Perl::Formance

Steffen "renormalist" Schwigon

10 Years Dresden Perl Mongers

21 August 2012

Intro

Results

Summary

End

Intro

- "We suck at benchmarketing."

Intro

- There is hope.

Intro

- Numbers become better.

Intro

- First conclusions now.

Intro

- Oversimplification ahead!

Functions and OO

- Subs and methods: **11% faster**
    - during 5.10..5.14+
- Methods **50% slower** than subs
    - selfmade/Moose/Mouse - nearly the same
    - **Moose even faster than selfmade** (?)

Threads

- Threads ~**33% faster**
  - during 5.13

Regex engines

- pathological regexes: all regex engines at **similar basic speed**
  - RE2, Lua, Oniguruma, Plan9
  - POSIX: results under construction

Regexes

- Regexes became ~**8% slower** in 5.14.0
    - vs. 5.12
    - **back to normal** in 5.14.2

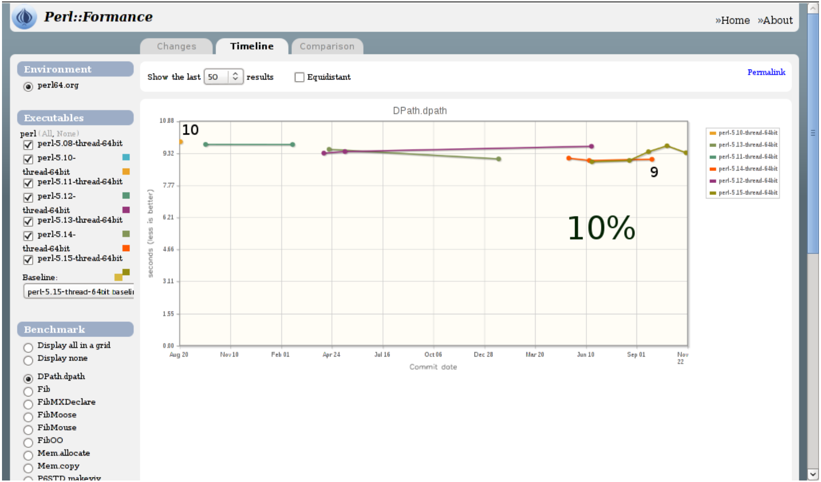
Language Shootout

- Shootout benchmarks **1% .. 15% faster** in 5.14
  - vs. 5.12

Results

- Show real graphs!

DPath.dpath



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Changes | **Timeline** | Comparison

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● perl64.org

Executables

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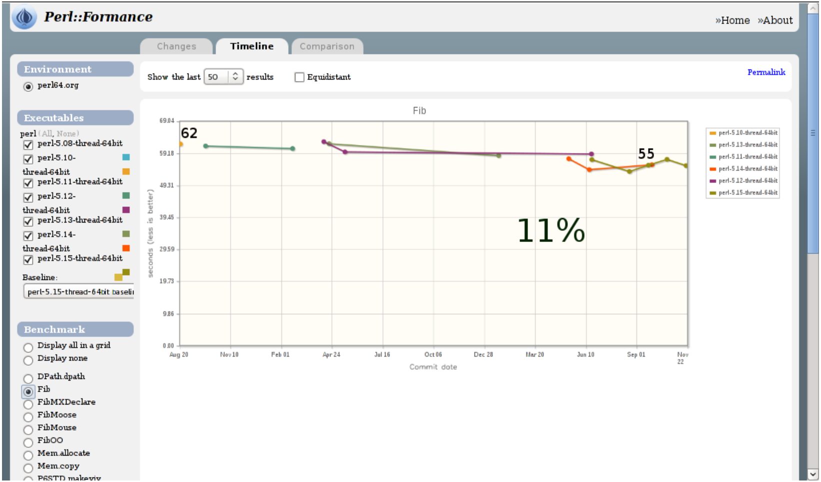
- ○ Mem.allocate
- ○ Mem.copy
- ○ P6STD.makeviv

