

Supporting Notes for the Provider Aggregatable (PA) Assignment Request Form

*Diane Ashworth,
Filiz Yilmaz Bican,
Emma Bretherick*

Document-ID: ripe-316

Date: 26 April 2004

Obsoletes : ripe-220, ripe-284

See also : ripe-315

Contents

Introduction
Supporting Notes
Examples
References

Introduction

This document contains instructions for completing the 'Provider Aggregatable (PA) Assignment Request Form'. It is a tool for gathering the information necessary to evaluate the request and to ensure that the same guidelines are applied to each request. Where necessary, the RIPE NCC will ask for additional information.

The 'Provider Aggregatable (PA) Assignment Request Form' can be found at:

<http://www.ripe.net/ripe/docs/iprequestform.html>

A separate form must be completed on behalf of each customer's network or for the infrastructure of the Local Internet Registry (LIR). Do not include requests for more than one customer in one form.

The policies and procedures to follow in making IP address space assignment decisions are described in 'IPv4 Address Allocation and Assignment Policies in the RIPE NCC Service Region' found at:

<http://www.ripe.net/ripe/docs/ipv4-policies.html>

Supporting Notes for the Request Templates

#[GENERAL INFORMATION]#
request-type: pa-ipv4
form-version: 1.1

Please do not alter the value of the 'request-type' and 'form-version' fields.

x-ncc-regid:

The Registry Identifier (RegID) must be included in every message sent to <hostmaster@ripe.net>. It is used to identify the Local Internet Registry (LIR). It has the following format:

<country code>.<organisation name>

Warning: Requests sent to the RIPE NCC that lack a proper RegID (x-ncc-regid) will bounce back to the sender.

#[ADDRESS SPACE USER]#

%

% Who will use the address space being requested?

legal-organisation-name:

organisation-location:

website-if-available:

If you are making a request in order to make an assignment to a customer or an End User other than the LIR, enter their details here. If the request is for the LIR's infrastructure enter your own details here.

In the 'legal-organisation-name' field please enter the legal name of the organisation that will use this assignment of PA address space.

In the 'organisation-location' field please enter the location of the main office of the company.

In the 'website-if-available' field please enter the URL of the organisation's website if available.

%

% Does the organisation already have address space that
% can meet the needs for this request? Enter "Yes" or "No".

space-available:

You should only send a request for address space that will be needed in the foreseeable future and for which the End User does not currently have enough space available to cover. If the organisation requesting an assignment does currently have address space

that is not in use and could be used for this new assignment, please reply with “Yes” and give an explanation of why more address space is needed.

#[ADDRESSING PLAN]#

number-of-subnets:

address-space-returned:

In the ‘number-of-subnets’ field please enter the total number of subnets listed in the plan below.

Please complete the ‘address-space-returned’ field if the user will be returning address space to another LIR. Please enter the prefixes that will be returned, to which LIR, and when. Include a separate field (address-space-returned:) per prefix. Note that the expected time for renumbering is three months. Use the following syntax for this field:

<x.x.x.x/xx> to <LIR> by <yyyymmdd>

%
% Size
% in CIDR Immediate 1yr 2yr Purpose
subnet:
totals:

This table represents each subnet and a usage description of the requested address space. Please repeat the ‘subnet:’ field for all subnets requested. Only include information about public address space. Private address space does not need to be described.

Please specify the number of IP addresses needed.

In the ‘Size in CIDR’ column please enter the CIDR (slash) notation corresponding to the total number of IP addresses needed for that subnet.

In the ‘Immediate’, ‘1y’, and ‘2yr’ columns please enter the number of IP addresses needed immediately (i.e. 6) and the estimated usage for the next two years. Include interfaces used for hosts, routers, gateways, terminal concentrators, and any other machines requiring one or more network interfaces. (Multiple slash notations may also be used separated by comma(s) with no blank spaces, i.e. /30,/31.)

In the ‘Purpose’ column please enter a short description of how the subnet being requested will be used.

In the ‘totals’ field please enter the total for each column. The amount in the ‘Size in CIDR’ column total should be the total amount of address space required for this request.

%

% Which netname will be used when registering this network in
% the RIPE Database?
netname:

Enter the netname that will be used for the **inetnum** object in the RIPE Database. The netname should be a concise, descriptive name for the network and should reflect the name of the address space user. Valid characters are letters, numbers and dash.

Note that the netname that we approve for this assignment must be the netname that is used in the database object. If a different netname is used the object will be classed as "invalid" to the RIPE NCC. If you want to change the netname after approval contact <hostmaster@ripe.net> with the same ticket number in the subject line.

#[EQUIPMENT DESCRIPTION]#

%
% Please describe the equipment that will be used in the
% network. Indicate the function of the equipment and provide
% information regarding the way it uses IP address space.

equipment-name:
manufacturer-name:
model-number:
other-data:

This template is optional, supplying this further information facilitates approval of the request.

