

VISUAL REASONING AND MENTAL MAPS

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/ DEV @ DIGITAL NATIVES
/ LEAD DEV @ FLYIIN

MOTIVATION

DEFINITIONS

VISUAL REASONING

THE ACT OF COLLECTING INTUITIVE

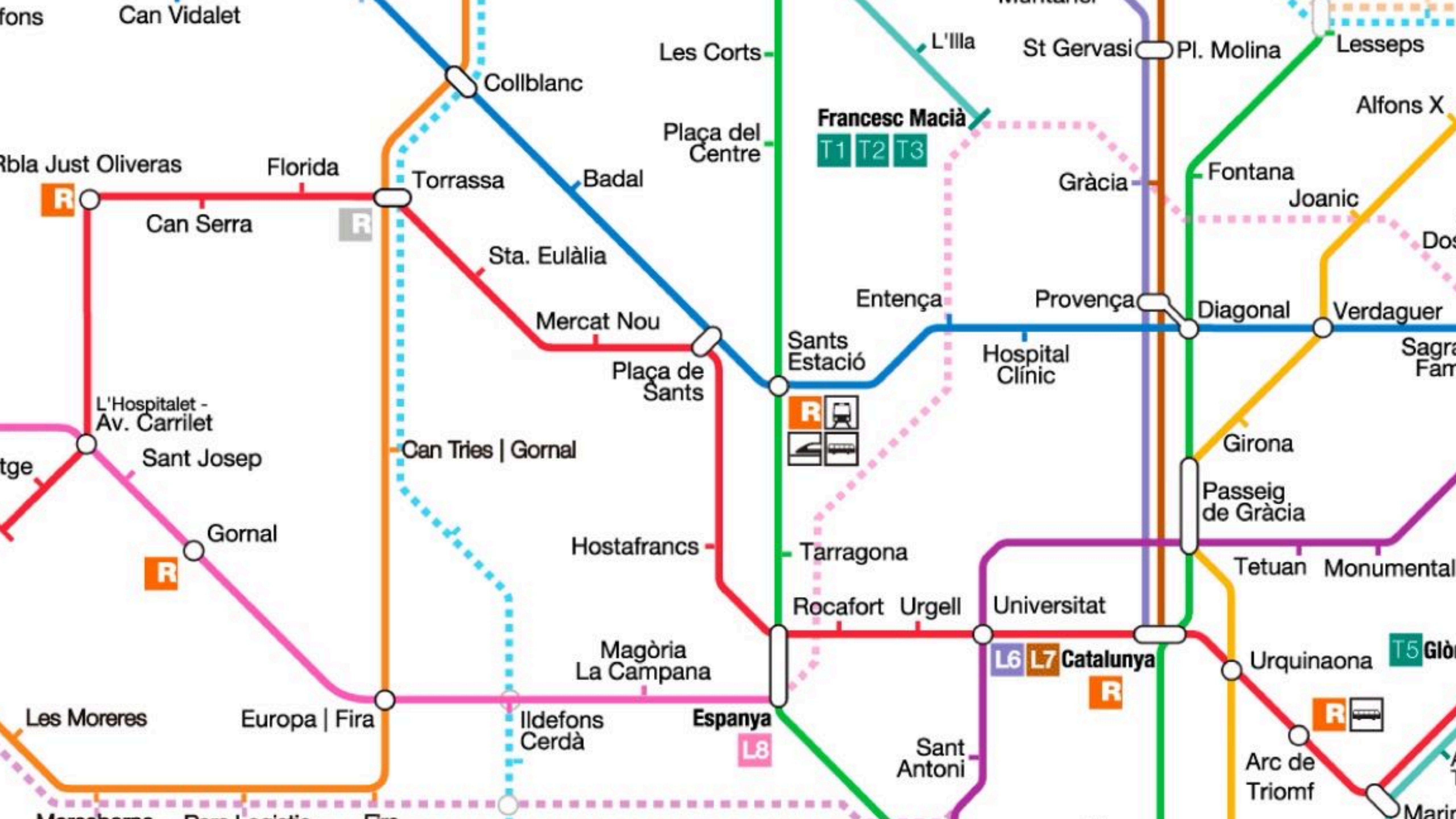
INFORMATION

AND GET TO A CONCLUSION

MENTAL MAPS

HOW OUR MIND DIGEST