Show the last 50 results ☐ Equidistant

Permalink

Fib



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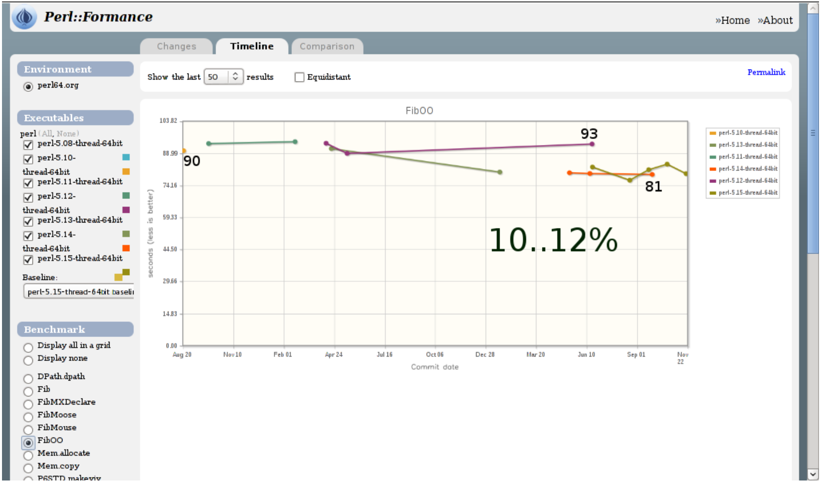

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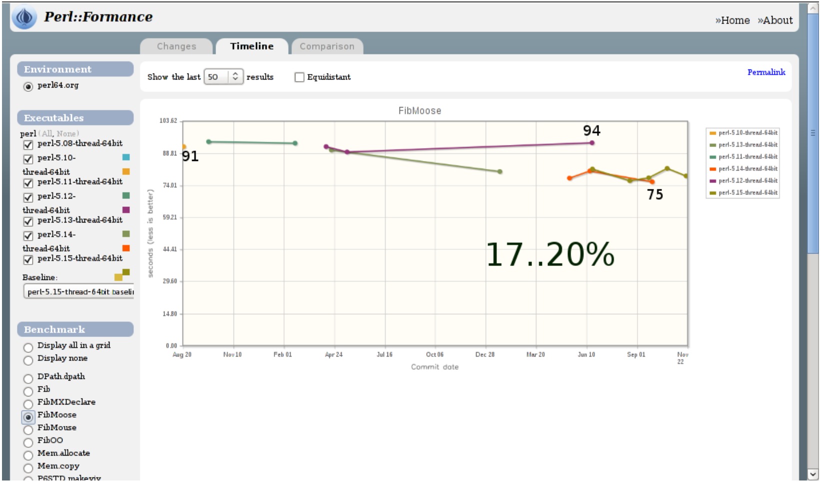
FibMoose



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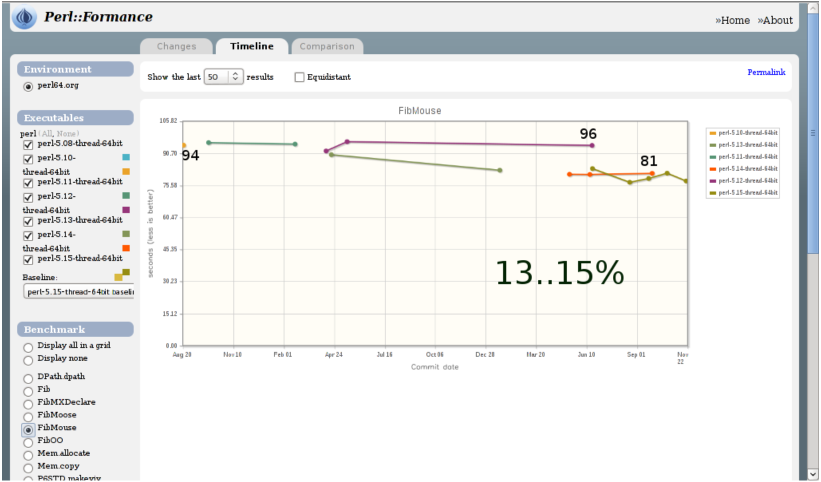

