

# RIPE 60 Database Update

Paul Palse  
Database Manager, RIPE NCC



# Outline

- Introduction of the DB Group
- Projects and external commitments
- Operational update and RIPE-DBM
- RIPE Labs prototypes
- Questions

# The DB Group

# The Database Team



**Paul**



**Erik**



**Agoston**



**New  
developer**

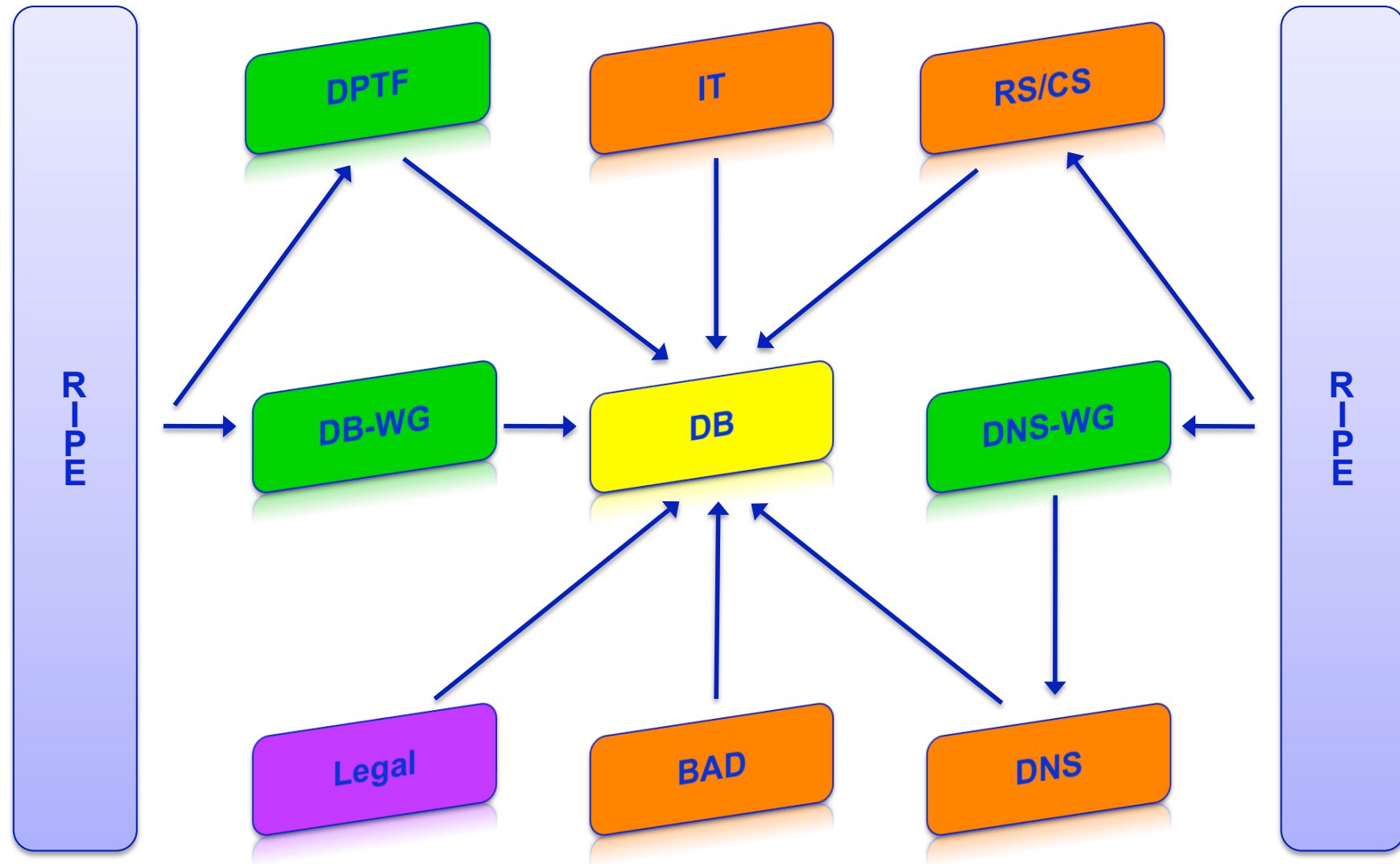


**Benedetto**



**Denis**

# Stakeholders: Internal and External



# Action Points

## AP54.3: MNT-BY on Person/Role

- Documentation is ready
- Test environment deployed right after RIPE 59
- No issues were reported
- Deploy to production next month...



## AP54.6: Clean-Up Unreferenced Persons

- Restarted at end of February
- Cleanup is complete
- Deletion is set to 90 days after first becoming unreferenced



## AP58.1: ASUSED support for IPv6

- Currently only available via web interface
- Will be integrated in the new portal software with full IPv6 support.

## AP59.1: Reverse Delegation Safeguards

- The DNS group is upgrading their provisioning software
- Database Group will implement the additional rules as part of that development



## AP59.2: Clean-Up Unreferenced Persons

- Sent detailed explanation mid February (AP59.2)
- Now an ongoing process...

## AP59.3: Documentation in HTML

- Update reference manual done
- Query reference manual to follow shortly...

