



DrupalCon

NASHVILLE **2018**
APRIL 9-13



DrupalCon
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Get a perfect 100 in Google PageSpeed

and what will happen if you don't



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 @mcarper

Your site just went live
after being under
construction for months



You have varnish, redis,
fastly, and cloudfront!
Hosted on a x-large
superjumbo instance with
failovers for the failovers



You are ready
for anything.



But how well will your site perform on a slow internet connection?



You have HTTP 2 up and running! The site should be faster than lightning since it's behind a CDN!



But you wonder, is there a tool that will show me if my site is fast?



https://developers.google.com/speed/pagespeed/insights

PageSpeed Tools > Insights

GUIDES

REFERENCE

SAMPLES

SUPPORT

PageSpeed Insights



Make your web pages fast on all devices.

ANALYZE

Web Performance

Learn more about [web performance tools at Google](#).

Give Feedback

Have comments or questions about PageSpeed Insights?
[Discuss on our mailing list.](#)

About PageSpeed Insights

PageSpeed Insights analyzes the content of a web page, then generates suggestions to make that page faster. [Learn more.](#)

Ideally this is what you want.

Speed Unavailable	Optimization Good 100 / 100
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Data about the real-world performance of this page was [unavailable](#). PageSpeed Insights was still able to analyze this page to find potential optimizations. Applying these optimizations may improve the speed of this page. Please investigate the recommendations below. [Learn more](#).

Speed data is available for <https://www.google.com>.

Page Stats

PSI estimates this page requires 0 additional round trips to load render blocking resources and 0.0 MB to fully render. The median page requires 4 round trips and 2.7 MB. Fewer round trips and bytes results in faster pages.

Optimizations Already Present

Avoid landing page redirects

Your page has no redirects. Learn more about [avoiding landing page redirects](#).

Eliminate render-blocking JavaScript and CSS in above-the-fold content

You have no render-blocking resources. Learn more about [removing render-blocking resources](#).

Enable compression

You have compression enabled. Learn more about [enabling compression](#).

Leverage browser caching

You have enabled browser caching. Learn more about [browser caching recommendations](#).

Minify CSS

Your CSS is minified. Learn more about [minifying CSS](#).

Minify HTML

Your HTML is minified. Learn more about [minifying HTML](#).

Minify JavaScript

Your JavaScript content is minified. Learn more about [minifying JavaScript](#).

Optimize images

Your images are optimized. Learn more about [optimizing images](#).

Prioritize visible content

You have the above-the-fold content properly prioritized. Learn more about [prioritizing visible content](#).

Reduce server response time

Your server responded quickly. Learn more about [server response time optimization](#).

Optimization

Good

100 / 100



Let's say this is your site, and you got a 13/100

Mobile Desktop

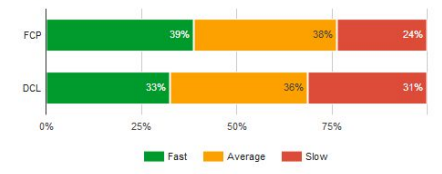
Speed
Average
1.2s FCP 1.9s DCL

Optimization
Low
13 / 100

Data from the Chrome User Experience report indicates this page's median **FCP** (1.2s) and **DCL** (1.9s) ranks it in the middle third of all pages. This page has a low level of optimization because most of its resources are render-blocking. [Learn more.](#)

Report for: <http://fox17.com/>

Page Load Distributions



Metric	Fast	Average	Slow
FCP	39%	38%	24%
DCL	33%	30%	31%

The distribution of this page's FCP and DCL events, categorized as Fast (fastest third), Average (middle third), and Slow (bottom third).

Page Stats

PSI estimates this page requires 14 additional round trips to load render blocking resources and 6.7 MB to fully render. The median page requires 4 render blocking round trips and 1.5 MB. Fewer round trips and bytes results in faster pages.