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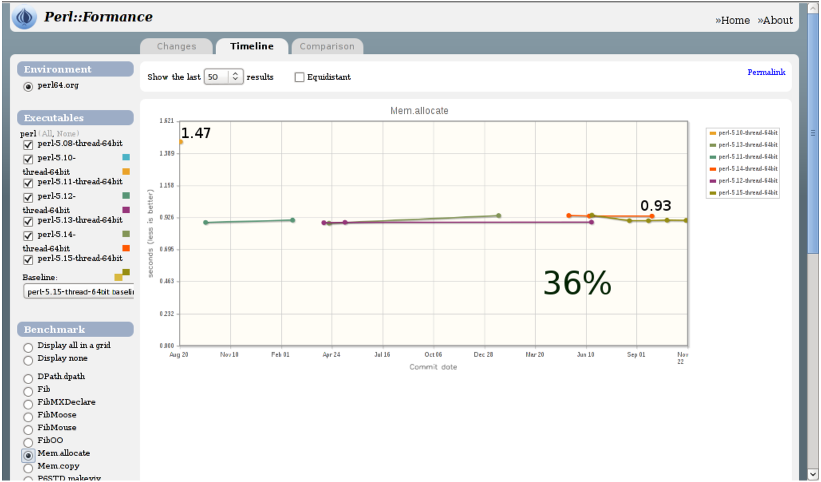
13..15%

Mem.allocate



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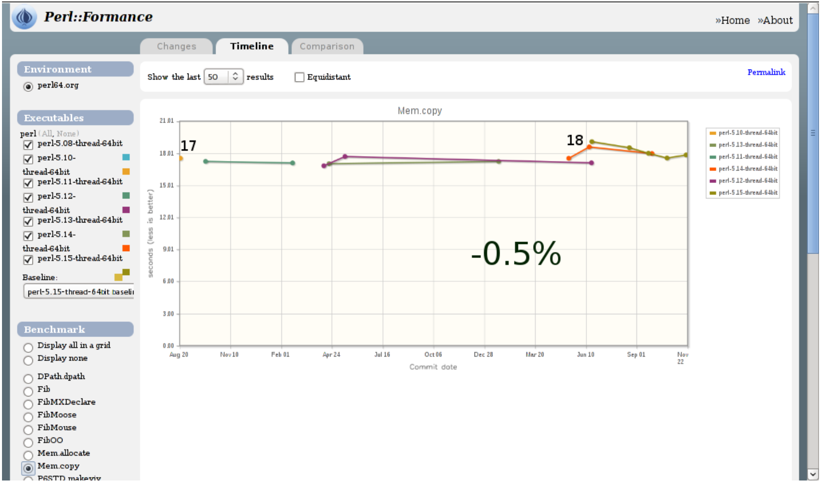
Mem.copy



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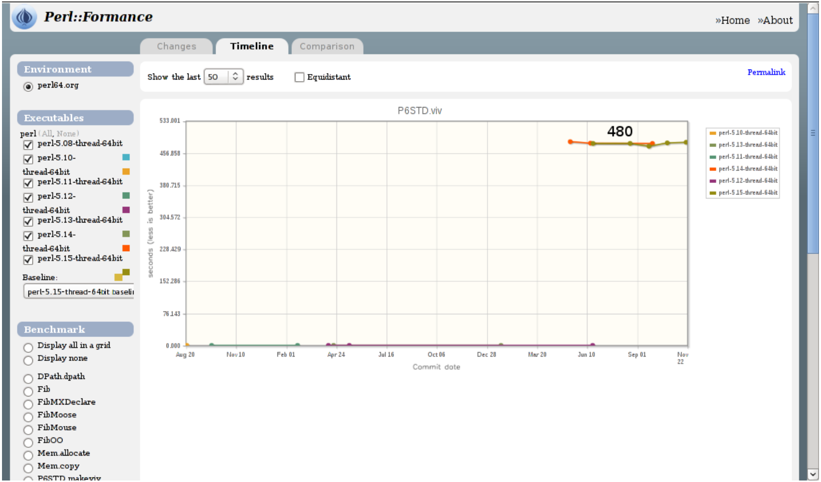
P6STD.viv



