Prop159/2012-2

IPv6 Subsequent Allocation

Current Text

6.5.3. Subsequent Allocations to LIRs

a) Where possible ARIN will make subsequent allocations by expanding the existing allocation.

b) An LIR which can show utilization of 75% or more of their total address space, or more than 90% of any serving site shall be entitled to a subsequent allocation.

c) If ARIN can not expand one or more existing allocations, ARIN shall make a new allocation based on the initial allocation criteria above. The LIR is encouraged, but not required to renumber into the new allocation over time and return any allocations no longer in use.

d) If an LIR has already reached a /12 or more, ARIN will allocate a single additional /12 rather than continue expanding nibble boundaries.

Modify 6.5.3b to add..

b) An LIR may request a subsequent allocation when they can show utilization
   of:
   75% or more of their total address space
   or
   more than 90% of any serving site
   or
   when 75% of the aggregate has been subnetted, and each subnet contains at least 1* customer or infrastructure allocation or assignment
   (*1 can be replaced here with any reasonable number)

Side by side..

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What does this solve?

- The case where an entity does not have enough address space remaining in order to create additional subnets
- Might result from an initial allocation that isn't large enough (see new allocation policy)
- Sometimes occurs in MDN-ish situations
- Did you get your addressing plan right? Or just haven't filled out enough yet?

Look at both sides..

- For
  - Allows for the growth of subnets, typically based on region or service as means for subsequent allocation
  - Allows early adopters to obtain the same amount of space as currently permitted under initial allocation

- Against
  - Not a lot of support for the language
  - Might be ahead of its time for most users
  - How do you prevent gaming to get more IP's?

What should 1* be?

How many assignments in a subnet is sufficient to call a subnet utilized?