In the 'equipment-name' field please enter the type of equipment requiring public IP addresses (Router, Switch, ATM, Workstation, etc.) for this request.

In the 'manufacturer-name' field please enter the vendor name for the equipment listed in 'equipment-name'.

In the 'model-number' field please enter the model number for the equipment listed in 'equipment-name'.

In the 'other-data' field please enter any additional information that would clarify how this equipment or model uses IP address space. For example, the number of cards, ports, or network interfaces that the equipment has. If the software being used by the equipment requires multiple IP addresses, you should also describe this here.

Repeat this template (i.e. all four fields) as many times as necessary to describe the equipment relating to the IP address space being requested in the Addressing Plan template. Please leave a blank line between each template.

#[NETWORK DESCRIPTION]#

%
% If your description does not allow the Hostmaster to
% understand the request you may be asked additional
% questions. Please add any additional information that you
% think may facilitate the evaluation of this request below.

This is free-text space where you can include additional information that you think will be helpful to the RIPE NCC and the Hostmaster evaluating your request. If the Hostmaster requires additional information in order to understand the request, you may be asked more specific questions.

#[NETWORK DIAGRAM]#

%
% Please enter "Yes" or "No" if you have attached a network
% diagram in JPEG or PostScript format to this e-mail
% request.
diagram-attached:

The diagram can be sent as a MIME attachment with your e-mail to <hostmaster@ripe.net>. A network diagram (topology map) can be helpful in clarifying the set up of the network and illustrating why the IP addresses being requested are needed.

#[END OF REQUEST]#

Please insert your signature in plain text (with your full name) after the above header. The Robot will not process any information included here.

Examples

#[GENERAL INFORMATION]#
request-type: pa-ipv4
form-version: 1.1
x-ncc-regid: nn.santa

#[ADDRESS SPACE USER]#

%
% Who will use the address space being requested?
legal-organisation-name: 1st National Bank
organisation-location: Polar City, Northern Nowhere
website-if-available: Not

%
% Does the organisation already have address space that
% can meet the needs for this request? Enter "Yes" or "No".
space-available: No

#[ADDRESSING PLAN]#
number-of-subnets: 3
address-space-returned: None

%	Size	Immediate	1yr	2yr	Purpose
subnet: /24		/26,/27	/25,/27	/25,/26	Workstations & printers
subnet: /25		/26	/25	/25	Servers, routers & switches
subnet: /25		/25	/25	/25	Staff dial-in access
totals: /23		/24,/27	/24,/25,/27	/24,/25,/26	

%
% Which netname will be used when registering this network in
% the RIPE Database?
netname: NN-1st-National-Bank

#[EQUIPMENT DESCRIPTION]#

%
% Please describe the equipment that will be used in the
% network. Indicate the function of the equipment and provide
% information regarding the way it uses IP address space.
equipment-name: Workstations
manufacturer-name: Dell
model-number: Optiplex GX150
other-data: 230 units

equipment-name: Printers
manufacturer-name: HP
model-number: Laserjet VII
other-data: 15 units

equipment-name: Switches
manufacturer-name: Cisco
model-number: Catalyst 5500
other-data:

equipment-name: Routers
manufacturer-name: Cisco
model-number: 7300
other-data:

equipment-name: Servers
manufacturer-name: Sun
model-number: Fire v1280

other-data: 20 – 25 units

#[NETWORK DESCRIPTION]#

%

% If your description does not allow the Hostmaster to
% understand the request you may be asked additional
% questions. Please add any additional information that you
% think may facilitate the evaluation of this request below.

We will have 4 ISDN30 coming in to the dial-up server to serve approximately 100 staff members.

#[NETWORK DIAGRAM]#

%

% Please enter "Yes" or "No" if you have attached a network
% diagram in JPEG or PostScript format to this e-mail
% request.

diagram-attached: No

#[END of REQUEST]#

Best Regards,
Santa Claus

Network Administrator
Santa's Workshop Inc.

#[GENERAL INFORMATION]#

request-type: pa-ipv4

form-version: 1.1

x-ncc-regid: nn.santa

#[ADDRESS SPACE USER]#

%

% Who will use the address space being requested?

legal-organisation-name: Snowflake Cybercafe

organisation-location: Polarcity, Northern Nowhere

website-if-available: www.snowflake.nn

%

% Does the organisation already have address space that
% can meet the needs for this request? Enter "Yes" or "No".

space-available: No

#[ADDRESSING PLAN]#

number-of-subnets: 3
address-space-returned: 192.168.28.0 - 192.168.29.255 to nn.teleco on 20030531