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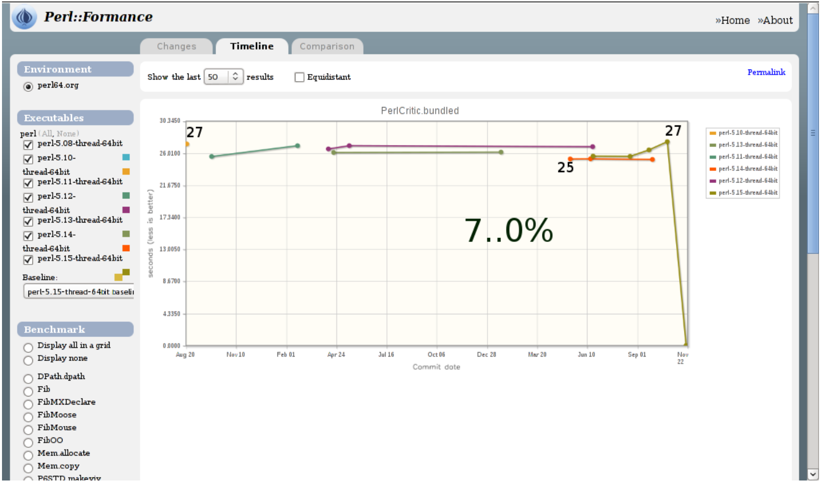
PerlCritic



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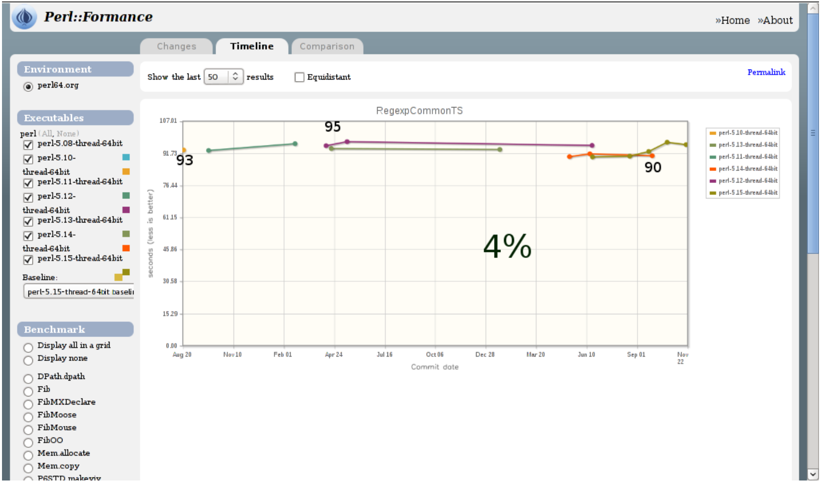
RegexpCommonTS



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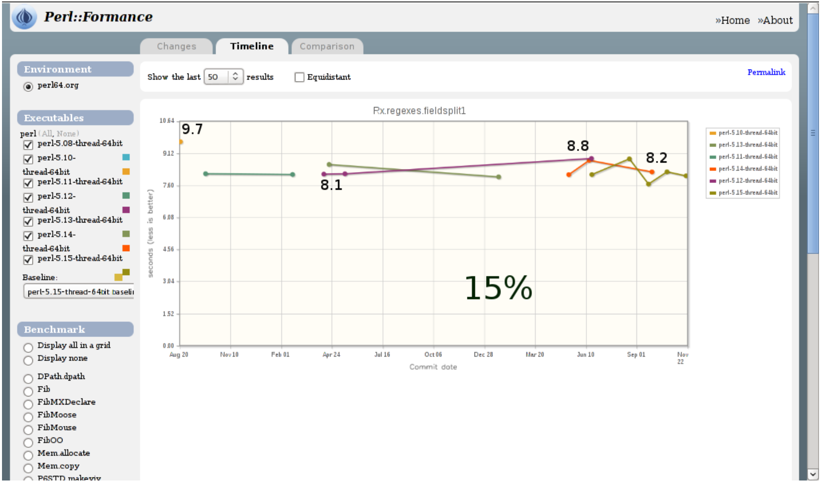
Rx.regexes.fieldsplit1