THE COMPLEXITY OF SPATIAL
INFORMATION





**A VISUAL TURN?
AGAIN?
THE LAST ONE?**

COMPETITIVE ANALYSIS OF VISUAL TOOLS FOR ERLANG/ELIXIR

VISUALIXIR

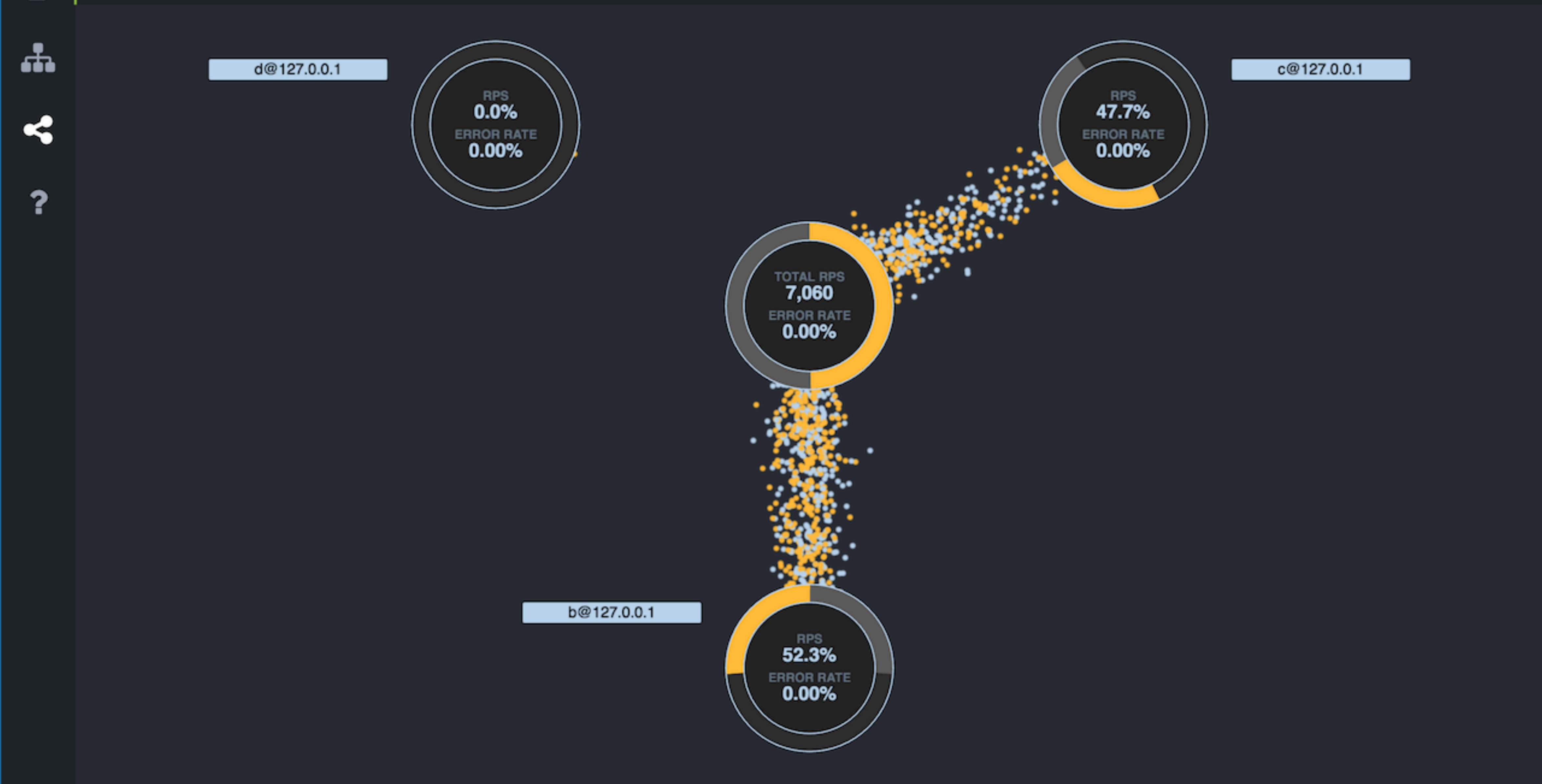
github.com/koudelka/visualixir

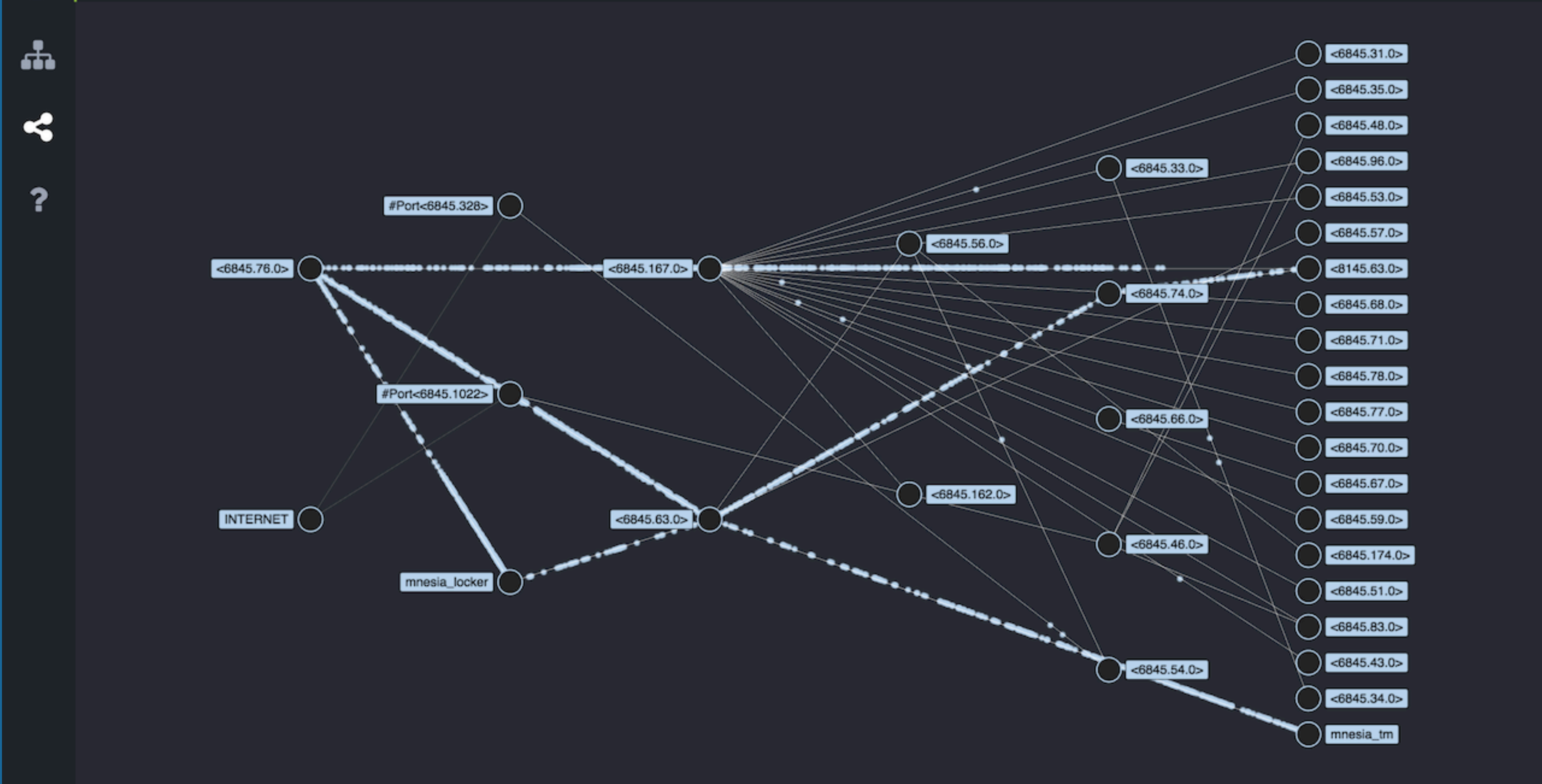
A process/message visualizer for BEAM nodes.