## AP59.4, AP59.5 and AP59.6

- Advanced search on KEY-CERT objects
- We didn't see a proposal on the DB WG mailing list
- This could be a candidate for a "Use Case" search tool
- "Use Case" search tool ?
- Yes, "Use Case" search tool...

# Various Updates

## NRTM/Split files without personal data

- NRTM and split files without NIC-HDLs
- Software is ready
- Documentation is almost ready
- Test environment was deployed right after RIPE 59
- We'll put it in production when the documentation is ready...



# RIPE NCC's Other Database Mirrors

- We re-loaded them shortly after RIPE 59
- We are out of sync again
- We will investigate a more reliable process...



# Operational Update

## RIPE-DBM

# RIPE-DBM

- First line:  
Customer Service
- Second line:  
Database group



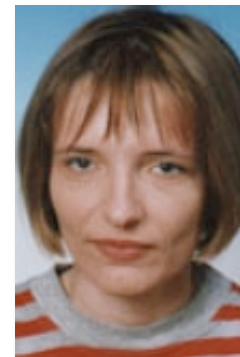
Laura (manager)



Henriette



Ronen

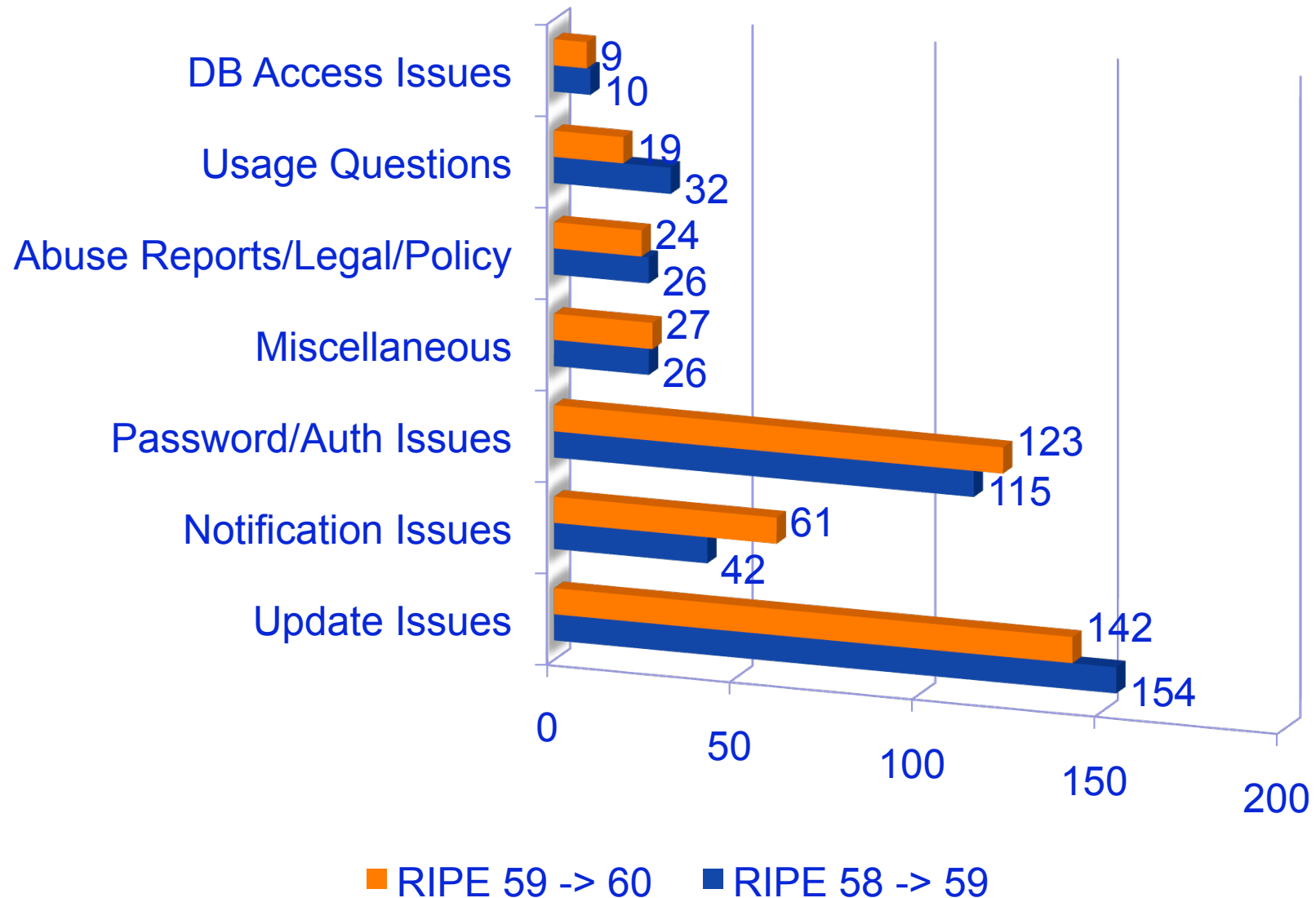


Milena



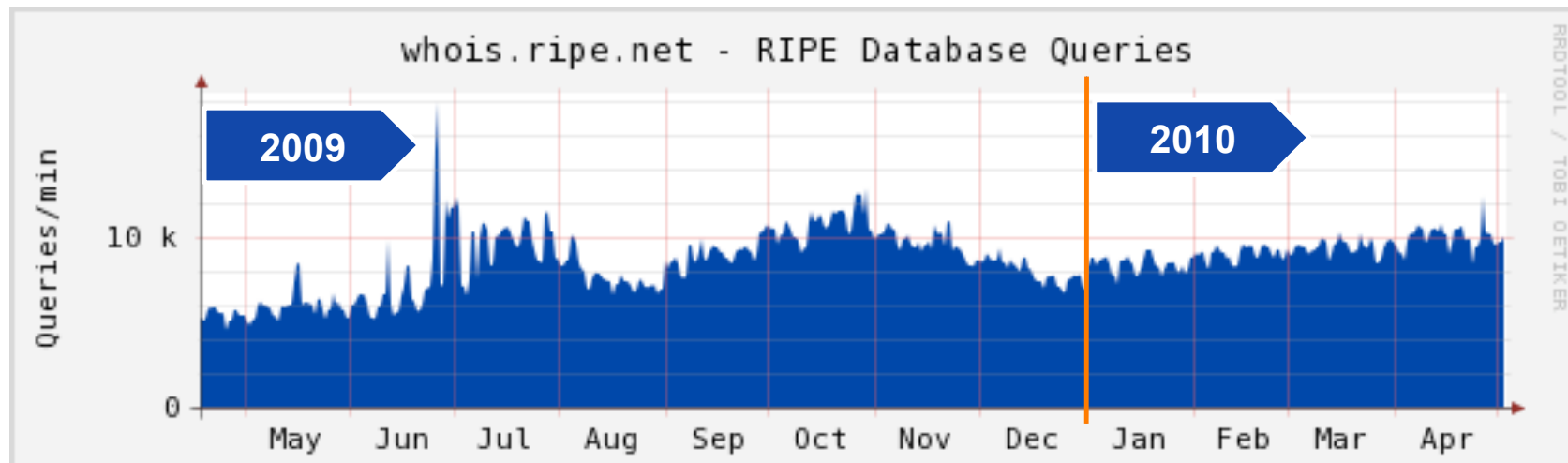
Marisol

# Average Tickets Per Month



# RIPE Database

# Stats: Whois Queries per minute



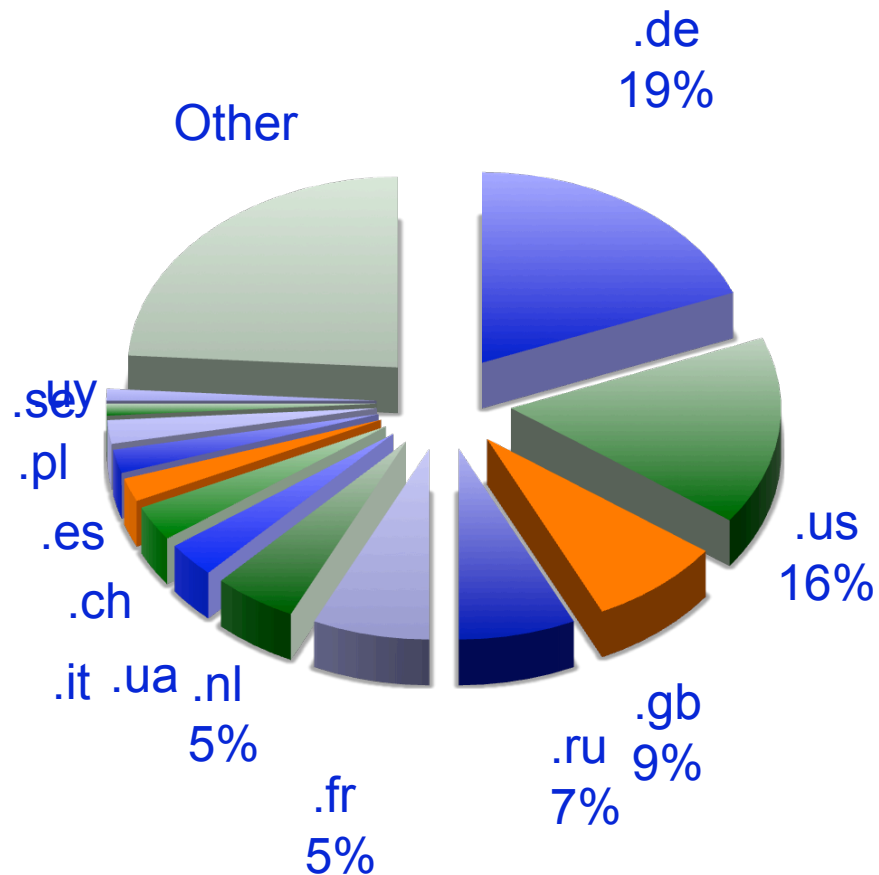
- Average queries p/m over a year: 8,617
- IPv6 > 1.5%