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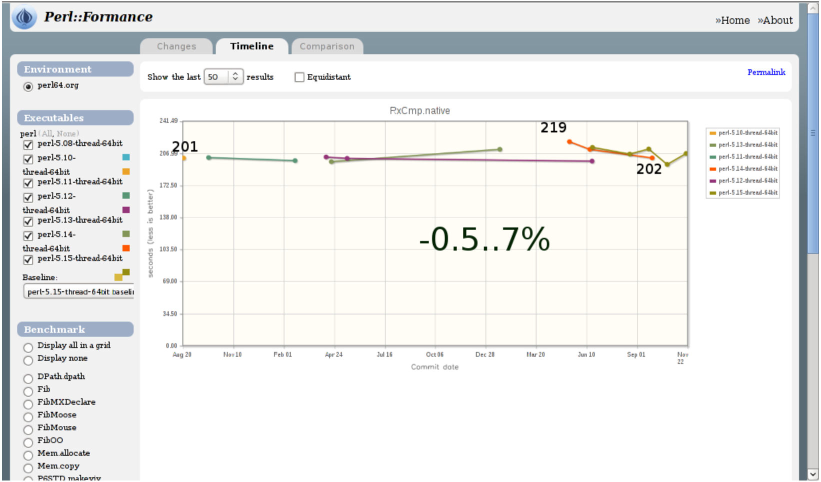
RxCmp.native



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perl-5.15-thread-64bit baseli

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Permalink

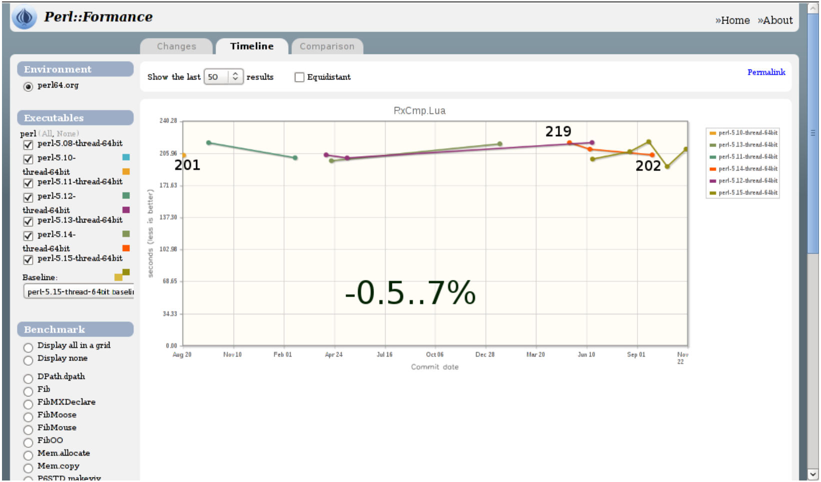
201

219

202

-0.5..7%

RxCmp.Lua



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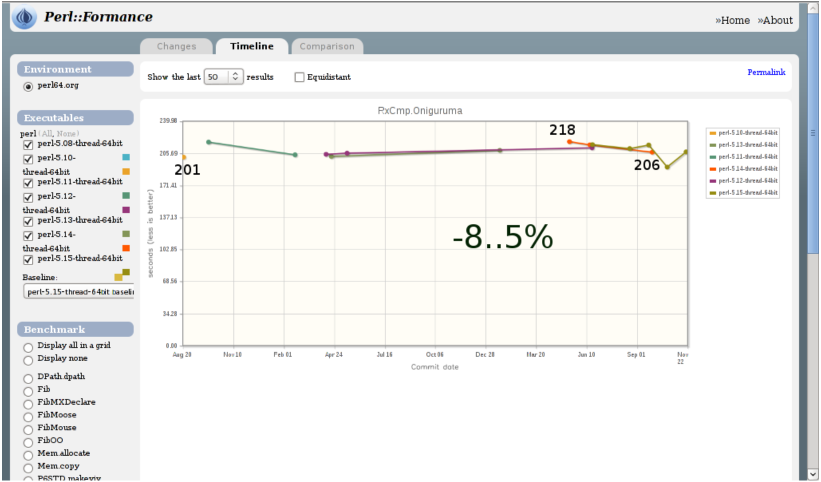
RxCmp.Oniguruma