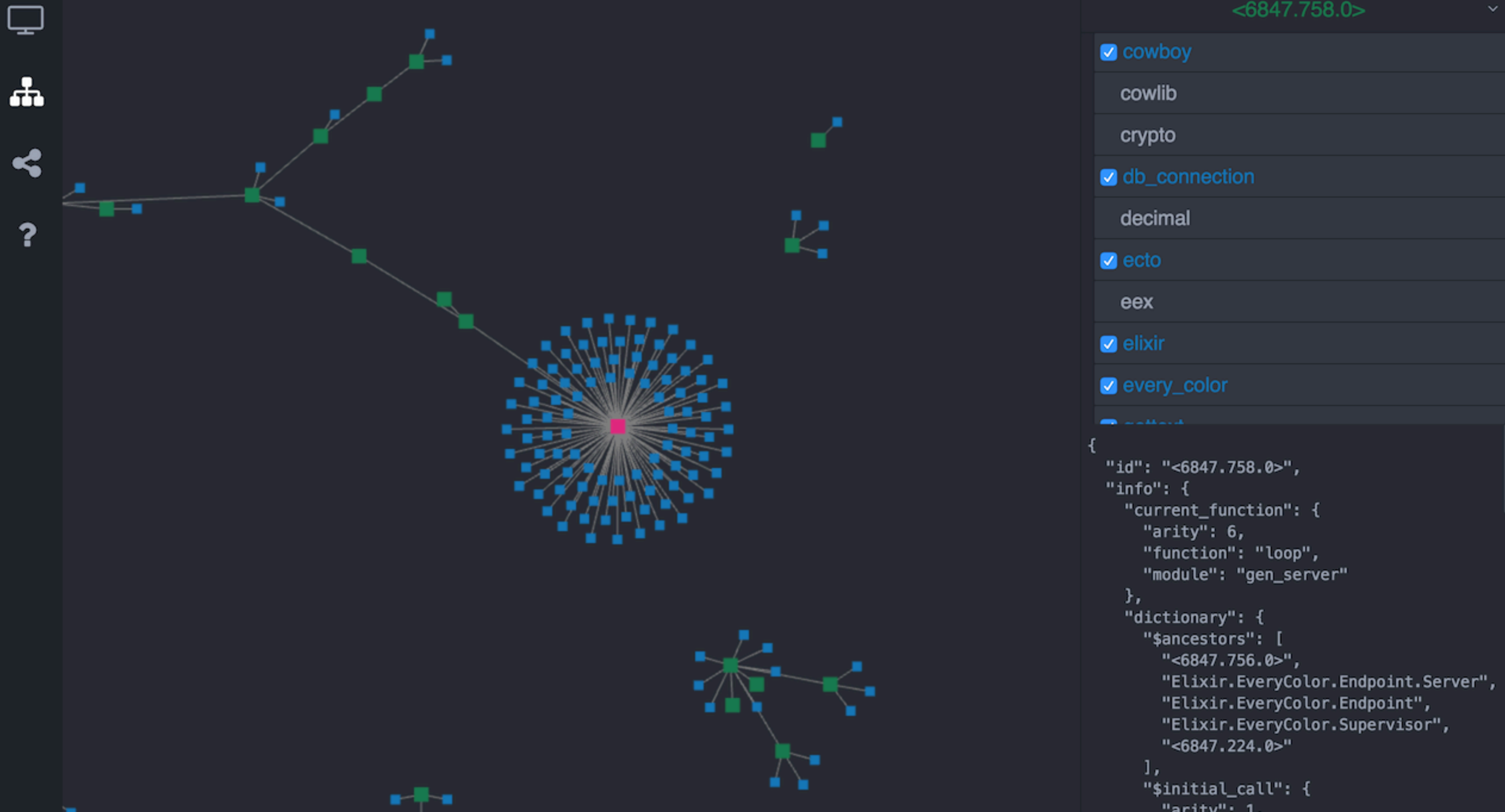
ERLANG PERFORMANCE LAB

<http://www.erlang.pl>

Apply Netflix's intuition engineering principles to the BEAM





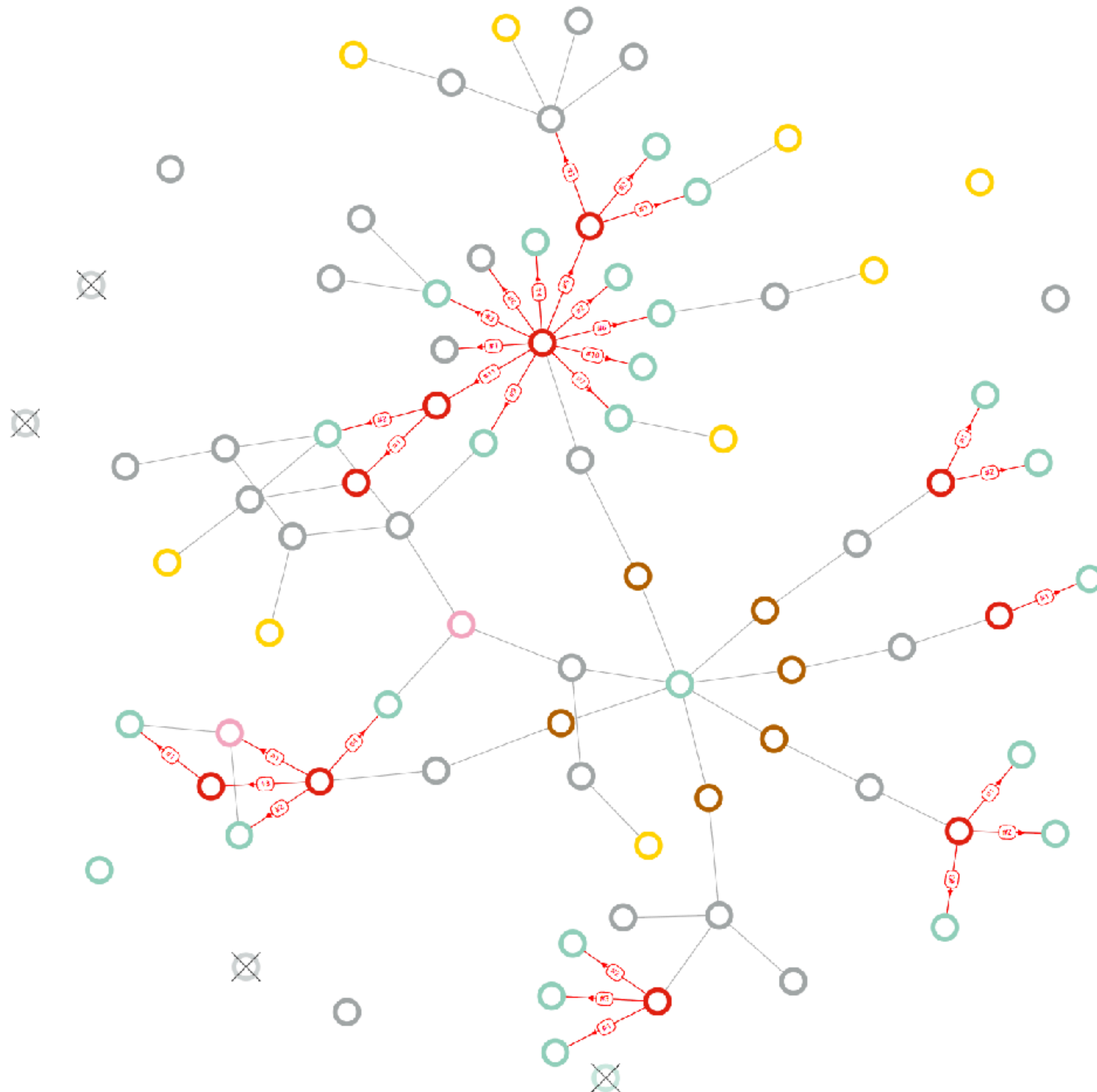


PAPARAZZI

How to spy on actors inside the
BEAM

RETHINKING SUPERVISION TREE VISUALISATION

paparazzi



Toggle visualisations

Node labels

Links

Supervision

Message tracing

