Special Circumstances for Lowering Minimum Allocation Size (Case Study Indonesia)

[Proposal by: APJII]

Objective

To get feedback from APNIC members on the possibility of lowering the current minimum allocation size on a case-by-case basis, where an ISP cannot obtain address space from its upstream providers.

Background

Indonesia is a developing country with high potential Internet user base (61 million people aged between 15 to 24 years). Government has issued 150+ Internet licenses and possibly will issue more as local governments at province and district level is allowed to issue ISP licenses (starting July 2001).

Economic condition, however, is not yet conducive to rapid growth of Internet users. Buying power of both individuals and companies are relatively low compared to other more developed countries. The above conditions, combined with government's strategy to promote small and medium sized businesses, will create an ISP market consisting of only a few large players and many local/niche player ISPs. The customer growth will vary from 2.000 to 500.000 individual dialup users and/or 2 to 50 corporate LAN customers, depending on market competitiveness of the ISP.

Backbone/upstream providers are mostly foreign companies that charge in US Dollars, and they provide clear channel links from Indonesia to US ports provided by UUNET, Abovenet etc. This arrangement usually does not include IPv4 address space (or at most, a /24 loan). The rate fluctuation of Rupiah (local currency) against US Dollar has encouraged Indonesian ISPs to set-up local peering to save expensive international backbone. Small and large ISPs are connected by bilateral exchange or multi-node exchange (APJII-IIX) for local traffic.

Problem Statement

A small ISP may have a genuine need to obtain an independent IPv4 address space because they cannot get enough resource from upstream provider, or any resources from an upstream ISP. Giving them a /20 block will be unnecessary because they may not be able to use it up within 2-3 years, as evidenced by APNIC's record that approximately 15 ISP from Indonesia that has been allocated a /20 in 1999 has not come back for more resources.

Proposal

This proposal is intended to apply to all organisations that cannot meet the criteria for a /20 allocation and are unable to obtain address space from their upstream ISP.

It is proposed that APNIC allocate a /22 IPv4 address space to a small ISP if they fulfil the following criteria:

1. Provide evidence that they are running an ISP business (copy of license, or company registration describing type of business).

2. Use an upstream provider that does not include IP address space allocation, or has a fixed amount that is less than what the ISP needs (copy of contract or previous correspondence may be requested for confirmation).

Evaluation criteria:

Requests for a /22 will be evaluated according to rfc2050, requiring utilisation of 25% immediately, and 50% in one year. Therefore requests would need to demonstrate a need for a /24 immediately, and a /23 in one years time.

Follow Up Plan

This proposal is intended to apply to all countries in the region served by APNIC. Members from different countries that may have similar conditions with Indonesia are invited to send feedback an input before this proposal is submitted to APNIC.

Final proposal document will be submitted 60 days after the membership meeting in Taiwan, and expected to take immediate effect upon approval by APNIC.

Please send feedback to sekjen@apjii.or.id
Thank you!

Presented by Asosiasi Penyelenggara Jasa Internet Indonesia (APJII)