

Linked in™

IPv6@LinkedIn



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Our vision is to create economic opportunity for every member of the global workforce.

Jeff Weiner



THE ECONOMIC GRAPH



Members

450M



Companies

10M



Jobs

6M



Skills

10B

Endorsements



Schools

27k



Knowledge

478k

Daily posts

Why does IPv6 matter @LinkedIn?

IPv4 is running out

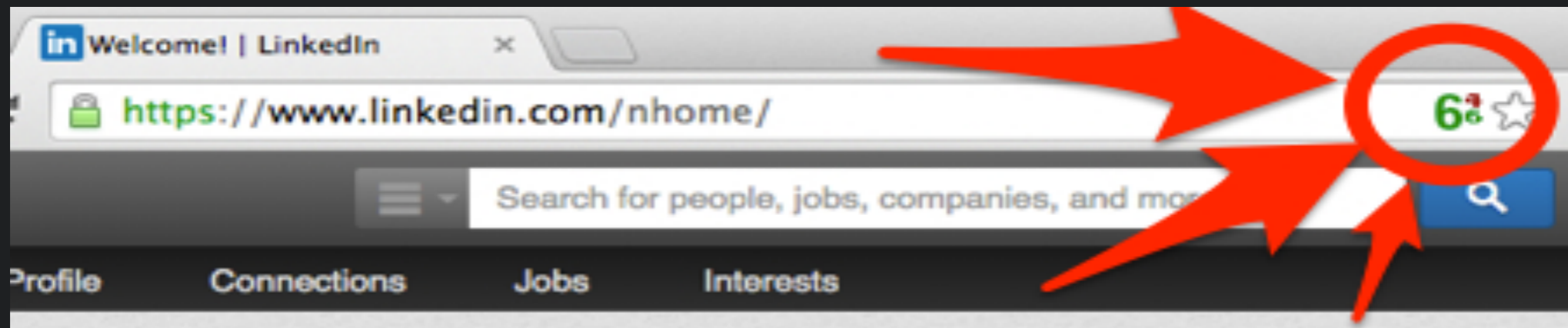
- IANA exhausted free /8 pool Feb 2011
- APNIC final /8
- ARIN free pool depleted

