# **IPv6 Troubleshooting** for **Residential ISP** Help desks

Removing a barrier for IPv6 deployment

### Help desks think IPv6 is scary...

- How to debug problems?
- How to answer questions?
- All those horrible numbers!
- ...etc...

### Managers think IPv6 is expensive

- Help desks cost a lot of money
- IPv6 will be expensive if...
  - $\circ$  ...lots of customers contact the help desk
  - ...help desk needs a lot of time to answer a question
  - $\circ$  ...help desk employees need lots of training

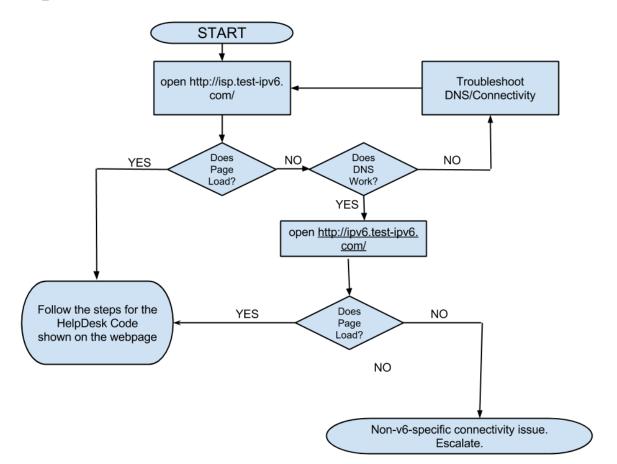
### Make it easier

- This document makes IPv6 easier to deal with for help desks
  - It is a starting point that help desks can use/adapt

- Provides tools for debugging
- Describes a workflow to find problems



### **More Specific Flowchart**



### What does the document contain?

- Background information
- IPv6 Troubleshooting (isp.testipv6.com)
  - Basic IPv6 Test
  - Test Connectivity
  - Test DNS
  - Check Home Router
  - Escalate
- Explanation of isp.testipv6.com codes

#### Test your IPv6 connectivity.

| For the Help Desk Summary Tests Run Share Results / Contact    |
|--|
|  |
| Your Internet help desk may ask you for the information below. |
| Help desk code: 112  |

#### IPv4, plus Broken IPv6

IPv4: Good, AS2121 - RIPE-MEETING-AS Reseaux IP Europeens Network Coordination Centr IPv6: broken

IPv4 address: 193.0.29.222

More information about this page, including how to bookmark it: fag\_helpdesk.html.

### Test your IPv6 connectivity.



OtherSites: 57/57 good

IPv4 address: 193.0.31.242 IPv6 address: 2001:67c:64:49:cc76:4e4c:d31f:ef04

More information about this page, including how to bookmark it: faq\_helpdesk.html.

#### Test your IPv6 connectivity.



## What do we want from you?

- Please read the document
  - <u>https://www.ripe.net/ripe/groups/tf/bcop/ipv6-</u> troubleshooting-for-residential-isp-helpdesks
  - o <u>https://www.ripe.net/ripe/groups/tf/bcop</u>
- Give it to your help desk
- Would this help you deploy/support IPv6?
- Provide feedback
  - <u>bcop@ripe.net</u>

### Questions

- For those of you who have already read it:
  - (focussing on usability here, technical details will be discussed in the IPv6 WG)
  - Is this document easy to use?
  - Is there something missing?
  - Do you think this document is ready to be finalised?