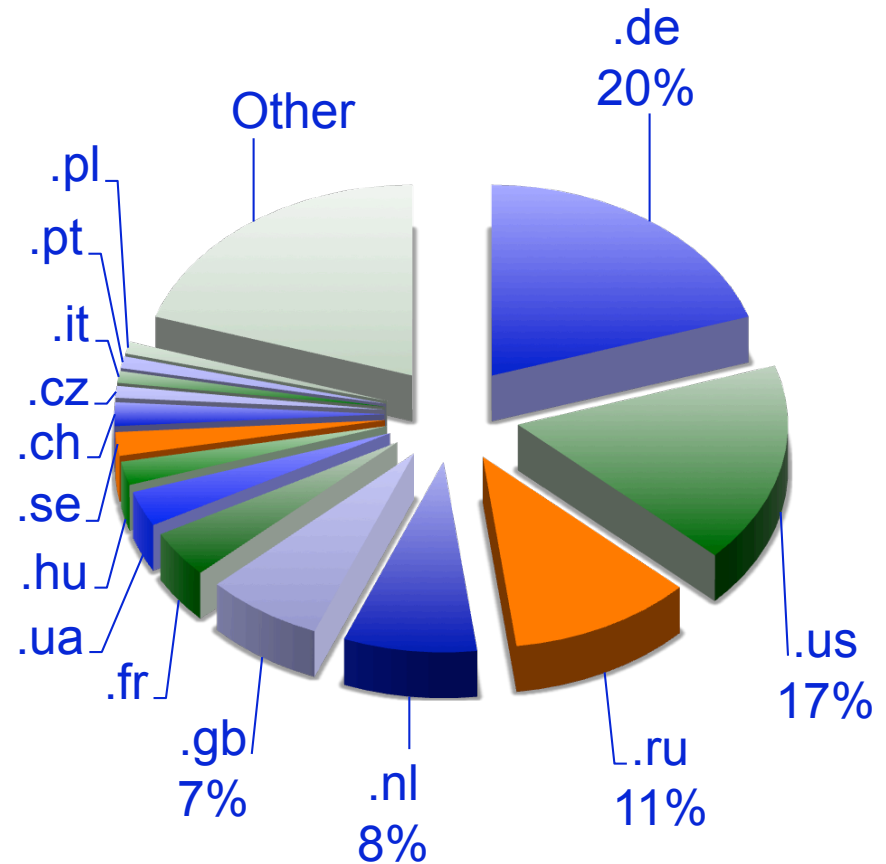
<http://www.ripe.net/info/stats/db/>

# Whois Queries – Usage by Country

Between RIPE 59 and 60

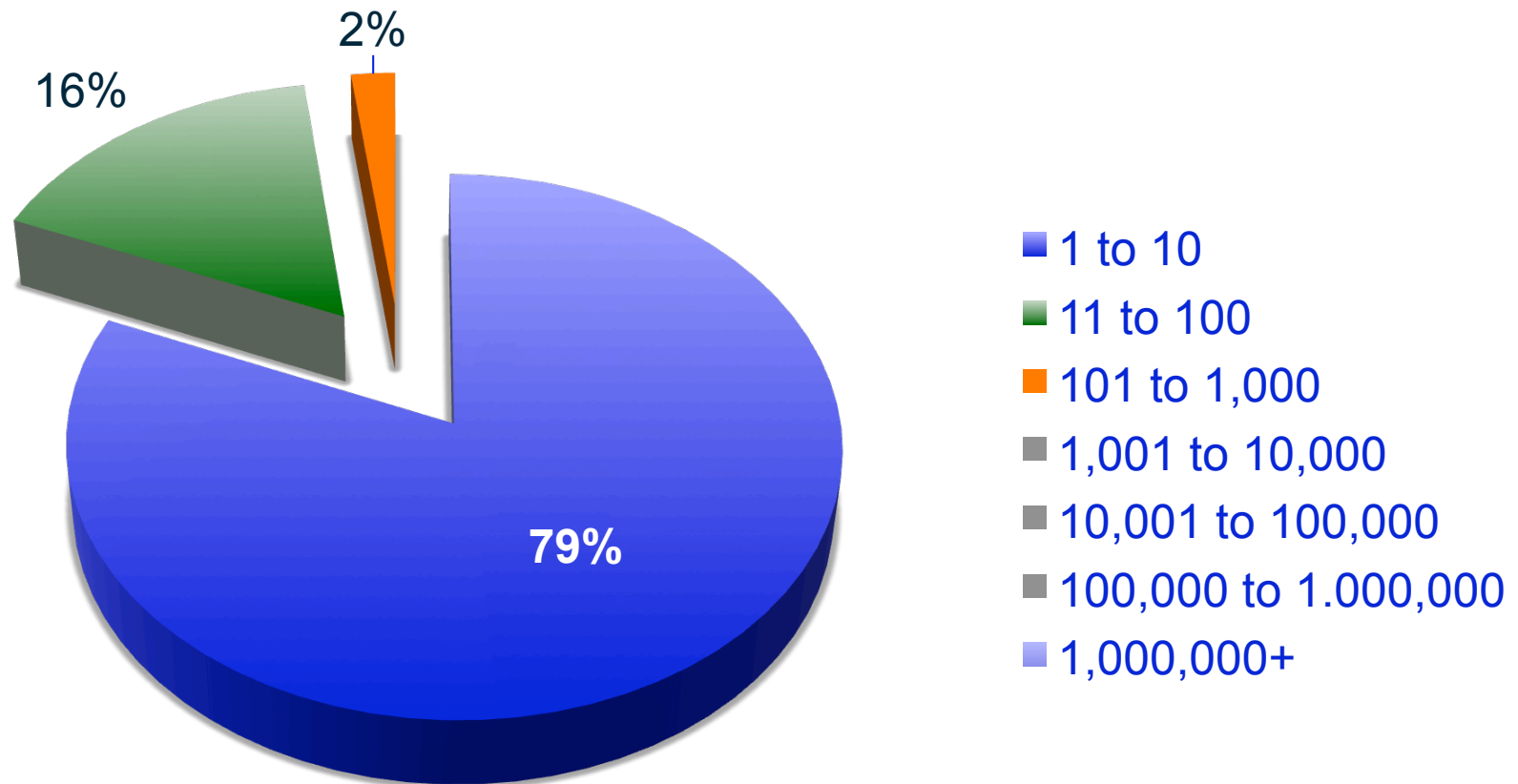


Between RIPE 58 and 59

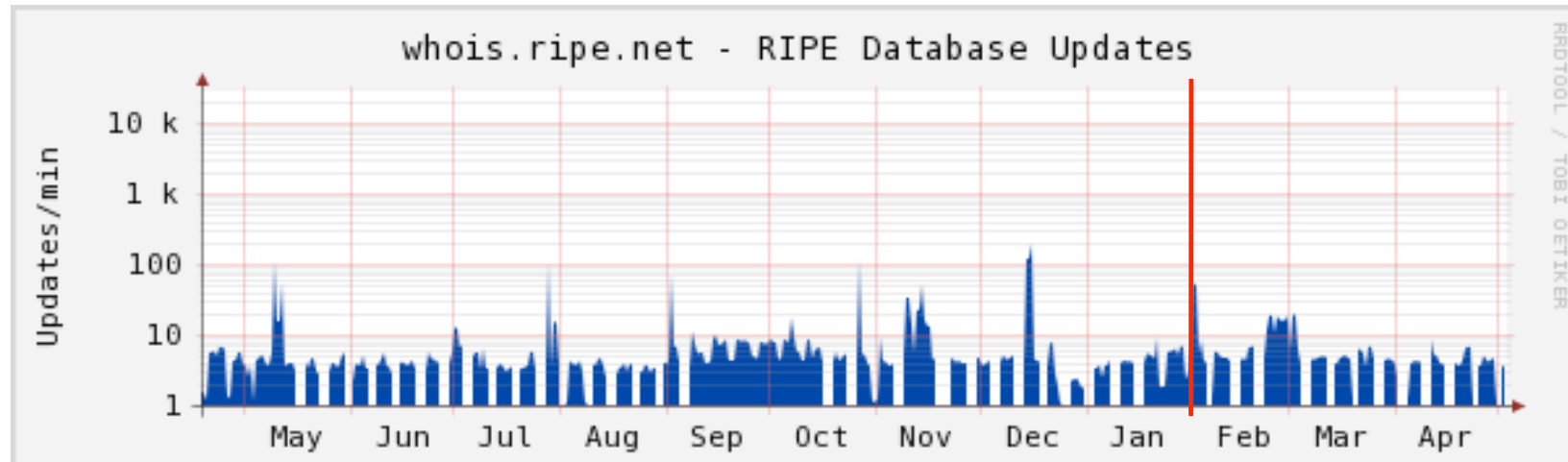


# Query Distribution per Month

## Queries per unique IP



# Stats: Successful