IPv6 performs better

- Strong data for mobile users
- Continued high growth with mobile carriers



LinkedIn IPv6 launch



Launched September 8th 2014

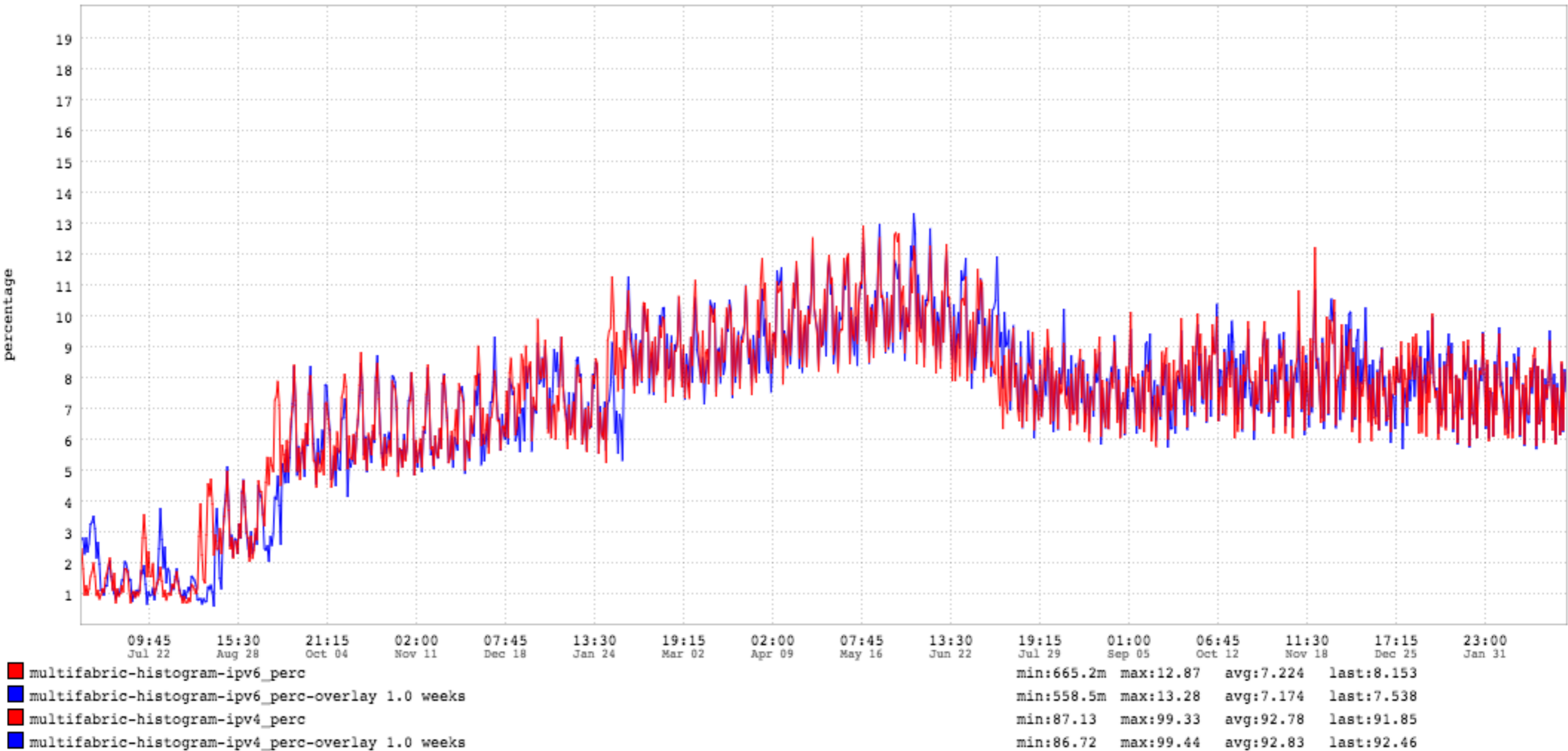
