ARIN 46

14 - 15 OCTOBER,
23 OCTOBER 2020

Recommended Draft Policy ARIN-2020-3: IPv6 Nano-Allocations

Andrew Dul

History

Proposal	18 February 2020
Draft Policy	24 March 2020
Revised	23 June 2020
Recommended	21 July 2020
Revised	18 August 2020

Staff and Legal Review (1)

ARIN Staff Comments

The text is clear and understandable, and can be implemented as written. Staff can adjust vetting of small IPv6 requests in compliance with the new language.

It is suggested that the description of ARIN fees in the problem statement be changed for accuracy to "ARIN's ISP registration services fee structure has graduated fee categories based upon the total amount of number resources held within the ARIN registry."

Staff suggests specifying that the language is to be applied to Section 6.5.2.1. (b) and (g) for avoidance of doubt.

Staff and Legal Review (2)

ARIN General Counsel – Legal Assessment

This policy creates no 'material legal issues'.

Resource Impact

Implementation of this policy would have minimal resource impact. It is estimated that implementation would occur within 3 months after ratification by the ARIN Board of Trustees. The following would be needed in order to implement:

- Staff training
- Updated guidelines and internal procedures
- Standard documentation updates

Problem Statement

- A 3x small ISP who obtains the smallest IPv6 allocation results in a fee increase from $250 to $500 per year for trying to deploy IPv6
- The fee increase creates a disincentive for these organizations to deploy IPv6 and is causing them to abandon their request for IPv6 resources
- Since the start of 2019: 29 organizations requesting small IPv6 blocks have abandoned or withdrawn their request, 4 are still pending

Current Fee Schedule

Service Categories and Fees

Service Category	Fee	IPv4 Block Size	IPv6 Block Size
3X-Small*	$250	/24 or smaller	/40 or smaller
2X-Small	$500	Larger than /24, up to and including /22	Larger than /40, up to and including /36

Draft Policy Text (1)

Replace the current 6.5.2(b) with the following:

b. In no case shall an LIR receive smaller than a /32 unless they specifically request a /36 or /40.

In order to be eligible for a /40, an ISP must meet the following requirements:

 * Hold IPv4 direct allocations totaling a /24 or less (to include zero)

 * Hold IPv4 reassignments/reallocations totaling a /22 or less (to include zero)

In no case shall an ISP receive more than a /16 initial allocation.

Draft Policy Text (2)

Add 6.5.2(g) as follows:

g. An LIR that requests a smaller /36 or /40 allocation is entitled to expand the allocation to any nibble aligned size up to /32 at any time without renumbering or additional justification. /40 allocations shall be automatically upgraded to /36 if at any time said LIR's IPv4 direct allocations exceed a /24. Expansions up to and including a /32 are not considered subsequent allocations, however any expansions beyond /32 are considered subsequent allocations and must conform to section 6.5.3. Partial returns of any IPv6 allocation that results in less than a /36 are not permitted regardless of the ISP's current or former IPv4 number resource holdings.

Changes since ARIN 45

- Updated text to clarify how partial vs. returns would be handled.

Community Input

- Do you support the recommended draft as written?
- Are there any issues that you think still need to be addressed?

Questions?

Comments?