Restart strategy

Dead processes

Actions

Purge dead

Clear message store

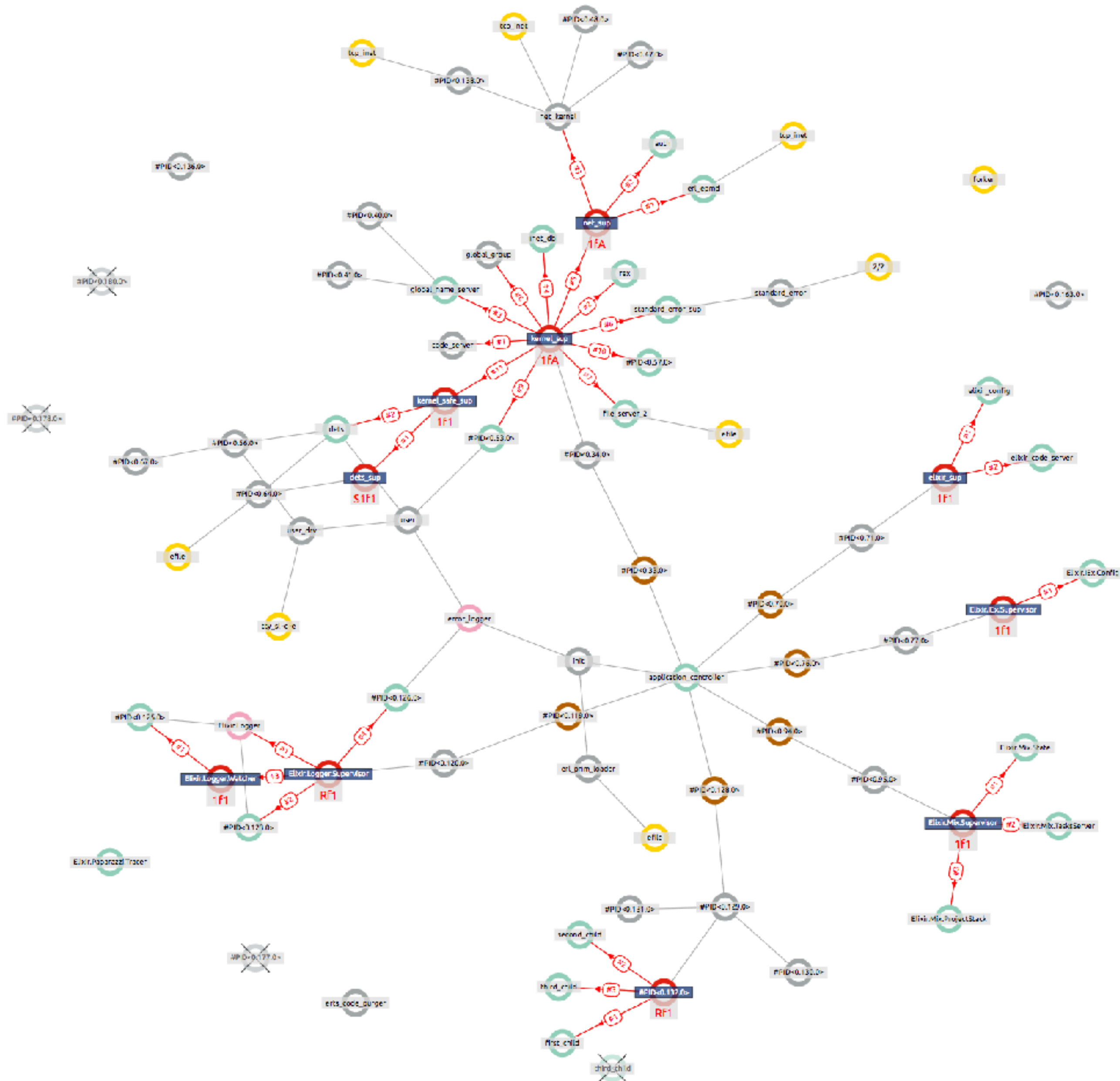
Stop all tracing

Start tracing everything

Pin all nodes

Unpin all nodes

paparazzi



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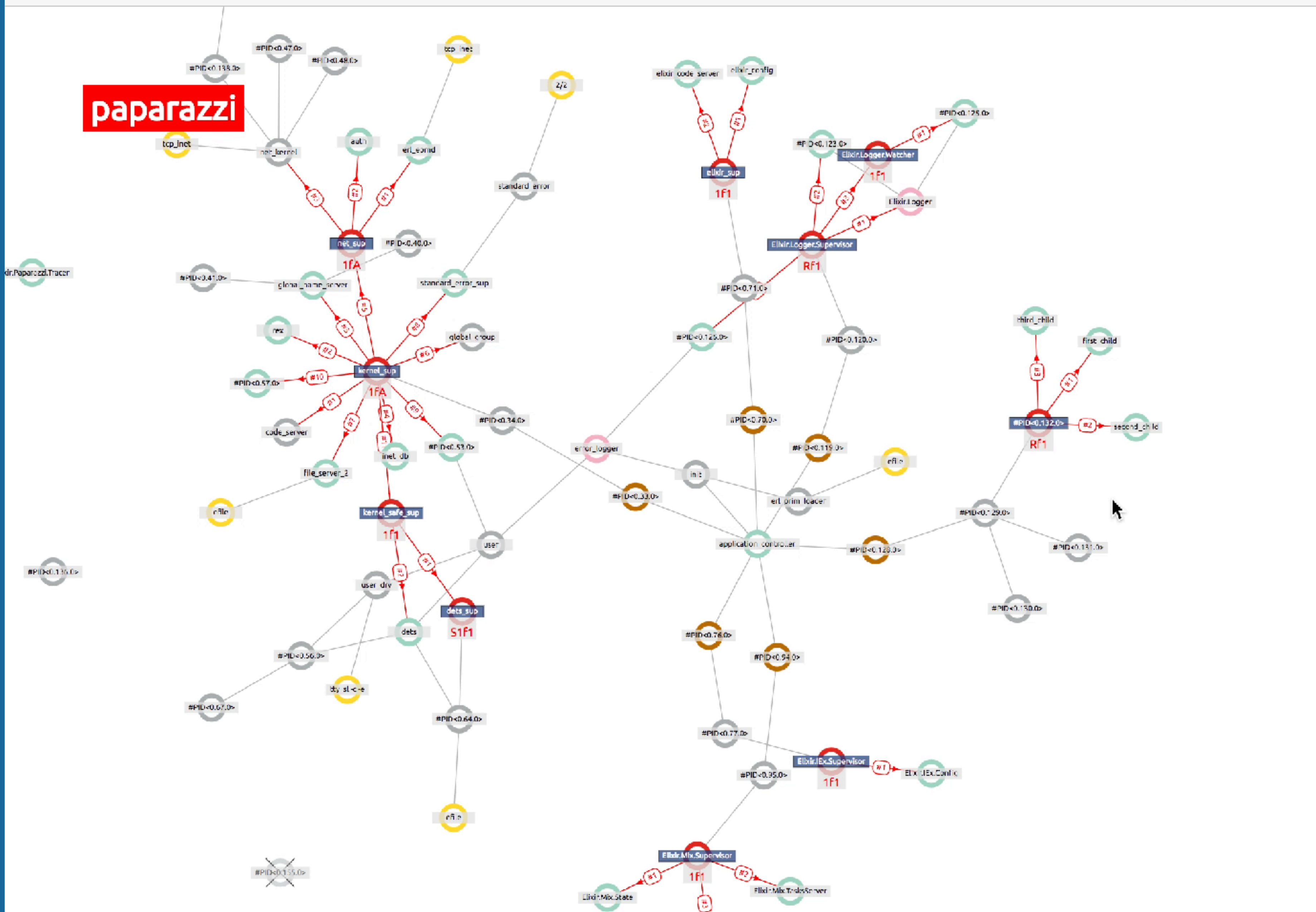
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Toggle visualisations