Optimization Suggestions

- Enable compression
Show how to fix
- Optimize images
Show how to fix
- Eliminate render-blocking JavaScript and CSS in above-the-fold content
Show how to fix
- Leverage browser caching
Show how to fix
- Reduce server response time
Show how to fix
- Prioritize visible content
Show how to fix
- Minify JavaScript
Show how to fix
- Minify CSS
Show how to fix
- Minify HTML
Show how to fix

Optimizations Already Present

- Show details

Download optimized image, JavaScript, and CSS resources for this page.

The speed data is updated weekly, and the optimization results are cached for 30s. To see updated optimization analysis, please wait for 30s before re-running the test.



Optimization

Low

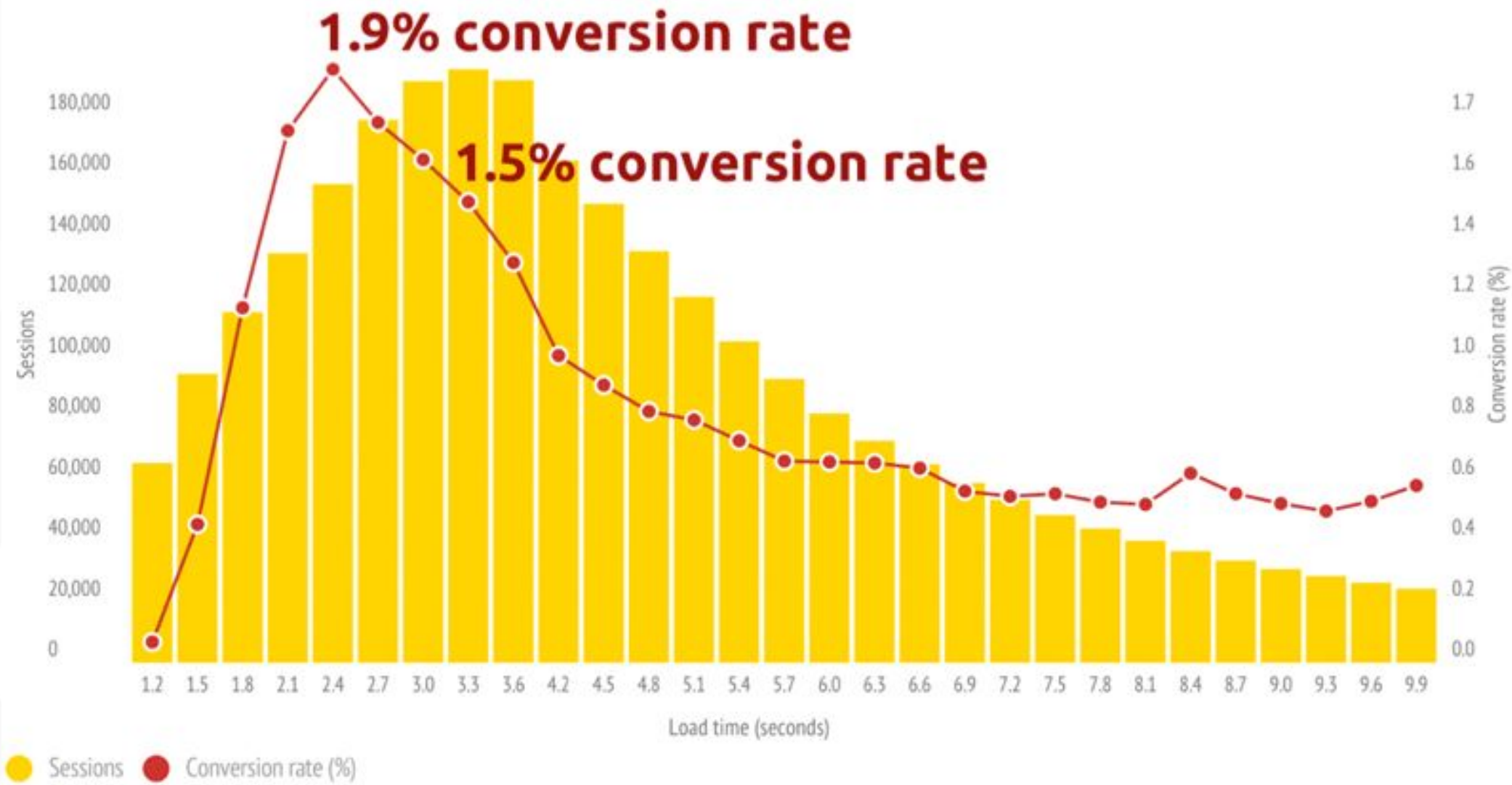
13 / 100

Big deal...