Whois Updates



- Average updates over a year: 36 per minute

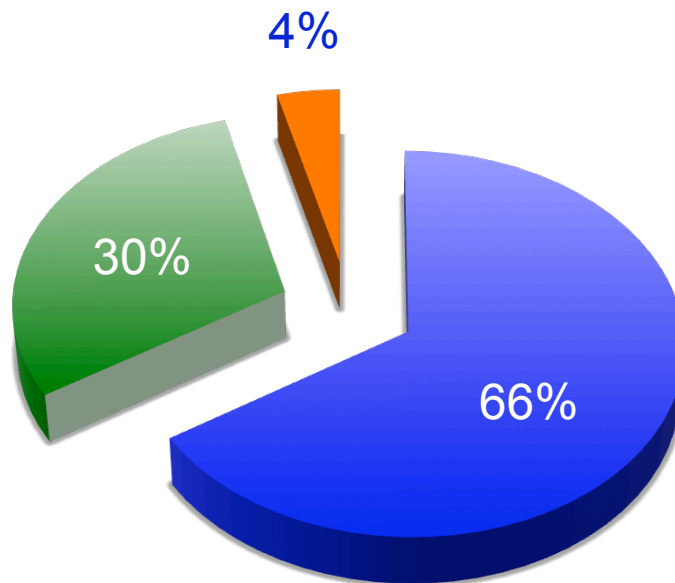


<http://www.ripe.net/info/stats/db/>



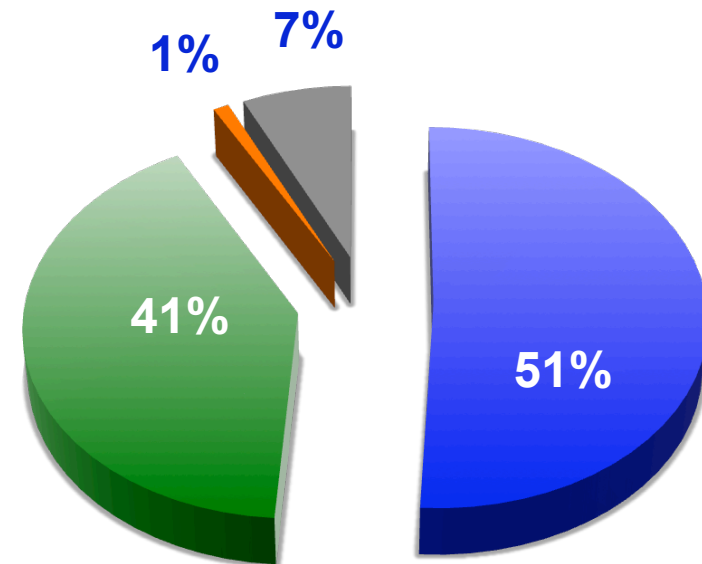
# Whois Updates - Distribution

## Update Method



■ sync ■ mail ■ Web

## Update Types



■ Successful  
■ Failed  
■ Help  
■ Spam