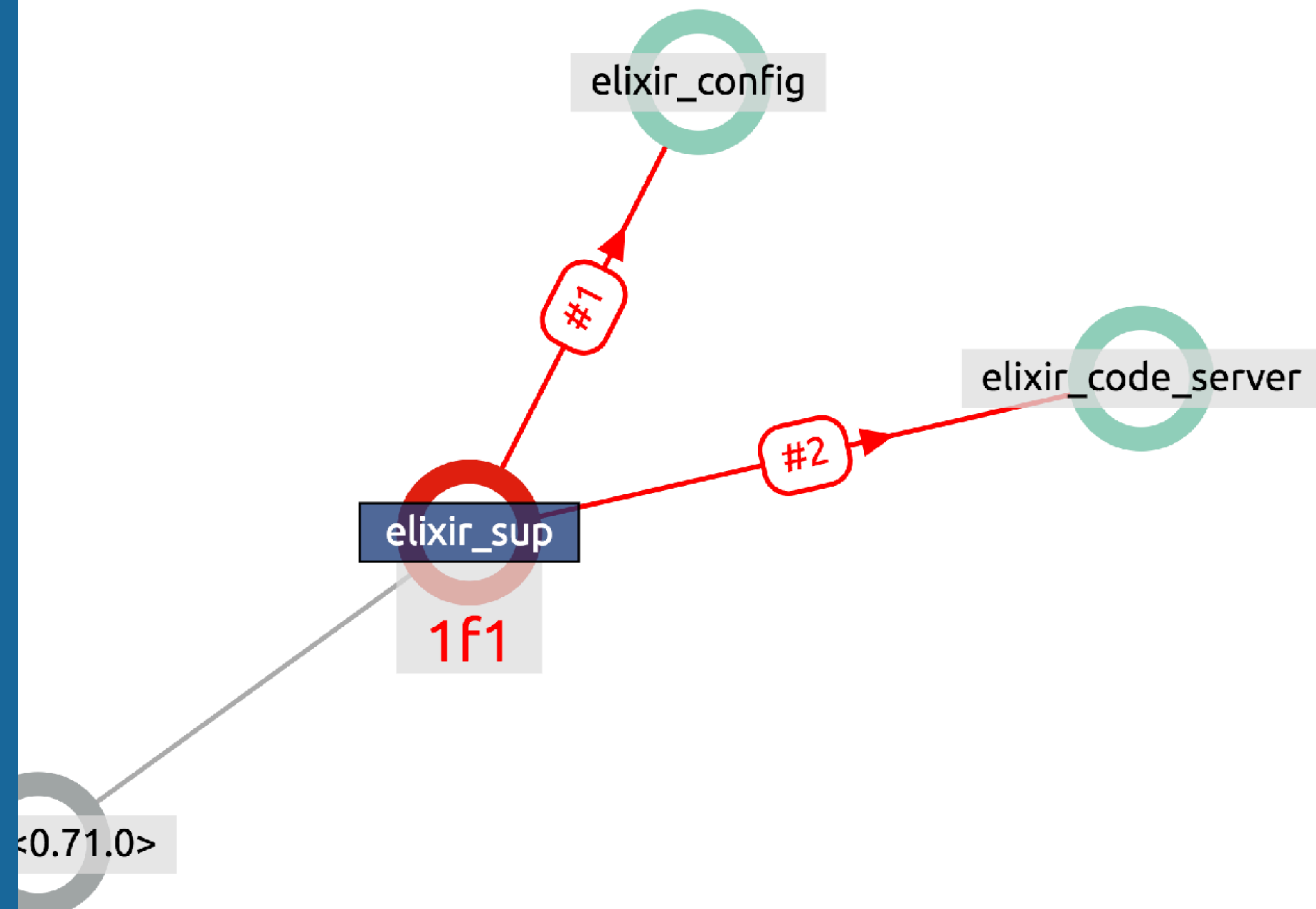
- Node labels
- Links
- Supervision
- Message tracing
- Restart strategy
- Dead processes

Actions

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- Clear message store
- Stop all tracing
- Start tracing everything
- Pin all nodes
- Unpin all nodes