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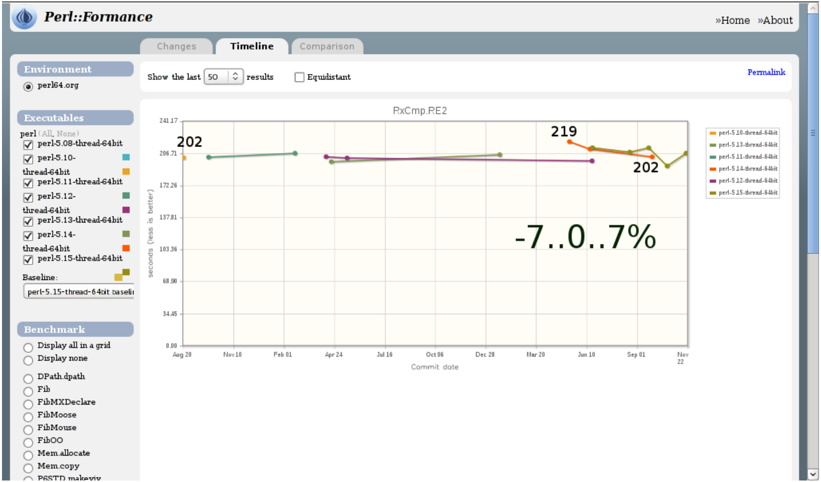
RxCmp.RE2



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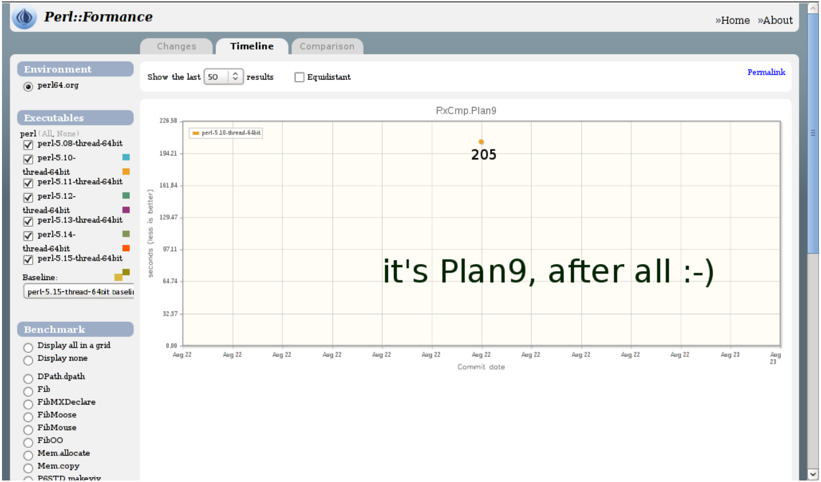
RxCmp.Plan9



