# The RIPE Database Version 1
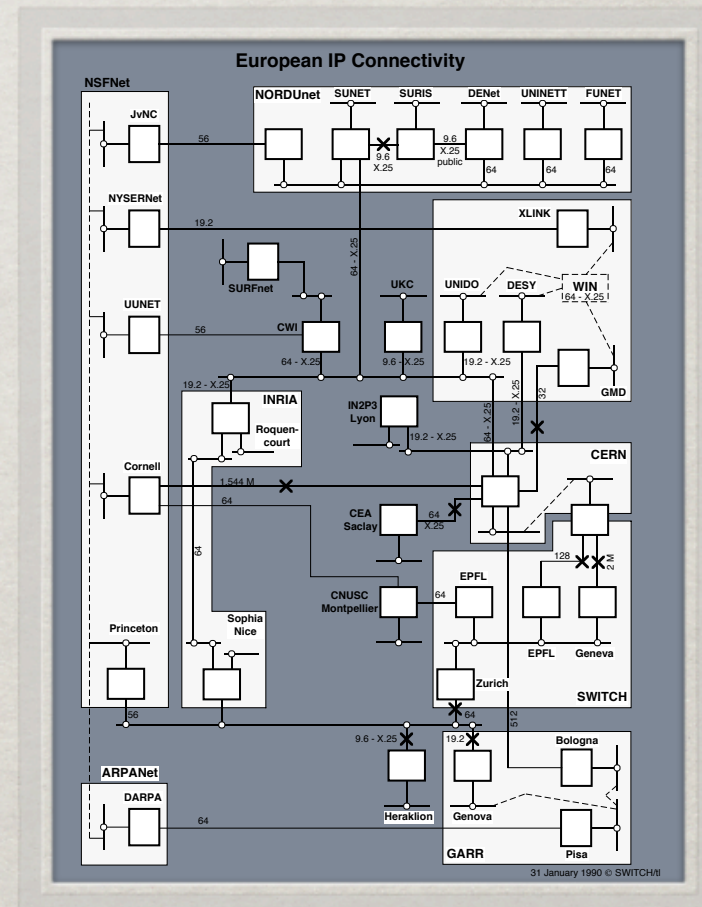
mcsun!dfk

dfk@mcsun.uucp

dfk@mcvax.bitnet

# Operational Contacts Database

- TCP/IP was already in use for years in local networks. (Berkeley Unix, ...)

- TCP/IP Networks were now growing together.

- Operational problems were often "end-to-end".

# Pragmatism Galore

**NAME**

      **people** - Access private user name database

**SYNOPIS**

      **people** [ -f file ] [ search-key ]
      **ph** [ -f file ] [ search-key ]
      **email** [ -f file ] [ search-key ]
      **home** [ -f file ] [ search-key ]
      **work** [ -f file ] [ search-key ]

**DESCRIPTION**

      These programs are all links to the same binary which is used to
      **access a user's private database of contact addresses.**
      ...

**Datafile format**

      The datafile consists of a number of  records,  each  spanning  several
      lines.   Records  are  separated by one or more blank lines.  Fields in
      the records commence at the start of the line with the construction:

          **\*keyword:**

      Where the keywords indicates the field type. ... **The  software
      does not check the keywords, so  users  may  invent  other
      comment ones.**

**AUTHOR**

      *Peter Collinson, UKC. From an idea from David Tilbrook.*

# UPDATE INTERFACE

Good morning,

here comes a bunch of new and update data for the RIPE db.
...

Coming back to the discussion Daniel and me had last Thursday while
driving back from Bonn I want to remember that the RIPE whois server
should have a flag to request use of the "short" tags; drawing from
my working experience tonight I would also suggest to have switch
to turn the chaining of person data on/off independant from the
tag mode (long/short) ...

Some of the network records now have *rz: fields giving a list of
name servers for the Reverse Zone; ...

*in: 141.1.0.0
*na: DFN-WIN1
*rm: net name should change to ECRCNET sometime
*de: ECRC Muenchen
*ac: Dave Morton
*co: RIPE ICS EU WIN
*gw: udo
*rz: ECRC.DE unido.Informatik.Uni-Dortmund.DE

# Flexibility

```
Date: Mon, 8 Oct 90 09:05:43 +0100
From: Ruediger Volk <rv@unido.informatik.uni-dortmund.de>
To: ripe-dbm@mcsun.EU.net
Cc: hostmaster@Germany.EU.net
Subject: Data for the RIPE DB

Good morning,

here comes a bunch of new and update data for the RIPE db. ...

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```

# First User Request

```
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```

# DATABASE SIZE

|           | Nov. 1990 | Jun. 1991 | Jan. 1992 | Apr. 1992 |
|-----------|-----------|-----------|-----------|-----------|
| persons   | 643       | 1270      | 2728      | 3365      |
| networks  | 670       | 1053      | 1792      | 2242      |
| domains   | 0         | 845       | 1254      | 1360      |
|           |           |           |           |           |
| Total     | 1313      | 3168      | 5774      | 6967      |

Source: ripe-52

# Swedish Ideas

```
Date: Thu, 29 Nov 90 11:27:06 +0100
From: boss@sunic.sunet.se
To: ripe-org@mcsun.EU.net
Subject: Network Line Database Object Description.
```

Below follows a first proposal for a line database object defining what should be known of network physical lines. Please comment.

Bernhard.