Why does getting a high score matter?

Google recently announced that in July 2018 page speed will be a ranking factor for mobile searches.

Case study: Mobile pages that are 1 second faster experience up to 27% increase in conversion rate



Source: <https://www.soasta.com/blog/mobile-web-performance-monitoring-conversion-rate/>

Users will not wait for a slow site to load. They will leave.

Make your site work even in the slow lane of net neutrality

OK I get it. This really matters.
How can I solve this issue?

**It's easy, you just need to
“Eliminate render-blocking JavaScript
and CSS in above-the-fold content”**

I know all of them words, but in
that order... ツ

I'm here to guide you on
your journey to that
elusive perfect score.





The metrics Google uses when ranking your site and how to get that 100

Remove Render-Blocking JavaScript

Don't use JS to paint the page. Do server-side rendering.

Progressive Enhancement and Graceful degradation is what you want.

Once that has been taken care of, Defer the loading of all JavaScript.

This has a tendency to break things sometimes.

Have some inline js that uses jQuery? Broken.

Drupal

<https://www.drupal.org/project/advagg>

AdvAgg will defer js and inline js in a way where it works.

Optimize CSS Delivery

This one's tricky; inlining critical css is what it means.

Well, what is critical css?

It's the set of CSS rules needed to render the above the fold content.

Take that small subset of CSS and inline it in the actual HTML.

It sounds complicated because it is.

This is the hardest thing to get right.

Optimize CSS Delivery

Inline CSS changes on almost every page.

No easy way out.



Optimize CSS Delivery

Luckily there are some tools to help with this.

For the adventurous: <https://github.com/pocketjoso/penthouse>

For the slightly easier route

<https://www.sitelocity.com/critical-path-css-generator>

<https://jonassebastianohlsson.com/criticalpathcssgenerator/>

<https://criticalcss.com/>

<https://chrome.google.com/webstore/detail/critical-style-snapshot/gkoeffcejdhhjognlonafnijfkcepob?hl=en>

Optimize CSS Delivery

If using Drupal - <https://www.drupal.org/project/advagg>

AdvAgg will take care of everything including picking the correct inline css for the given page. But the inline css will still need to be generated using a tool.

I plan on starting a service to fully automate critical css generation

<http://www.fixrenderblocking.com/>

Optimize CSS Delivery

Now that you have the critical CSS, the tool of choice for using JavaScript to load the rest of your CSS files via preload is

<https://github.com/filamentgroup/loadCSS>

Optimize CSS Delivery

You can check this box off until you change your CSS or HTML.



Optimize Images

Highly recommend using this module to auto optimize image styles for you
https://www.drupal.org/project/imageapi_optimize

Command line tools to do this for existing images

jpegtran

pngquant

Leverage Browser Caching

Set the Cache-Control to 1 week or longer for everything, Except for the html. Sounds good until you see that google analytics is in this list. You have 2 options:

1. Locally host the remote analytics.js and update that regularly
2. Use <https://github.com/jehna/ga-lite>

Drupal - <https://www.drupal.org/project/advagg>

AdvAgg will use option 1 and has a cron job to check if the remote file has changed.

Improve Server Response Time

Turn on the page cache!

This is what Varnish does for you.

This is where most of the effort for performance goes.

A CDN like cloudflare, which will serve the HTML will also help here.

Minify Resources (HTML, CSS, JS)

What about gzip? Nope this is different.

All that extra whitespace needs to go.

Drupal

CSS - Core has this covered, advagg does too

JS - <https://www.drupal.org/project/advagg>

HTML - <https://www.drupal.org/project/minifyhtml>

Prioritize visible content

The amount of data to start rendering exceeds 14.6kB gzip compressed.

Make your site simpler and you should see this improve. Luckily this warning is rare if everything else has been taken care of.

White text on a white div that loads a dark background image can cause this.