%	Size				
%	in CIDR	Immediate	1yr	2yr	Purpose
subnet:	/24	128	192	256	Customer cyberstations
subnet:	/25	64	128	128	Game servers
subnet:	/25	96	128	128	Routers, switches, printers
totals:	/23	288	448	512	

%
% Which netname will be used when registering this network in
% the RIPE Database?
netname: SNOWFLAKE-LAN

#[EQUIPMENT DESCRIPTION]#

%
% Please describe the equipment that will be used in the
% network. Indicate the function of the equipment and provide
% information regarding the way it uses IP address space.

equipment-name: Router
manufacturer-name: Cisco
model-number: 6712
other-data:

equipment-name: Servers
manufacturer-name: Intel
model-number: Pentium 4 Entry Level IDE Server
other-data: 50 – 60 units

equipment-name: Cyberstations / PCs
manufacturer-name: Dell
model-number: Optiplex GX150
other-data: 230 units

#[NETWORK DESCRIPTION]#

%
% If your description does not allow the Hostmaster to
% understand the request you may be asked additional
% questions. Please add any additional information that you
% think may facilitate the evaluation of this request below.

This request is a one to one renumbering.

#[NETWORK DIAGRAM]#

%

% Please enter "Yes" or "No" if you have attached a network

% diagram in JPEG or PostScript format to this e-mail

% request.

diagram-attached: No

#[END of REQUEST]#

Best Regards,

Santa Claus

Network Administrator

Santa's Workshop Inc.

#[GENERAL INFORMATION]#

request-type: pa-ipv4

form-version: 1.1

x-ncc-regid: nn.santa

#[ADDRESS SPACE USER]#

%

% Who will use the address space being requested?

legal-organisation-name: Santa's Workshop Inc.

organisation-location: Polar City, Northern Nowhere

website-if-available: www.santasworkshop.nn

%

% Does the organisation already have address space that

% can meet the needs for this request? Enter "Yes" or "No".

space-available: No

#[ADDRESSING PLAN]#

number-of-subnets: 14

address-space-returned: No

%

% Size

% in CIDR Immediate 1yr 2yr Purpose

subnet: /23 /24 /23 /23 Dynamic Dial-up Lagos

subnet: /23 /24 /23 /23 Dynamic Dial-up Kiev

subnet: /23 /24 /23 /23 Dynamic Dial-up Bagdad

subnet: /23 /24 /23 /23 Dynamic Dial-up Bucarest

subnet: /23 /24 /23 /23 Dynamic Dial-up Cairo

subnet: /23 /24 /23 /23 Dynamic Dial-up Budapest

subnet:	/23	/24	/23	/23	Dynamic Dial-up Warsaw
subnet:	/23	/24	/23	/23	Dynamic Dial-up Prague
subnet:	/23	/24	/23	/23	Dynamic Dial-up Lisbon
subnet:	/23	/24	/23	/23	Dynamic Dial-up Madrid
subnet:	/22	/24	/23,/24	/22	Dynamic Dial-up London
subnet:	/22	/24	/23,/24	/22	Dynamic Dial-up Berlin
subnet:	/23	/24	/23	/23	Dynamic Dial-up Paris
subnet:	/23	/24	/23	/23	Dynamic Dial-up Rome
totals:	/19	/21,/22,/23	/20,/21,/22,/23	/19	

%
 % Which netname will be used when registering this network in
 % the RIPE Database?
 netname: SANTA-OPS-DIALUP

#[EQUIPMENT DESCRIPTION]#
 %
 % Please describe the equipment that will be used in the
 % network. Indicate the function of the equipment and provide
 % information regarding the way it uses IP address space.
 equipment-name: Access Server
 manufacturer-name: Cisco
 model-number: 5300
 other-data: one for each of the local operations

#[NETWORK DESCRIPTION]#
 %
 % If your description does not allow the Hostmaster to
 % understand the request you may be asked additional
 % questions. Please add any additional information that you
 % think may facilitate the evaluation of this request below.

All locations will have dynamic dial-up deployed for our local operatives to keep in touch with central offices. User modem ratio = 10:1.
 The access servers can provide up to 240 concurrent connections each, they will backhaul traffic via multiple E1s to our satellite set-up.

#[NETWORK DIAGRAM]#
 %
 % Please enter "Yes" or "No" if you have attached a network
 % diagram in JPEG or PostScript format to this e-mail
 % request.
 diagram-attached: Yes

#[END of REQUEST]#

Best Regards,
Santa Claus

Network Administrator
Santa's Workshop Inc.

References

IPv4 Address Allocation and Assignment Policies in the RIPE NCC Service Region
<http://www.ripe.net/ripe/docs/ipv4-policies.html>

RIPE Database User Manual: Getting Started
<http://www.ripe.net/ripe/docs/db-start.html>

RIPE NCC LIR Portal
<https://lirportal.ripe.net/>