--------------------------------------------------------------

LINE DATABASE DESCRIPTIONS

Bernhard Stockman

Nov 29, 1990

This is a proposal for a network line  database to be  inlcuded in the RIPE whois service.
...

# First DB Discussions

```
Date: Thu, 29 Nov 90 21:19:46 +0100
From: k13@nikhef.nl (Rob Blokzijl)
To: "Arnold Nipper - XLINK - Phone: +49 721 608 4331"<nipper@ira.uka.de>,
    boss@SUNIC.SUNET.SE
Cc: ripe-org@mcsun.EU.net
Subject: Re:  Network Line Database Object Description.


I fully agree. Let's keep the RIPE databases as
consistent as possible!
 Rob Blokzijl


+---------- Start of included message from: "Arnold Nipper - XLINK - Phone:
+49 721 608 4331" -----
|
| To harmonize the various tags used in databases I propose:
|
|        lu ---> ch (change)
|        co ---> rm (remark)
|
| Arnold
|
+---------- End   of included message from: "Arnold Nipper - XLINK - Phone:
+49 721 608 4331" -----
```

# Mailing the Whole NCC Staff

```
Date: Wed, 29 Jul 92 18:30:30 +0200
From: Daniel Karrenberg <Daniel.Karrenberg@reif.ripe.net>
To: Marten Terpstra <terpstra@rijp.ripe.net>
Cc: Anne Lord <anne@mellow.ripe.net>
Subject: database update procedures changed


I have changed the update procedures so that everyone in
group dbase on ns can do updates. This included changing
protections in /usr/spool/log and /local/spool/wais.
Please consider this when making changes there and
in /dbase.

Please do updates as yourself from now on.

Daniel
```

# Evoloution Begins

```
Date: Wed, 23 Sep 92 16:48:19 +0200
From: Daniel Karrenberg <Daniel.Karrenberg@ripe.net>
To: RIPE Meeting Attendees <ripe-org@ripe.net>
Subject: Beta Testers Sought: New Update Scripts for RIPE Database


:-):-):-):-) WARNING: Highly Technical Stuff Below ! :-):-):-):-)


Hi Folks,

at long last the NCC have completed their latest programming job:
the new update and consistency check scripts for the RIPE database.
The update and consistency checking process is now completely controlled
by a single configuration file. This file is included for your
information and amusement. The long term plan is to have all the database
software including the whois server controlled by this file.

Operationally this means:
...

We are using the new software in production since today. ...
```

# RIPE Meetings

Date: Fri, 22 Jan 93 18:47:24 +0100
From: Marten Terpstra <Marten.Terpstra@ripe.net>
To: local-ir@ripe.net
Subject: Database updates during upcoming RIPE meeting


Dear folks,

Since all of the RIPE NCC staff will be in Prague next
week for the RIPE meeting, there may be a chance
that we miss an update. Because of time or connectivity
constraints it can happen that we cannot keep our daily
update service.

Our apologies for this, but we will try to do
the best we can.


-Marten

# Nothing New ....

```
Date: Wed, 19 Aug 92 19:56:20 +0200
From: Daniel Karrenberg <Daniel.Karrenberg@ripe.net>
To: Reseaux IP Europeens <ripe@ripe.net>
Subject: Ownership of RIPE Database
```

The RARE Executive is currently conducting research into "ownership" issues of the RIPE Network Management Database. This research has been requested by the RARE CoA. The NCC has been asked to help with the research. From my personal experience this has two parts:

- preventing abuse of the database

- ownership of a collection of data made by collaborative effort which is not quite a "collaborative work"

**Of course when formalising this the issue of data protection legislation regularly pops up as well.**

I know that some people on this list have experience of dealing with these issues. I would appreciate their input.

Daniel

PS: Also RIPE as a group might have a position on this.

# V2: More Progress

```
Date: Thu, 24 Jun 1993 11:34:39 +0200
From: Marten Terpstra <Marten.Terpstra@ripe.net>
To: RIPE Database Working Group <db-wg@ripe.net>,
        Local Internet Registries <local-ir@ripe.net>
Subject: New database software update

all,

It's time to let you know what has happened wth RIPE database software
development.  After some more experimenting to check feasibility we have
progressed quite far into a complete rewrite of the database software.
We have completed the system design and started to implement various
modules.

The new design has the following features

        - fully (and we *mean* fully!) configurable from a config file

        - separate files (and indices) to store different databases

        - dynamic updates and deletes as opposed to batch only

        - possibility for update protocol other than e-mail

        - guarded fields designed in

        - dynamic update of secondary databases possible
```

# V2: More Progress

...

**Features which have been requested but are not designed in:**

- preserve the order of tags within object

- preserve the position of remark or comment lines within objects

These two features turned out to be hard to specify in the light of updates and even harder to implement.  They might go in the next release **if someone can come up with a consistent and intuitive spec.**


The new software **will be implemented in the perl language**. So those ofyou who do not have it installed and want to use the RIPE database software should plan to install perl.  Of course you won't need perl if you just want to use a whois client and send in updates by mail. Implementing in perl instead of shell, awk and C has three benefits: coding in perl ist fast, subroutines can be used (missing from std awk) and the result is portable.  **We have a copy of the alpha software running on a PC under UNIX.  Together with a notebook this gives you a "portable" RIPE database.**

...

# The Rest is History

# Lessons

- Open-ended design pays - Always !

- KISS design survives generations.

- Never underestimate the lifetime of any design, however temporary you might think it is.

# The End