Avoid Landing Page Redirects

Use a responsive web design; your mobile theme and non mobile theme are the same page. Don't use m. domains.

Make sure redirects don't lead to other redirects. One level is ok if adding/removing www or redirecting to https; make sure its a 301 redirect.

.htaccess (server config) changes will be needed most likely.

Enable Compression

Turn on Gzip and/or Brotli!

Drupal

<https://www.drupal.org/project/advagg>

AdvAgg will gzip/brotli the CSS and JS for you.

.htaccess (server config) changes may be needed.

Quick Recap - This is the Goal

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Optimization

Good

100 / 100



AdvAgg covers the following rules

- Eliminate render-blocking JavaScript (defer JS) and CSS in above-the-fold content (inline critical CSS*)
- Enable compression (gzip CSS & JS)
- Leverage browser caching (locally host external CSS and JS)*
- Minify JavaScript

Some of these are really hard to do, luckily AdvAgg has you covered.

<https://www.drupal.org/project/advagg>

The other rules not covered by AdvAgg

- Optimize Images (use the imageapi_optimize module & setup cron scripts)

https://www.drupal.org/project/imageapi_optimize

- Minify html

<https://www.drupal.org/project/minifyhtml>

- Improve Server Response Time (use a page cache and a html CDN)
- Prioritize visible content (make your site's interface simpler)
- Gzip compression (change server config if needed)
- Avoid Landing Page Redirects (unify theme and/or change server config)

This sounds hard to do for every page.

Luckily you only need to do this for landing pages.

simplytest.me AdvAgg Demo

Critical Path CSS Generator

Internal CSS Style Sheet Generator for the above the fold content.

URL:

<http://www.jit.it/>

GENERATE CRITICAL PATH CSS

Critical Path CSS

```
body {font-family: sans-serif; font-size: 1em; line-height: 1.2; color: #333; background-color: #fff; padding: 0 15px; margin: 0;}
h1 {font-size: 2em; margin: 0 0 1em 0; font-weight: normal; color: #333;}
h2 {font-size: 1.5em; margin: 0 0 1em 0; font-weight: normal; color: #333;}
p {margin: 0 0 1em 0; color: #333;}
a {color: #333; text-decoration: underline; text-decoration-color: #333; text-decoration-style: solid;}
a:hover {color: #333; text-decoration: underline; text-decoration-color: #333; text-decoration-style: solid;}
img {max-width: 100%; height: auto; vertical-align: middle;}
hr {border: 0.5px solid #ccc; margin: 1em 0;}
pre {font-family: monospace; font-size: 0.9em; background-color: #f0f0f0; padding: 10px; border: 1px solid #ccc; margin: 1em 0; width: 100%;}
code {font-family: monospace; font-size: 0.9em; color: #333; background-color: #fff; padding: 2px; border: 1px solid #ccc; margin: 2px 0; width: 100%;}
pre, code {font-family: monospace; font-size: 0.9em; color: #333; background-color: #fff; padding: 2px; border: 1px solid #ccc; margin: 2px 0; width: 100%;}
pre {font-family: monospace; font-size: 0.9em; background-color: #f0f0f0; padding: 10px; border: 1px solid #ccc; margin: 1em 0; width: 100%;}
code {font-family: monospace; font-size: 0.9em; color: #333; background-color: #fff; padding: 2px; border: 1px solid #ccc; margin: 2px 0; width: 100%;}
pre, code {font-family: monospace; font-size: 0.9em; color: #333; background-color: #fff; padding: 2px; border: 1px solid #ccc; margin: 2px 0; width: 100%;}
```

Load continued CSS file after page load

```
var styleSheet = document.createElement("link");
styleSheet.setAttribute("rel", "stylesheet");
styleSheet.setAttribute("type", "text/css");
styleSheet.setAttribute("href", "http://www.jit.it/css/critical.css");
document.getElementsByTagName("head")[0].appendChild(styleSheet);
var requestAnimationFrame = window.requestAnimationFrame ||
    window.mozRequestAnimationFrame ||
    window.webkitRequestAnimationFrame ||
    window.msRequestAnimationFrame;
```


Pitfalls to Avoid if goal is 100/100

CSS/JS hacked in VS using the API

JS that renders the page on the client

Inline JS that doesn't work well if deferred

External fonts that are not loaded from Google

Very strict Content-Security-Policy headers

Server config that can't be adjusted if needed

Congratulations!