One year of work to transition

Multiple testing of site with real user traffic

Zero site outage

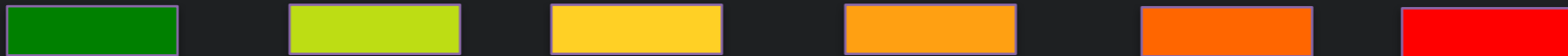
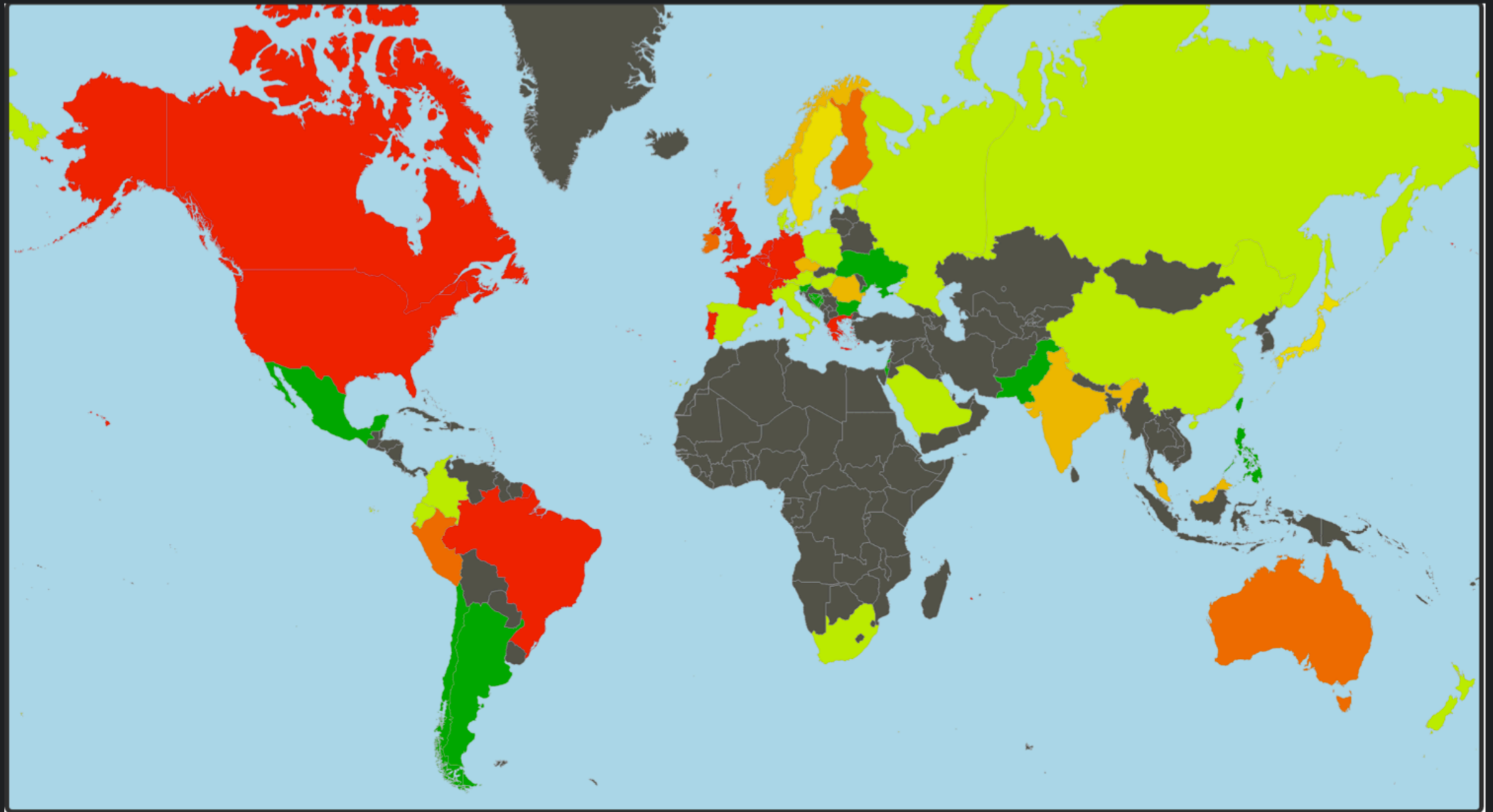
IPv6 growth at LinkedIn