VISUAL SUPERPOSITION

paparazzi



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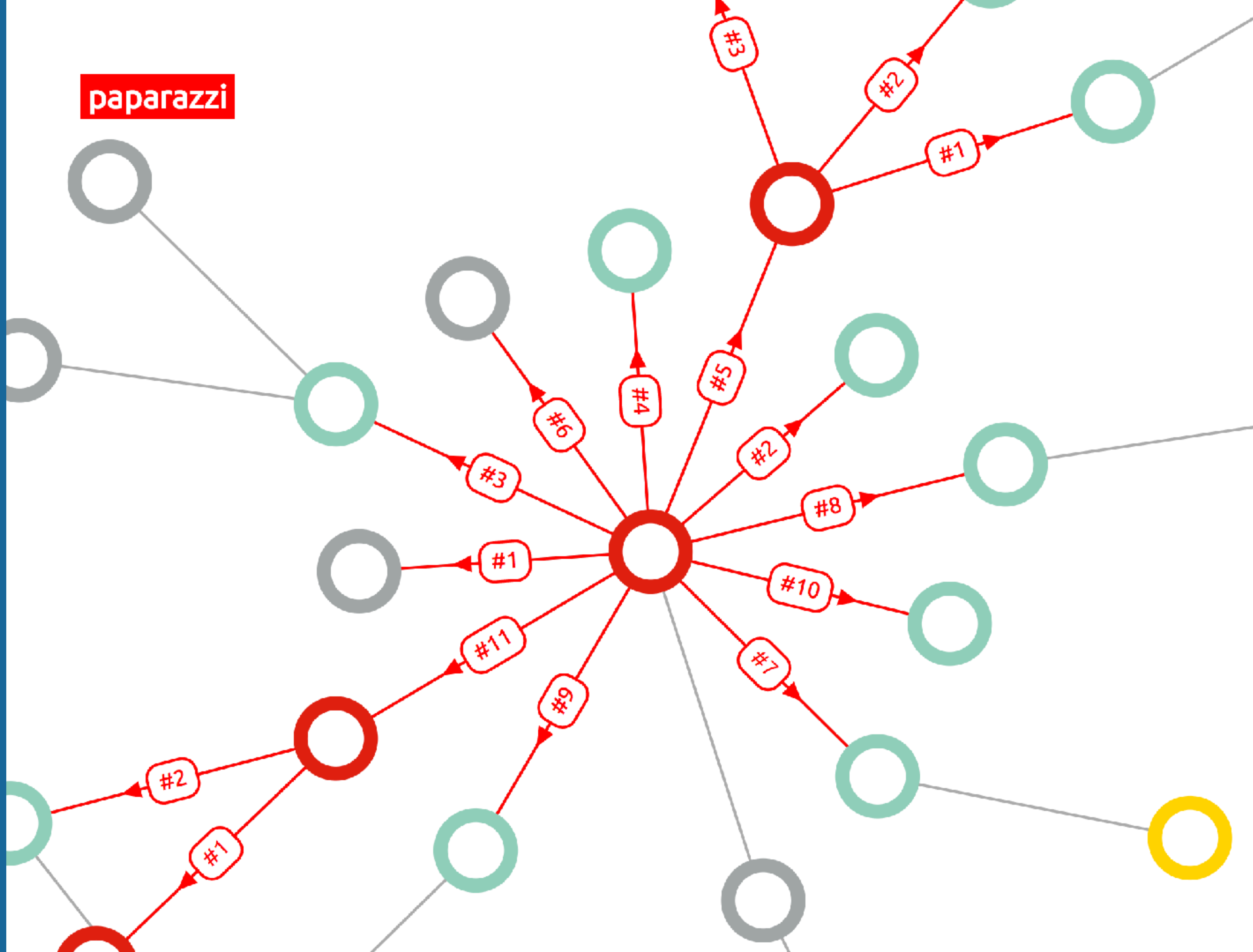
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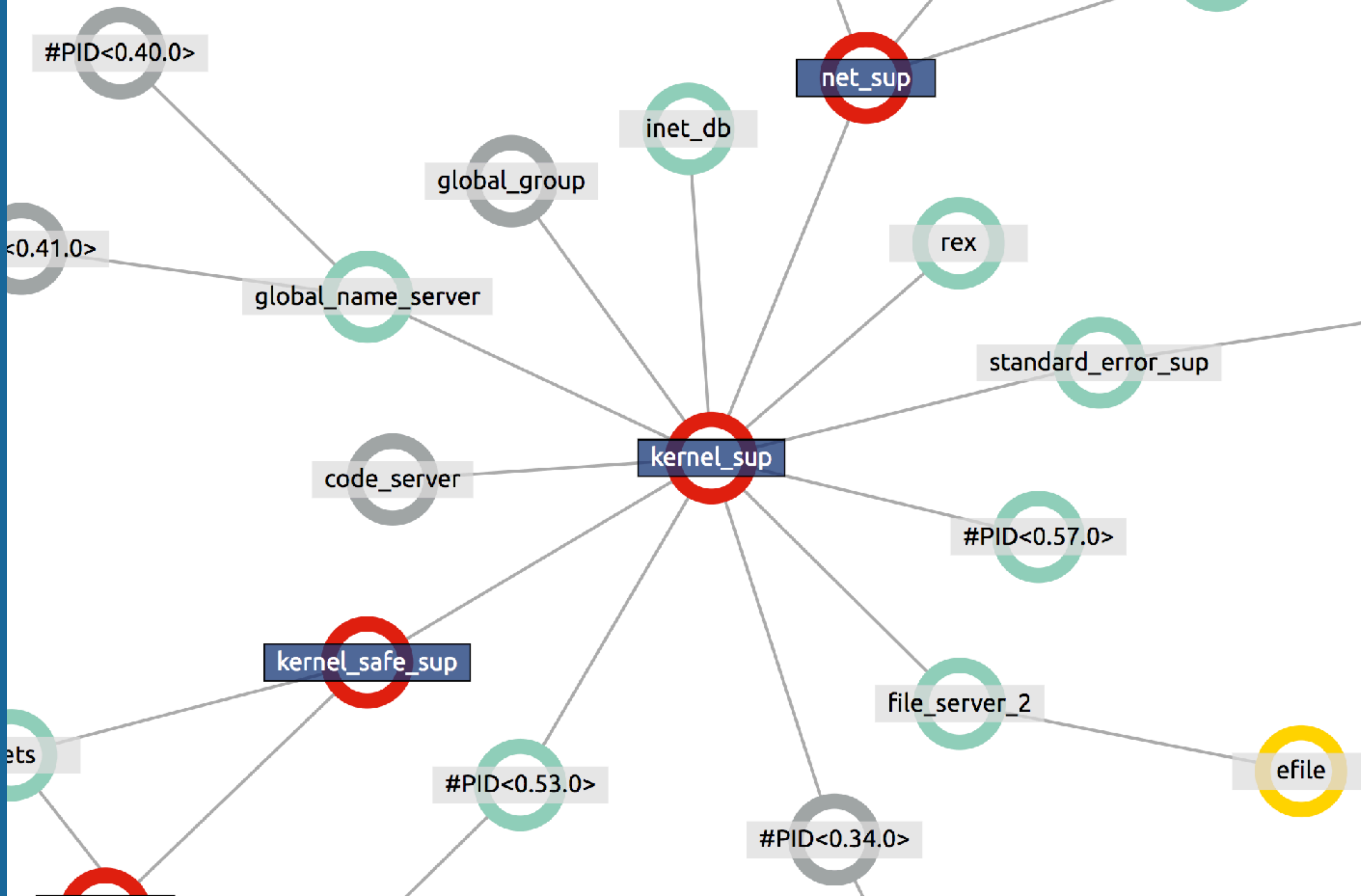
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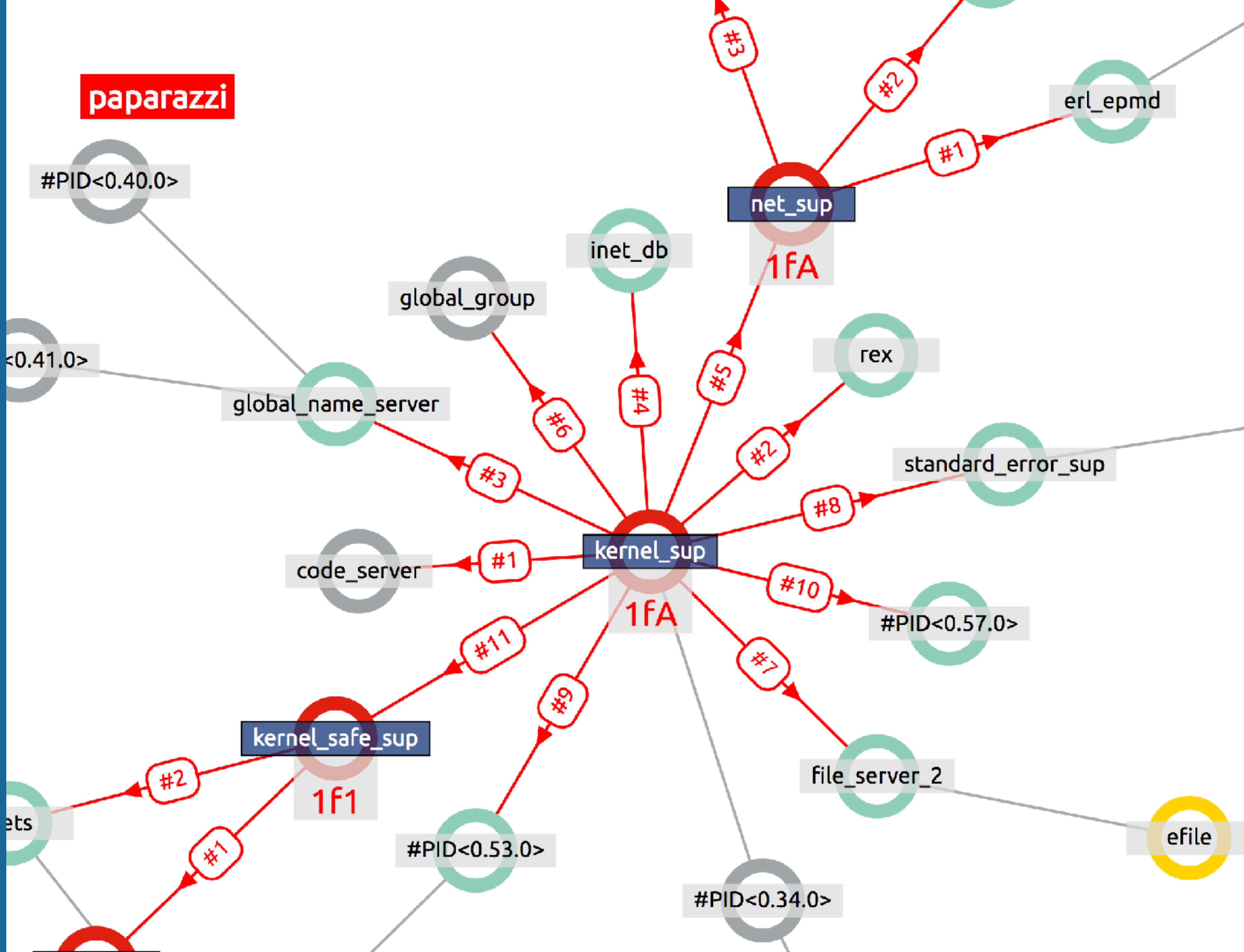
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INTERACTIVE FAULT-TOLERANCY TESTING