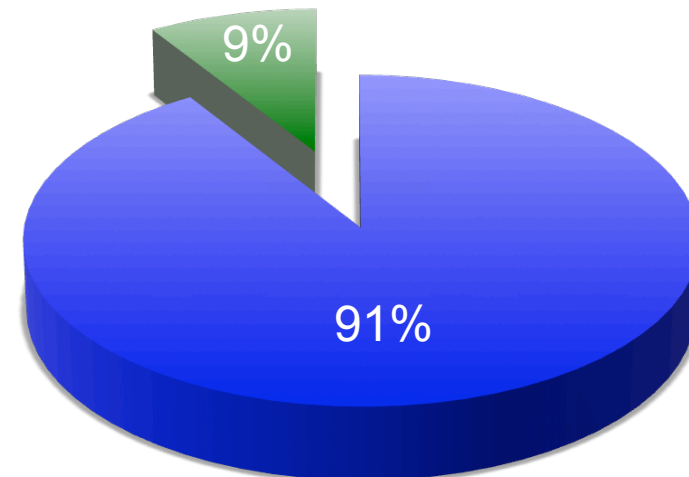
# EgoQuery <sup>TM</sup>

## *Hosts that queried for their own IP*

### Facts (time between RIPE 59-60):

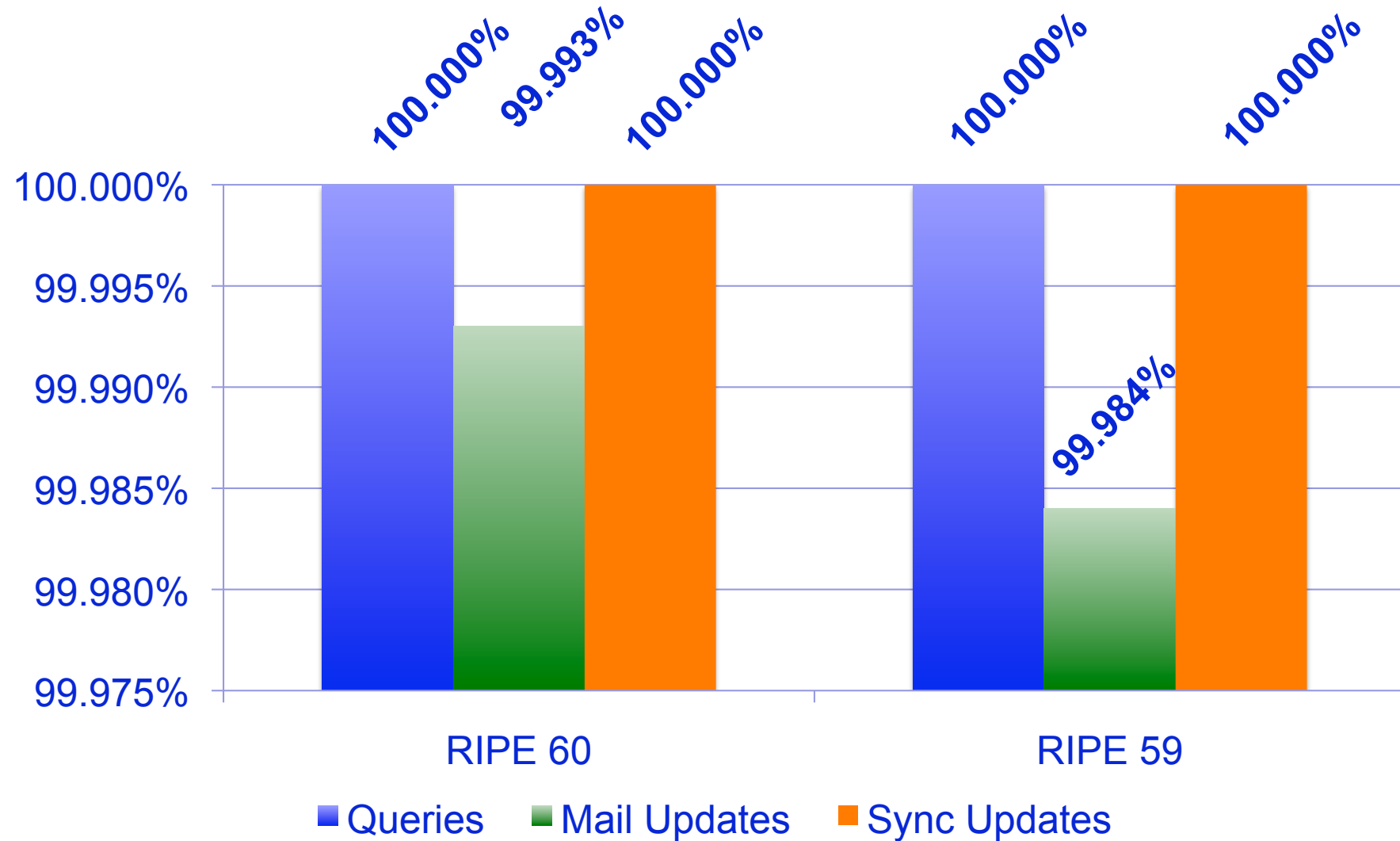
- No flags used
- Total > 240,000,000 Queries
- NL: 16%
- GB: 12%
- BE, PL, DE, ES: 6%
- 80% 1-10 queries
- 2% 11-100 queries
- Again, what is this...