10proxy - WoW ipv6 current client connections



10% of LinkedIn traffic is IPv6

IPv6 global heatmap



Rum – Real User Monitoring

```
Elements Network Sources Timeline Profiles
<top frame>
> rumTiming = window.performance.timing;
  ▶ PerformanceTiming {loadEventEnd: 1405967695234,
    domContentLoadedEventEnd: 1405967695225,
  }
> rumTiming.connectEnd - rumTiming.connectStart
136
> rumTiming.responseEnd - rumTiming.responseStart
401
> |
```

Most browsers support RUM

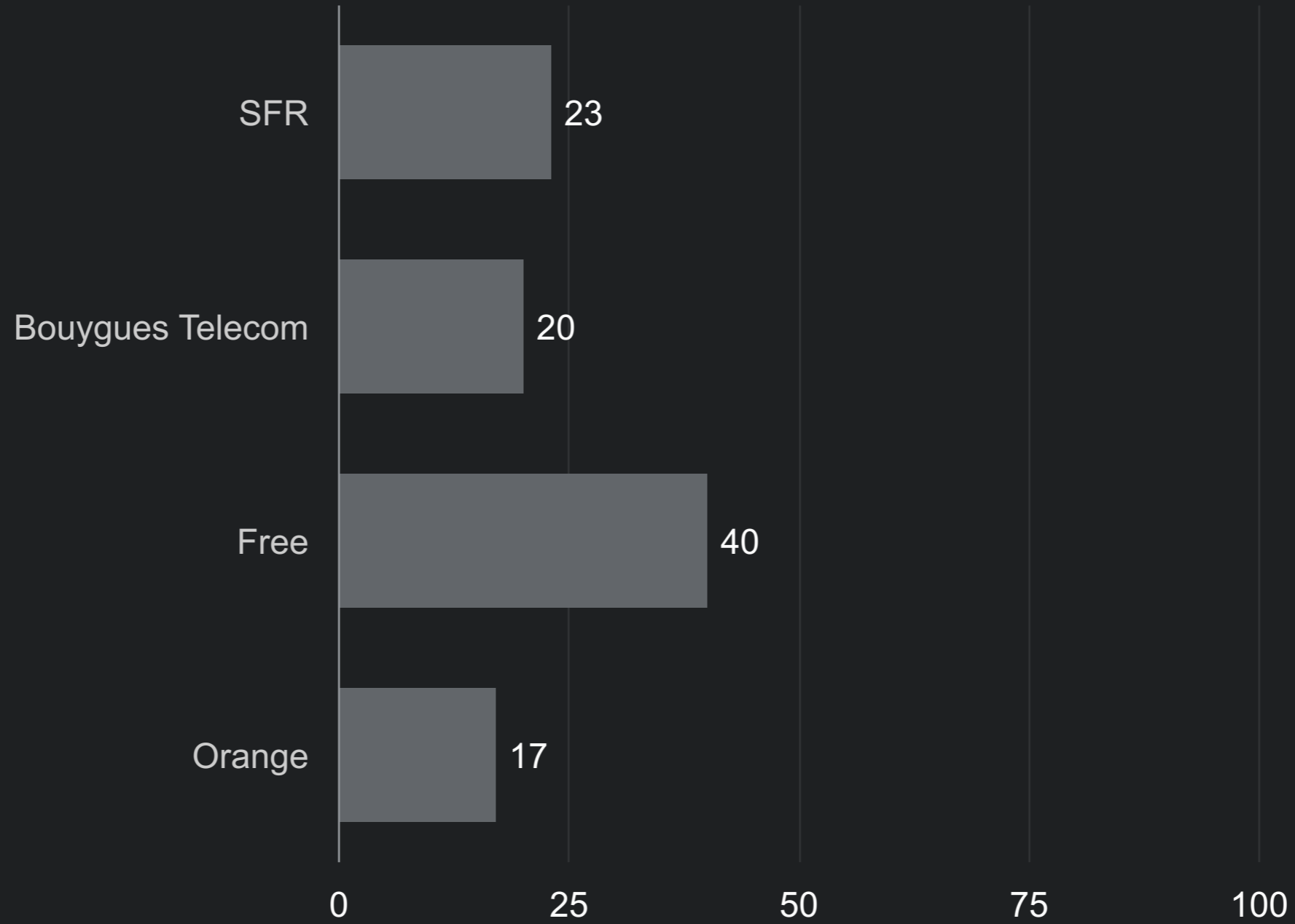
Navigation timing API

- Browsers record performance timers for each payload.

