Database Update

Kaveh Ranjbar
Database Department Manager, RIPE NCC

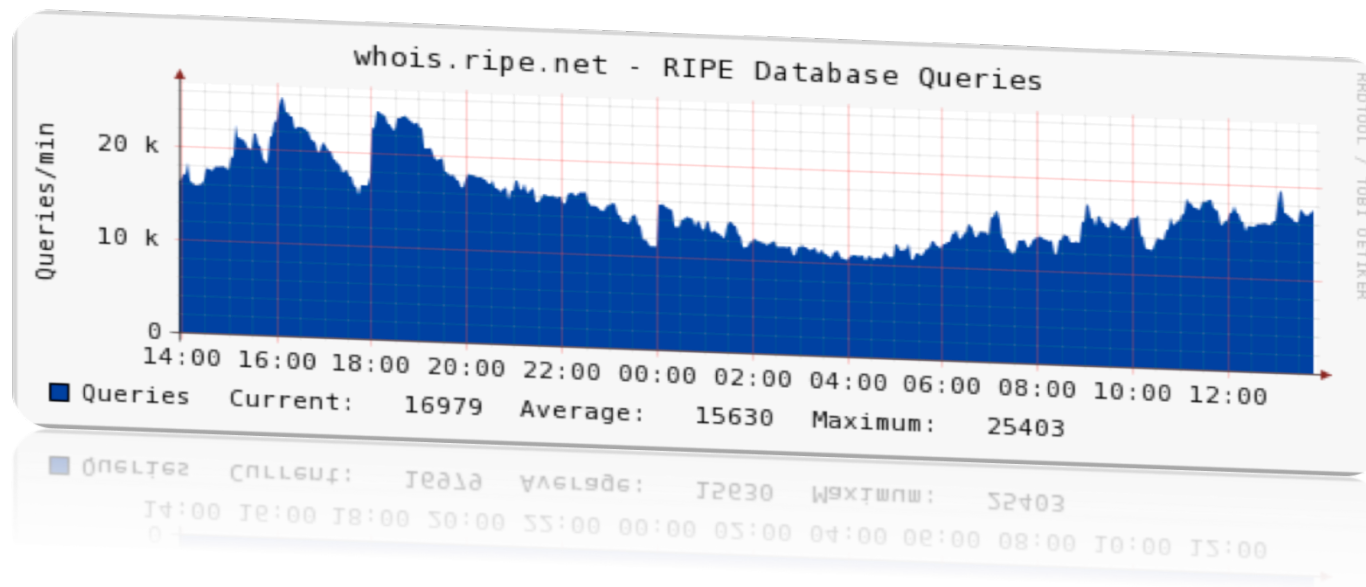**RIPE** NCC

RIPE Database Statistics

- Operational stats:

  http://www.ripe.net/info/stats/db/ripedb.html

Action Points

Denis Walker
Database Business Analyst, RIPE NCC

Action Points Open List

Four action points from RIPE 63

All completed

AP57.2: Cleanup Forward Domain Data

- All DOMAIN objects from the 43 TLD operators have been deleted

- Proposal to deprecate redundant attributes from DOMAIN objects sent to DNS and Database Working Group mailing lists

- "refer:", "sub-dom:", "dom-net:", "mnt-lower:"

- Also suggest adjusting syntax of DOMAIN object to more tightly fit reverse delegations and ENUM

AP63.1: Investigation on UTF-8

- Review published on RIPE Labs:

  https://labs.ripe.net/Members/kranjbar/internationalisation-of-ripe-database

- Technically the database accepts and returns UTF-8, but it is NOT tried or tested

- No policy exists defining how this should be used

AP63.2: Geolocation

- As announced on the mailing list, it is available as an optional attribute on INET(6)NUM and ORGANISATION objects

- Current data input format is generic, but easy to change with no data loss

- Further discussion needed on how to move forward

AP63.4: Hiding MD5 Hashes from MNTNERs

- Request came in as a follow-up to RIPE 63 session

- We implemented a mid-term solution, hiding all "auth:" lines in query results and making maintainer updates available through a web interface

- It was proposed that we show the "auth:" attributes if the object is only protected by PGP

AP63.4: (cont.) Updating passwords

- Following hiding of MD5 hashes mass mailed all maintainers of 'user' data suggesting password change

- 32,000 emails sent

- 8,000 bounced

- 38,000 passwords in MNTNER objects

- 875 have been changed since mails sent

- (This has no impact on the RIPE NCC's maintenance of Registry data in the RIPE Database)

AP63.4: (cont.) Email Update Security

- Asked community about possible solutions, little response yet:

  – Making email updates applicable only to objects protected by PGP and emails signed with proper PGP keys

  – Dropping email updates completely

  – Any other idea?