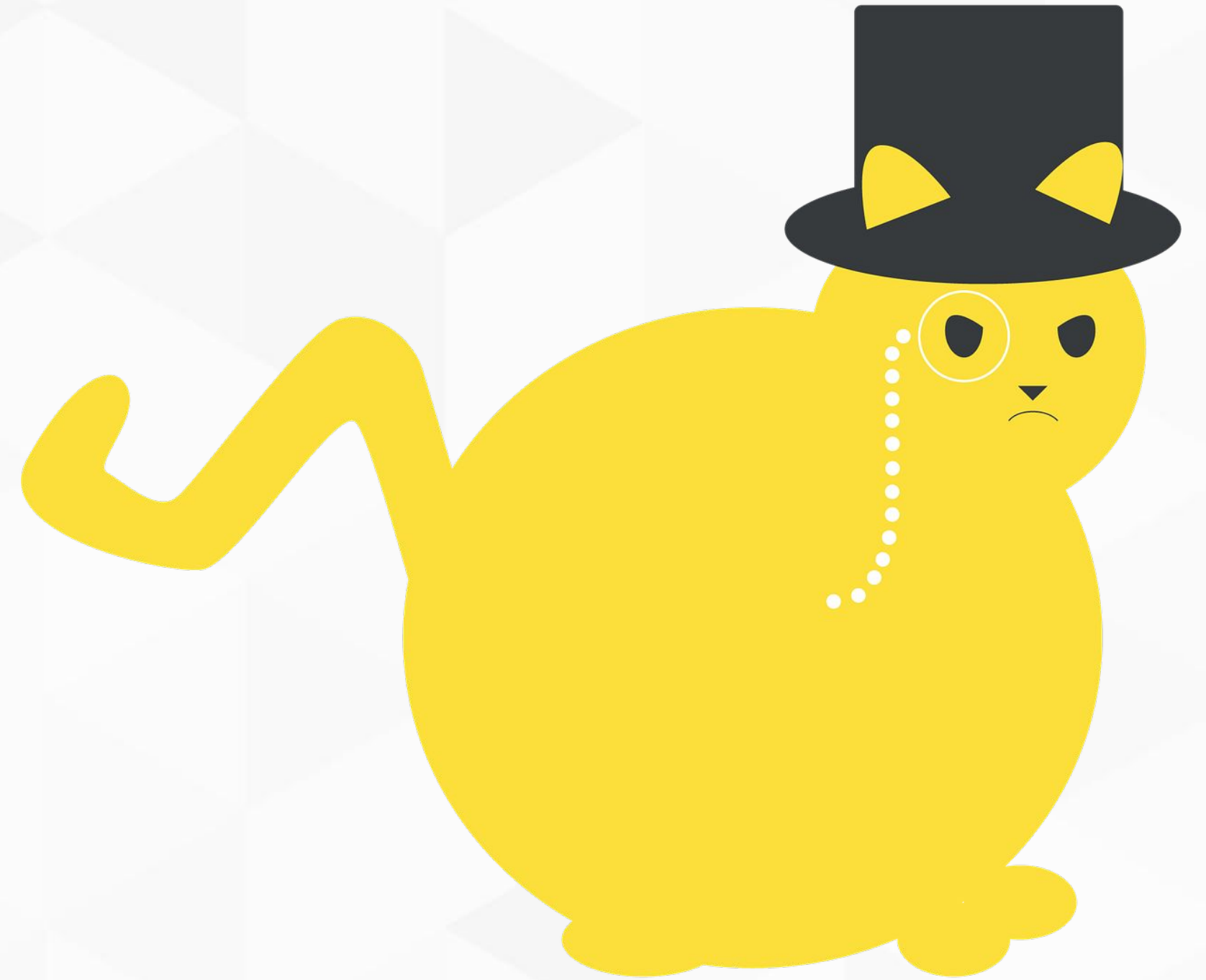
You now know what to do to get a 100/100!