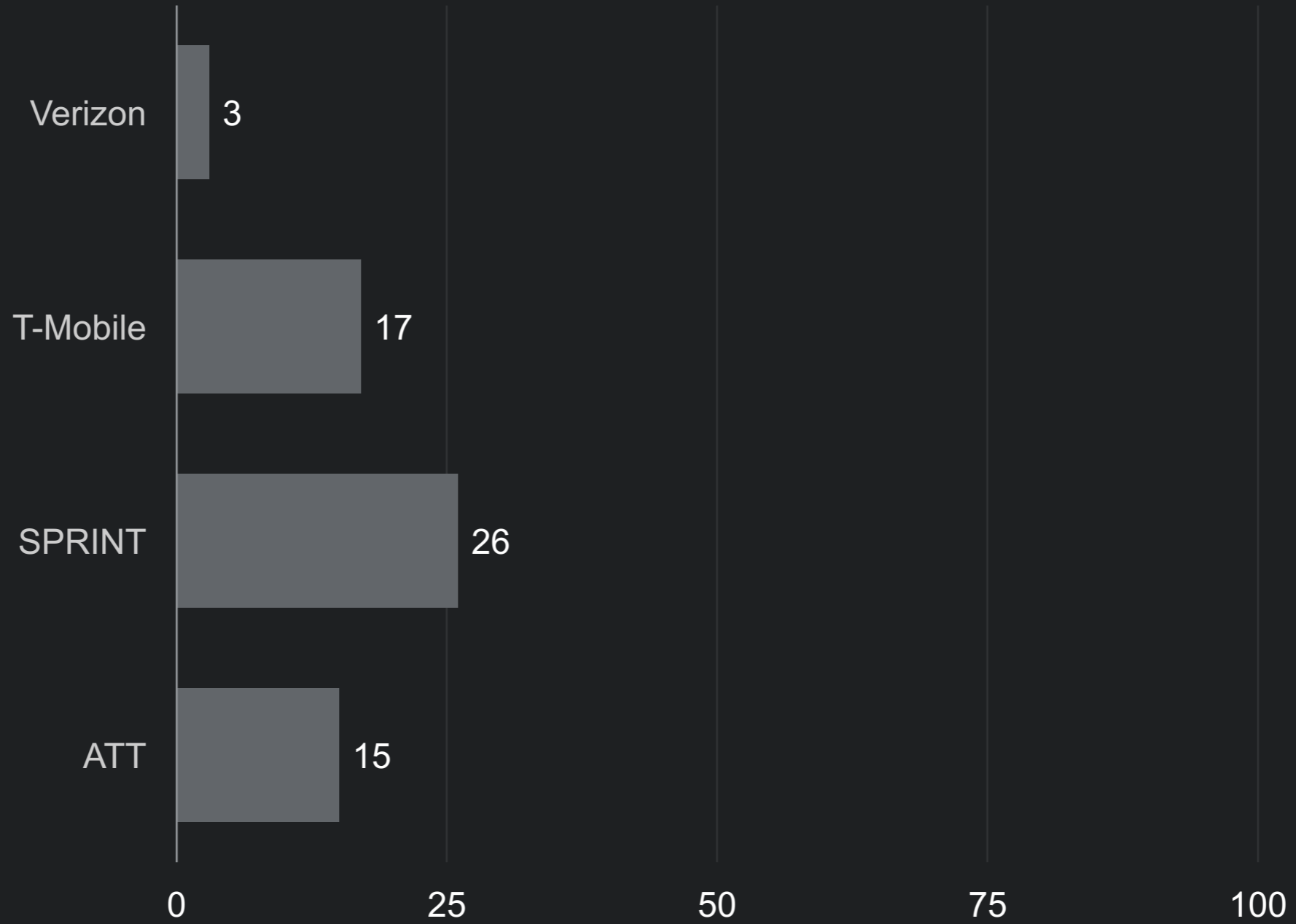
Mobile end-end control

- Client/Server control gives full visibility
- Light weight beacon

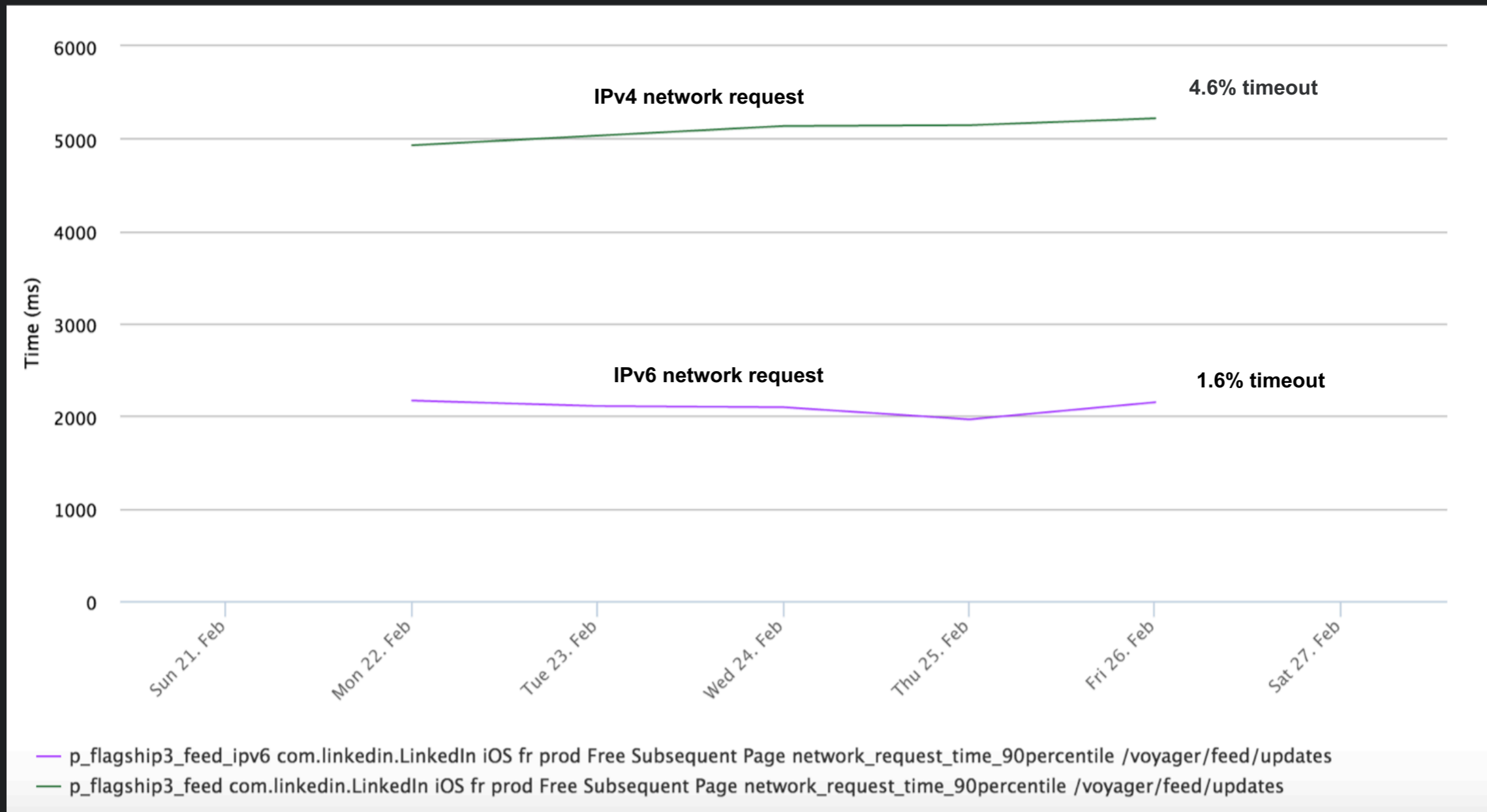
Mobile Performance (France)



Mobile Performance (USA)



IPv6/IPv4 timeout



Higher network request time means higher TCP timeouts yielding in higher page download load times.