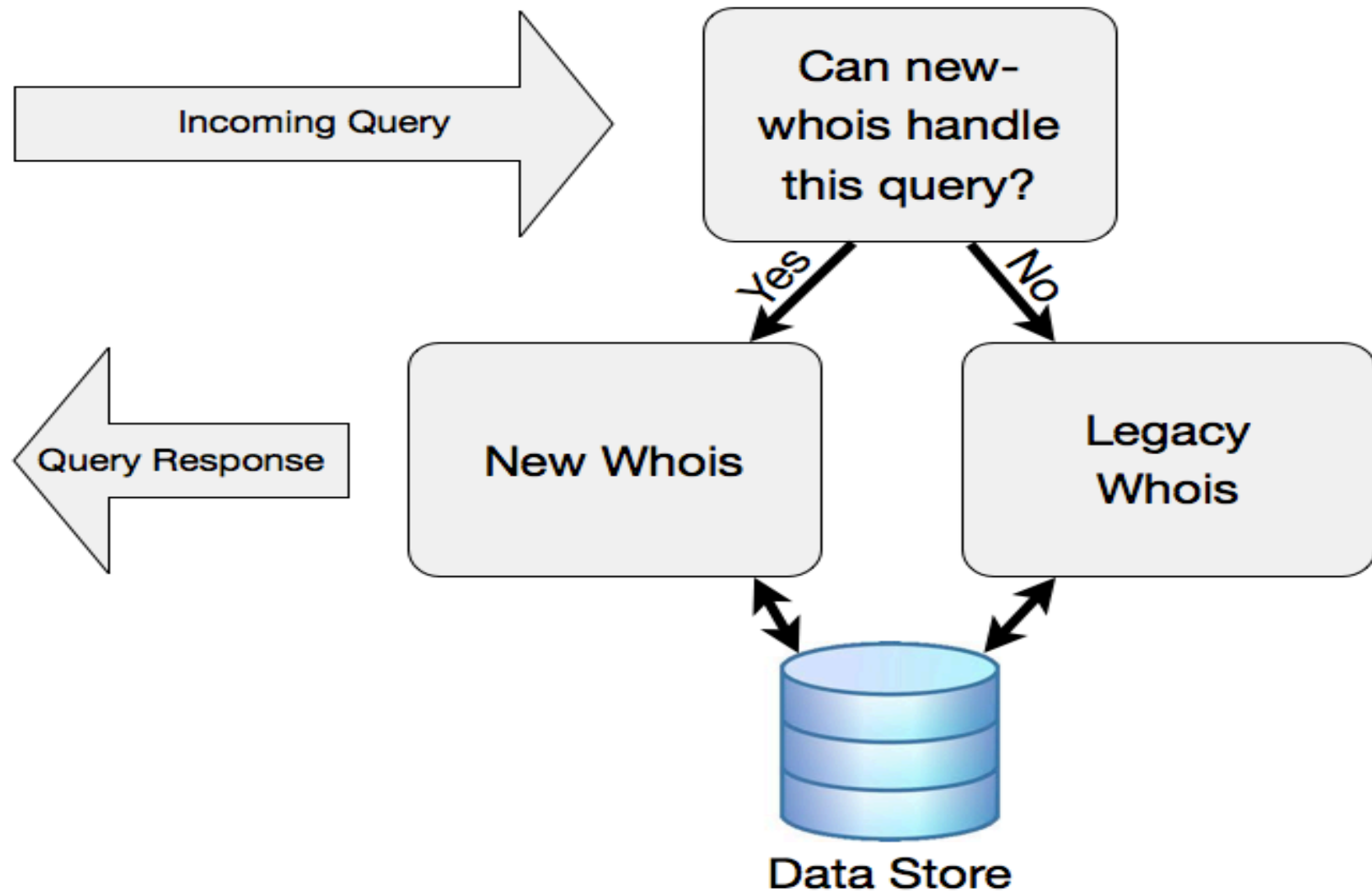# Projects

Kaveh Ranjbar
Database Department Manager, RIPE NCC

Ongoing – Redevelopment of Whois

- Our main focus is on redeveloping new whois backend software

- We have started reimplementing the whois system from scratch

- New code is already in production, completely backward compatible

- We use continuous integration, so new versions are deployed to production very often, we have one new release at least every two weeks

Redevelopment Internals

Redevelopment Project

- Right now 94% of queries are returned using new software

- Access lists are very clean and easy to understand now. Adhere to AUP

- Sane behavior in sorting output, option handling, complex behavior

- Faster, simpler and a lot more flexible

- Plan to provide code to other RIRs, OpenSource

Redevelopment Plan

- Finishing queries

  - In a short time we will finish the work on queries and decommission old query software

- Moving to updates

  - Much cleaner code, easy to understand for users

  - Concentrated modules for:

    - Business rules

    - Syntax checking

    - Authentication

    - Proper error handling

More for 2012

- Small improvements to UI

  – Integration with RIPEstat

  – Simpler password generation

  – More will be announced throughout the year

- API

  – IETF work in progress to standardise RESTful queries

  – Setting up prototype RESTful redirects between all five RIRs, so a single node gives output for any number resource in a single defined format

Community Participation

- Our aim is to remain completely backward compatible

- Questions about new features or improvements to current behaviour are sent to the list

  - As an example, three improvement ideas to Access Control were proposed by us, or questions about email security

  - We received either no response, or discussions completely diverged

- Especially when moving to redevelopment of database updates, we will have lot of questions

Please help us by more active participation

Community Participation

Please help us by actively participating

Questions?