You beat the boss at the end of the internet.

Good job!

High Performance Group wiki on this subject

<https://groups.drupal.org/node/517292>



AI Catpone - Boss at the end of the Internet level

What are some alternatives?

I don't know about all these
Drupal modules.



How to get a high score if not
using Drupal or don't want to use
certain modules

Google's mod pagespeed

Works with Apache or Nginx as a server side plugin. It requires some configuration and testing but it should work on almost any site. It tackles some of the issues but it will rarely get you the perfect 100.

Google's mod_pagespeed

```
<IfModule pagespeed_module>
```

```
  ModPagespeed on
```

```
  ModPagespeedEnableFilters rewrite_style_attributes,rewrite_css,prioritize_critical_css
```

```
  ModPagespeedEnableFilters resize_images,recompress_images,responsive_images
```

```
  ModPagespeedEnableFilters convert_jpeg_to_webp,convert_to_webp_lossless
```

```
  ModPagespeedEnableFilters convert_to_webp_animated,recompress_webp
```

```
  ModPagespeedEnableFilters convert_jpeg_to_progressive,recompress_jpeg
```

```
  ModPagespeedEnableFilters convert_gif_to_png,recompress_png
```

```
  ModPagespeedEnableFilters rewrite_javascript,defer_javascript,
```

```
  ModPagespeedEnableFilters collapse_whitespace,remove_comments,insert_dns_prefetch
```

```
  ModPagespeedEnableFilters inline_google_font_css,flatten_css_imports,extend_cache
```

```
</IfModule>
```

github.com/blinkloader/blinkloader

Node JS package that hits most of the marks for Google PageSpeed

Google Accelerated Mobile Pages (AMP)

Mobile pages are hosted on google with a very limited set of JS and all CSS is inlined.

Will get you close to a 100 but almost never a perfect score. You do get the lightning bolt icon on search results, and the site might be included in the mobile search carousel.

Some people really don't like what Google is doing with AMP. When you look into it, it's very controversial due to your site being served from google's servers.



The Challenge

I'll give you \$5 if the homepage of a Drupal site you have worked on gives you a perfect 100 under Optimization.



https://developers.google.com/speed/pagespeed/insights

PageSpeed Tools > Insights

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PageSpeed Insights



Make your web pages fast on all devices.

ANALYZE

Web Performance

Learn more about [web performance tools at Google](#).

Give Feedback

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[Discuss on our mailing list.](#)

About PageSpeed Insights

PageSpeed Insights analyzes the content of a web page, then generates suggestions to make that page faster. [Learn more.](#)

What popular site is
working to improve its
pagespeed score?



Ongoing work on [Drupal.org](https://drupal.org)

Drupal.org Ongoing Case Study



Started out as a couple settings to get the page to load slightly faster

After 2+ years of work there is now a clear path to getting a 100/100 on most Drupal.org pages.

The AdvAgg module is key to making this happen.

Drupal.org Ongoing Case Study



One of the more interesting things we noticed was from Google Analytics with the average load time broken down by browser.

The UC Browser's average page load time went from 13.3 seconds down to 5.4 seconds. This is a mobile only browser that has over 500 million users in China, India and Indonesia.

Drupal.org Ongoing Case Study



More recent AdvAgg development was done with a goal of getting a perfect 100 on Drupal.org. This goal is now attainable with a little bit more effort.

Generating Critical CSS is the final key; this needs to be automated.

After seeing this need I decided to create

<http://www.fixrenderblocking.com/> in order to make the generating of critical css easy to automate. It's still a work in progress, but it should be available soon and it can be used on any host.

OK So a quick show of hands.