### Queries



■ Regular ■ EgoQuery

# RIPE DB: Query and Update Uptime



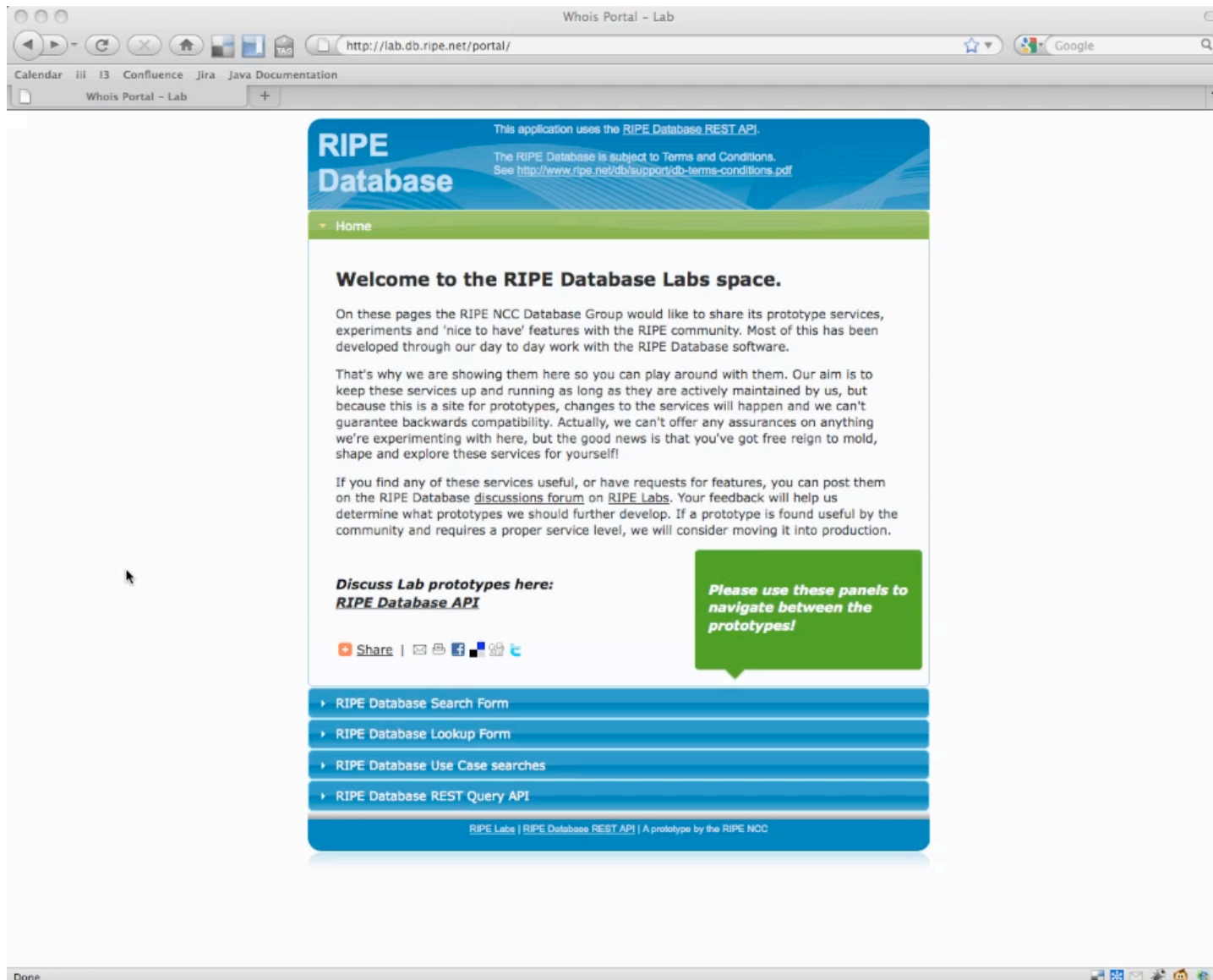
# RIPE Database

## Publications on RIPE Labs

## Publications on RIPE Labs

- RIPE Database Query API in the form of RESTful Web Services:
  - REST allows for “create, read, update, and delete” transactions over HTTP
  - Resources have a unique portable address in the form of an URL
  - Web Service responds in XML and JSON
  - Response is easy to parse by script
  - XML can be easily transformed (to RPSL for example) using style sheets
  - Protocol has big industry support. Google, Amazon...