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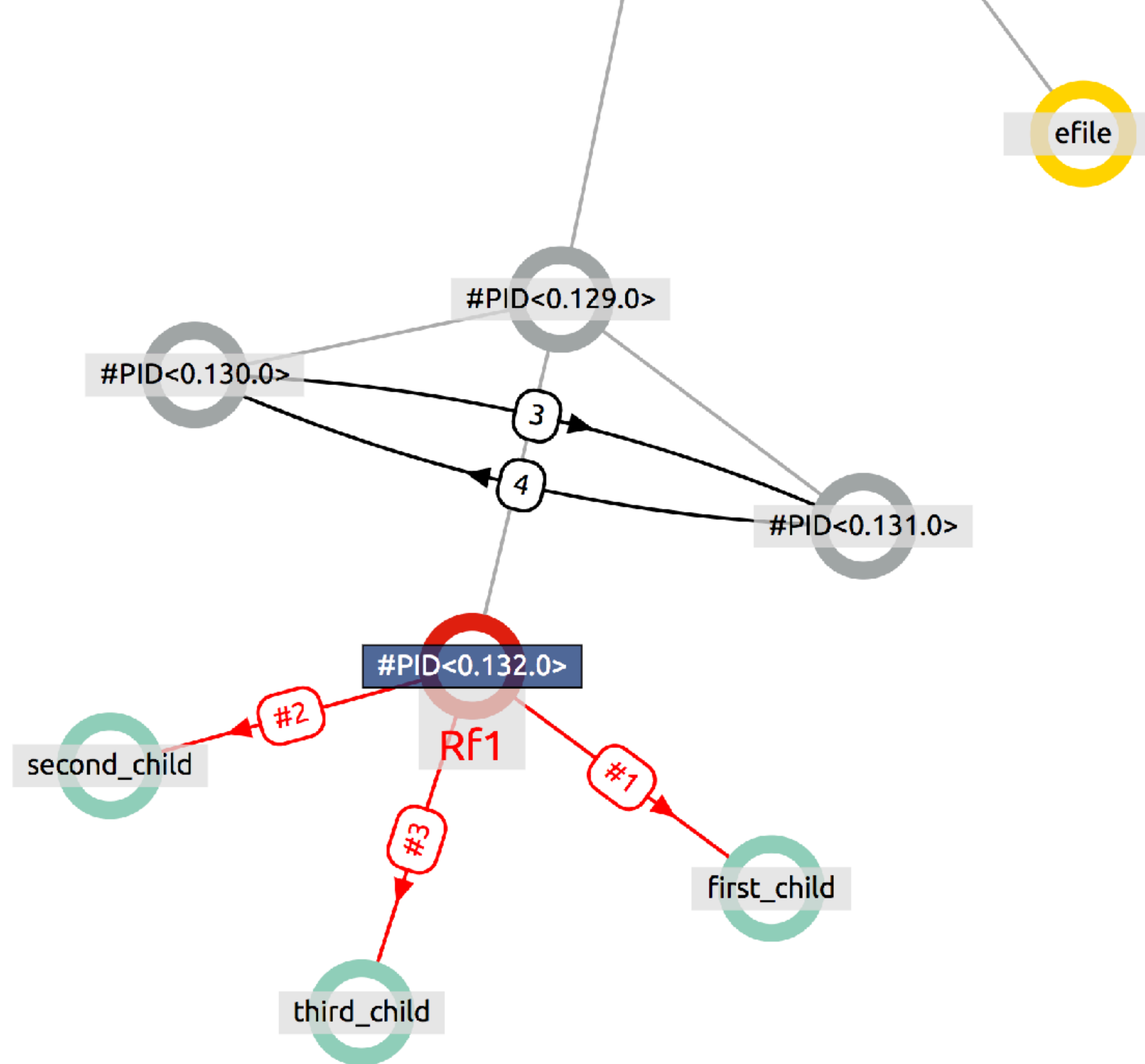
Start tracing everything

