocation to all RIRs. Notification that an RIR has less than half of a /8 in its inventory should be sent to ipv4-request@iana.org.

The formula for distributing addresses from the recovered pool can be found at ICANN's website.

IPv6 Address Allocations

RIRs requesting additional IPv6 address space because they have less than 50% of a /12 need to provide ICANN with a summary of how much IPv6 address space the RIR has allocated and/or reserved and how much is fragmented. The request and the summary documenting the distribution of the allocated space should be submitted in the spreadsheet template to ipv6-request@iana.org.

An RIR requesting additional IPv6 address space because it does not have enough space for the next nine months must provide ICANN with the amount of address space allocated by the RIR in each of the last six months. The request and the summary should be submitted in the spreadsheet template to ipv6-request@iana.org.

The formula for determining eligibility for additional IPv6 allocations can be found at ICANN's website.

AS Number Allocation

An RIR requesting additional AS Numbers because it has assigned/allocated over 80% of its last block of AS Numbers needs to provide a summary of assignments/allocations it has made. If the RIR is requesting more than one block of AS Numbers, it needs to provide a usage summary for the six months prior to the request. Requests for additional AS Numbers should be submitted in the spreadsheet template to asn-request@iana.org.

An RIR requesting additional AS Numbers because the number of free AS Numbers it holds is less than two months needed, must provide a usage summary for the six months prior to the request. Requests for additional AS Numbers should be submitted in the spreadsheet template to asn-request@iana.org.

The global policy for allocation of AS numbers can be found at ICANN's website.

IPv4 Recovered Pool



IPv4 Recovered Pool Allocation

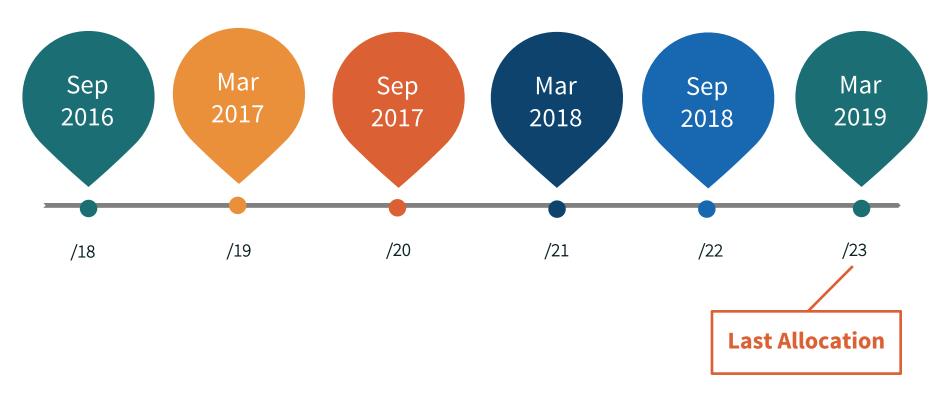
- Registry: http://www.iana.org/assignments/ipv4-recovered-address-space
- Allocation tool:
 https://github.com/icann/ipv4-recovery-algorithm
- ⊙ Global policy: https://www.icann.org/resources/pages/allocation-ipv4-post-exhaustion-2012-05-08-en

ARIN Allocation – 1 March 2017

-> **ARIN**:

| 160.19.44.0/22 | 1024 |
|-----------------|------|
| 160.19.92.0/22 | 1024 |
| 160.19.152.0/22 | 1024 |
| 160.19.160.0/22 | 1024 |
| 160.20.20.0/22 | 1024 |
| 160.20.208.0/22 | 1024 |
| 162.12.224.0/21 | 2048 |
| Total | 8192 |

IPv4 Recovered Pool Allocation



If we do not receive additional returned addresses, the last allocation from the recovered pool will take place in March 2019.

Performance



Third Party Systems Audit

- Successful completion of its Service Organization Control (SOC) 3 audit of the RZ KSK System.
 - Completion of 6th annual SOC3 audit
- Completed the Service Organization Control (SOC) 2 audit of the IANA Registry Maintenance Systems with no exceptions.
 - ⊙ 3rd year of SOC2 annual audit
- Audits are conducted annually and help us to constantly monitor and improve our systems
- https://www.iana.org/about/audits

Example of Draft Monthly Report

Number Resource Performance

July 2016

Performance Summary

These performance targets are derived from section 4.3 of the Service Level Agreement for the IANA Numbering Services for the allocation of unicast IP addresses and AS numbers to the five Regional Internet Registries.

- Requests acknowledged on time (100%)
- Responded on time (100%)
- Implemented on time (100%)
- Implemented accurately (100%)

Individual Requests to Regional Internet Registries

| Date | Request Type | Request Processing Details | | |
|------------|-----------------|----------------------------|---|-----------|
| 2016-07-29 | AS Number Block | 2016-07-26 12:35:54 | Request received from RIPE NCC | Less info |
| | | 2016-07-27 16:51:10 | Request acknowledged Acknowledged on time (within 2 business days) | |
| | | 👸 2.2 business days | | |
| | | 2016-07-29 22:22:08 | Implemented using resource(s) 64396-64495,204288-205211,204288-205211,206236-207259 ⊙ Implemented on time (within 4 business days) ⊙ Implemented accurately | |

Thank You! Questions?

Elise Gerich March 2017