# RIPE Database RESTful Query WS



The screenshot shows a web browser window titled "Whois Portal - Lab" with the address bar displaying "http://lab.db.ripe.net/portal/". The page content includes a blue header with the "RIPE Database" logo and a green navigation bar with a "Home" link. The main content area features a welcome message, a list of services, and a green callout box.

**RIPE Database**

This application uses the [RIPE Database REST API](#).  
The RIPE Database is subject to [Terms and Conditions](#).  
See <http://www.ripe.net/db/support/db-terms-conditions.pdf>

Home






**Welcome to the RIPE Database Labs space.**

On these pages the RIPE NCC Database Group would like to share its prototype services, experiments and 'nice to have' features with the RIPE community. Most of this has been developed through our day to day work with the RIPE Database software.

That's why we are showing them here so you can play around with them. Our aim is to keep these services up and running as long as they are actively maintained by us, but because this is a site for prototypes, changes to the services will happen and we can't guarantee backwards compatibility. Actually, we can't offer any assurances on anything we're experimenting with here, but the good news is that you've got free reign to mold, shape and explore these services for yourself!

If you find any of these services useful, or have requests for features, you can post them on the RIPE Database [discussions forum](#) on [RIPE Labs](#). Your feedback will help us determine what prototypes we should further develop. If a prototype is found useful by the community and requires a proper service level, we will consider moving it into production.

**Discuss Lab prototypes here:**  
**RIPE Database API**

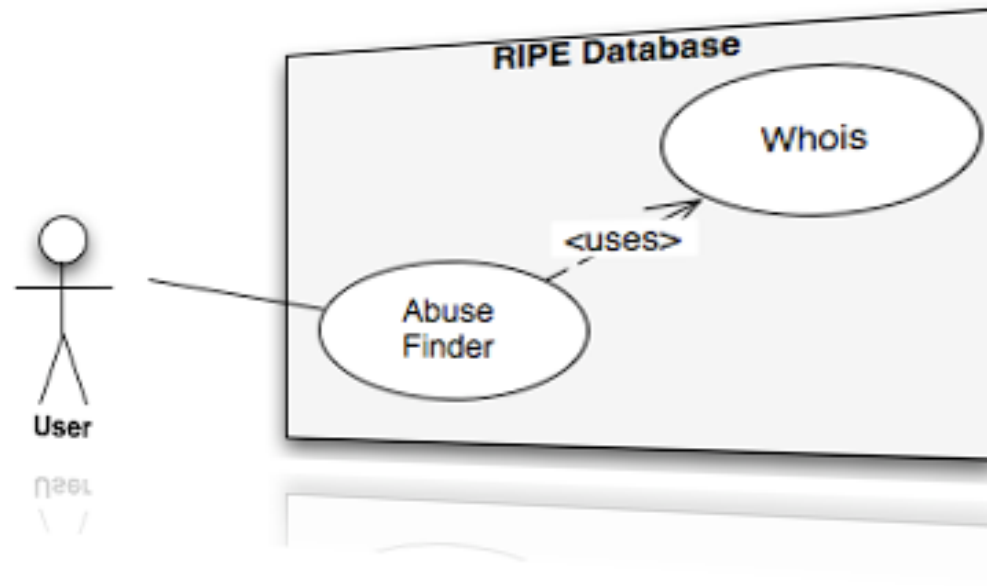
Share |     

**Please use these panels to navigate between the prototypes!**

- RIPE Database Search Form
- RIPE Database Lookup Form
- RIPE Database Use Case searches
- RIPE Database REST Query API

RIPE Labs | RIPE Database REST API | A prototype by the RIPE NCC

# “Use Case” search



- Precise answer to a specific question
- Give me the Abuse Handler details for this network resource? (*Demo in Anti Abuse WG Session...*)
- Other “Use Case” searches please...



# Registry Data in the RIPE Database

Presenting registry data in the RIPE  
Database



# Problem Statement

- As an RIR it is important that we hold accurate registry data.
- Consumers of this data need to have trust in its accuracy.
- RIPE NCC has no direct control over the user data entered into the RIPE Database.
- Therefore any inaccuracies found in the user data, or conflicts between different sources of data, reflect on the whole data set.

# Principles

- Present a clear distinction between the registry and user data
- Minimise inconsistencies, while facilitating the ability of the users to keep their data current
- Minimise the impact of any change on the maintainers of user data
- Minimise the changes needed to RIPE DB software.

# Questions?



# THANK YOU!