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CONTEXTUAL MESSAGE TRACING

paparazzi



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Unpin all nodes

From: #PID<0.131.0>

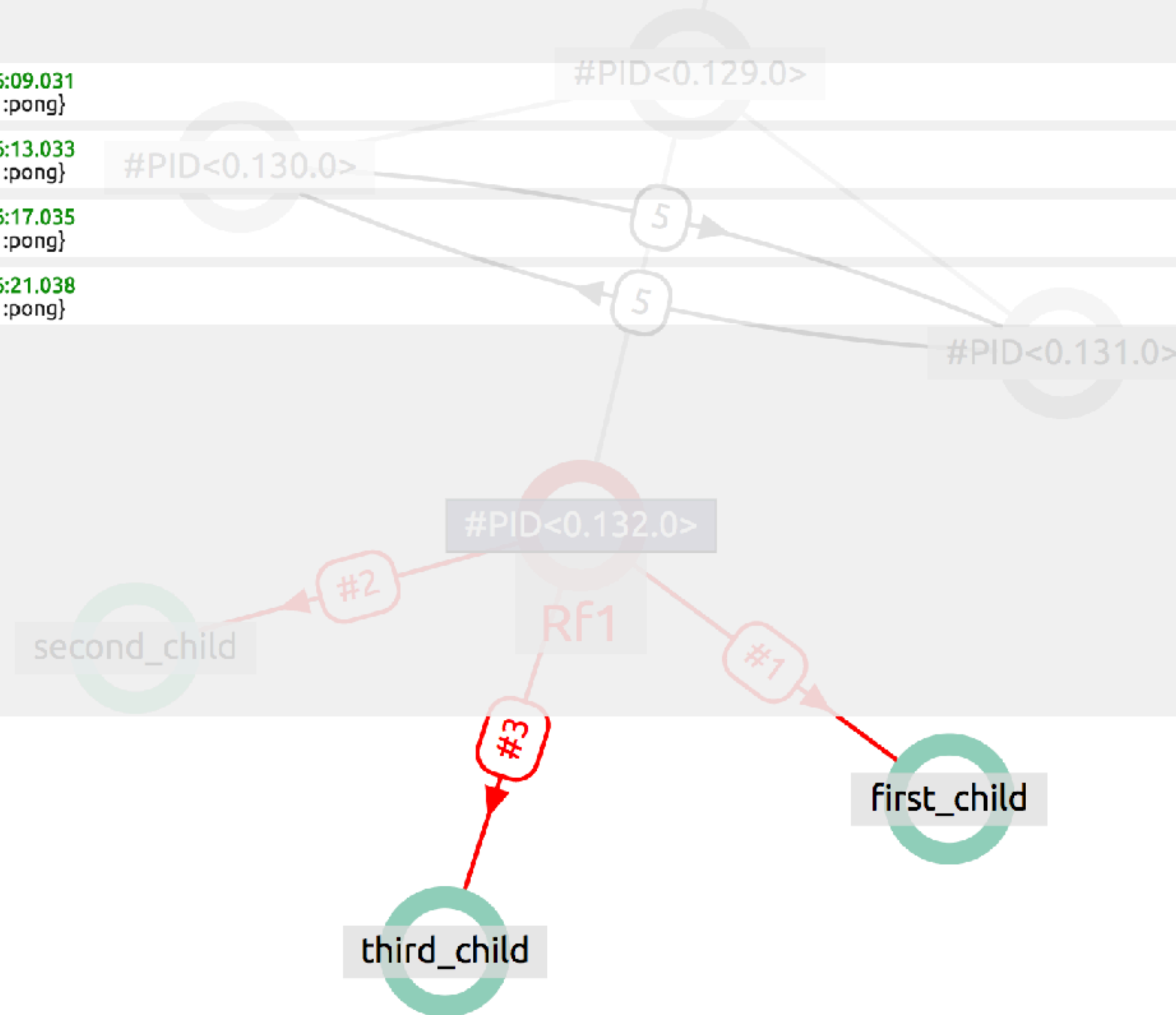
To: #PID<0.130.0>

(#1) 2017.05.04 13:36:09.031
{#PID<17645.131.0>, :pong}

(#2) 2017.05.04 13:36:13.033
{#PID<17645.131.0>, :pong}

(#3) 2017.05.04 13:36:17.035
{#PID<17645.131.0>, :pong}

(#4) 2017.05.04 13:36:21.038
{#PID<17645.131.0>, :pong}



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From: #PID<0.131.0>

To: #PID<0.130.0>

(#1) 2017.05.04 13:36:09.031
{#PID<17645.131.0>, :pong}

(#2) 2017.05.04 13:36:13.033
{#PID<17645.131.0>, :pong}

(#3) 2017.05.04 13:36:17.035
{#PID<17645.131.0>, :pong}

(#4) 2017.05.04 13:36:21.038
{#PID<17645.131.0>, :pong}

#PID<0.129.0>

#PID<0.130.0>

8

9

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rex

#PID<0.53.0>

From: #PID<0.54.0>

To: #Port<0.673>

(#1) 2017.05.04 13:37:17.578

{#PID<17645.54.0>, {:command, [1, 0, 0]}}

(#2) 2017.05.04 13:37:17.579

{#PID<17645.54.0>, {:command, [0 | "\n"]}}

(#3) 2017.05.04 13:37:17.612

{#PID<17645.54.0>, {:command, [5 | "\e[33m\e[35mnil\e[0m\e[33m\e[0m\n"]}}

(#4) 2017.05.04 13:37:17.612

{#PID<17645.54.0>, {:command, [0 | "iex(pingpong@vamosimbpro)3> "]}}

(#5) 2017.05.04 13:37:17.716

{#PID<17645.54.0>, {:command, [1, 0, 0]}}

(#6) 2017.05.04 13:37:17.716

{#PID<17645.54.0>, {:command, [0 | "\n"]}}

(#7) 2017.05.04 13:37:17.719

{#PID<17645.54.0>, {:command, [5 | "\e[33m\e[35mnil\e[0m\e[33m\e[0m\n"]}}

(#8) 2017.05.04 13:37:17.720

{#PID<17645.54.0>, {:command, [0 | "iex(pingpong@vamosimbpro)4> "]}}

(#9) 2017.05.04 13:37:17.854

{#PID<17645.54.0>, {:command, [1, 0, 0]}}

(#10) 2017.05.04 13:37:17.855

{#PID<17645.54.0>, {:command, [1, 0, 0]}}

user_drv

user

tty_sl -c -e

error

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KEY LEARNINGS

**SCALABILITY
EVERYWHERE**

FUTURE PLANS

**[HTTPS://GITHUB.COM/
DIGITALNATIVES/PAPARAZZI](https://github.com/DigitalNatives/PAPARAZZI)**

THANK YOU! QUESTIONS?

@DVAMOSI

[HTTPS://GITHUB.COM/
DANIELVAMOSI](https://github.com/DanielVamosi)