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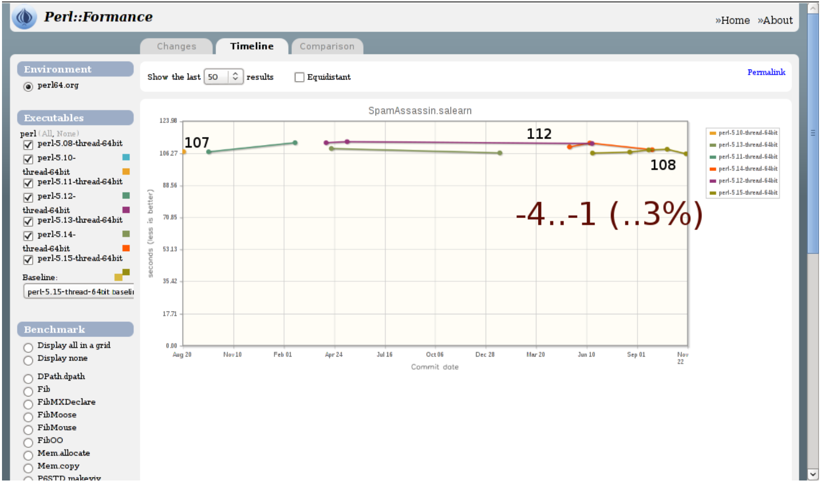
Permalink

it's Plan9, after all :-)

SpamAssassin.salearn



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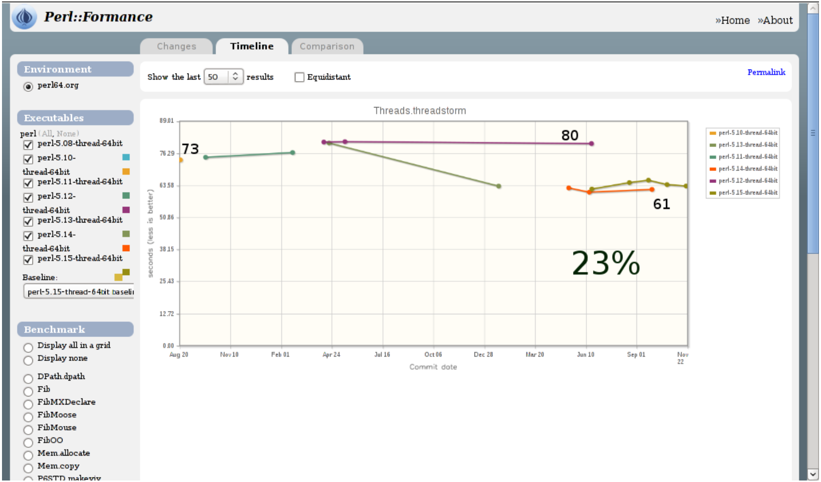
107

112

108

-4..-1 (..3%)

Threads.threadstorm



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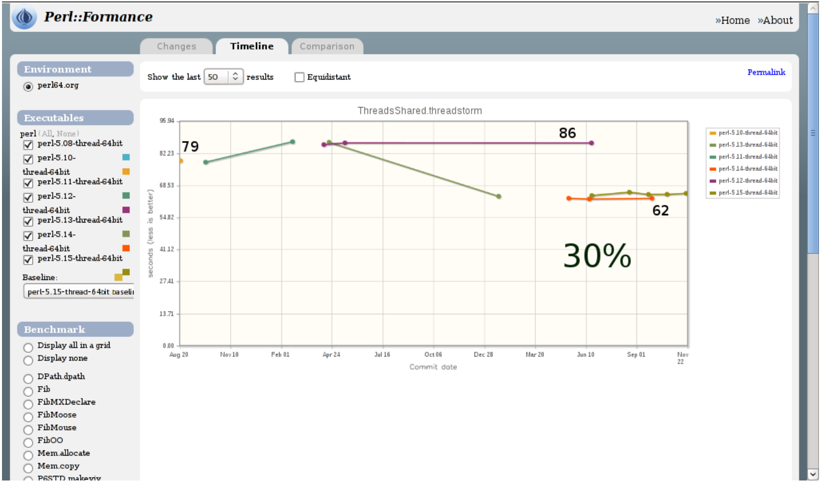
ThreadsShared.threadstorm



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More numbers at

- http://perlformance.net

Summary

- 5.12 was slow
- 5.14 became faster
- 5.16 kept flat
- Micro improvements don't help macro workloads yet
  - SpamAssassin
- Do more variation for deeper understanding
  - non-threaded
- http://perlformance.net

End