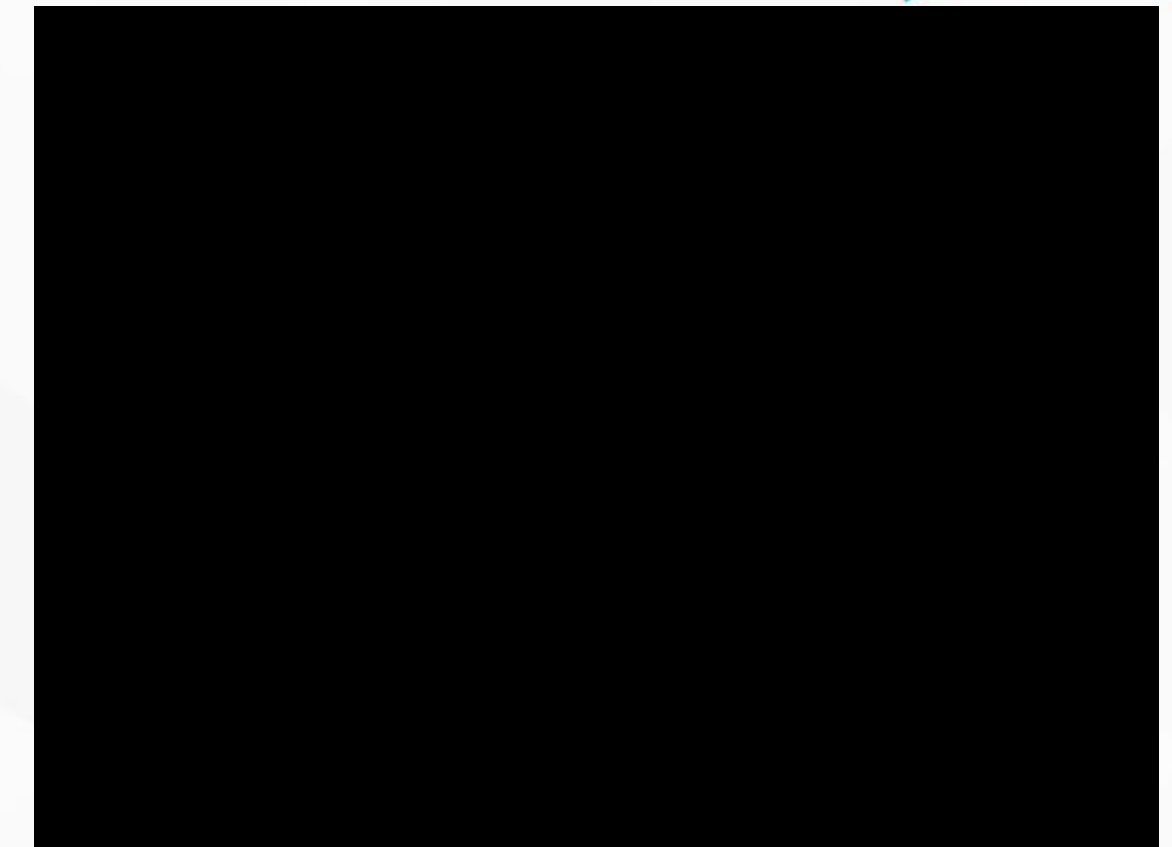
Did anyone get a 100/100?



What's next after getting a
100/100?

Webpagetest

<https://www.webpagetest.org/>



- I almost always test using a “Mobile Edge” Connection
- The start render metric is one of the best ones to look at
- Look to preload resources to optimize the Speed Index metric
- Gives you a loading video
- Very helpful for speed debugging.
- <https://webpagetest.org/easy> if you don't want to customize things

Test a website's performance

- Advanced Testing
- Simple Testing**
- Visual Comparison
- Traceroute

<https://www.drupal.org/project/drupal>

START TEST

Test Location:

Browser:

Advanced Settings ▼

- Test Settings
- Advanced**
- Chrome
- Auth
- Script
- Block
- SPOF
- Custom

Connection:

Number of Tests to Run: Up to 9

Repeat View: First View and Repeat View First View Only

Capture Video:

Keep Test Private:

Label:

Web Page Performance Test for

<https://www.drupal.org/project/drupal>

From: Dulles, VA - Chrome - Edge
1/20/2018, 5:16:08 PM



[Summary](#) | [Details](#) | [Performance Review](#) | [Content Breakdown](#) | [Domains](#) | [Processing Breakdown](#) | [Screen Shot](#) | [Image Analysis](#)

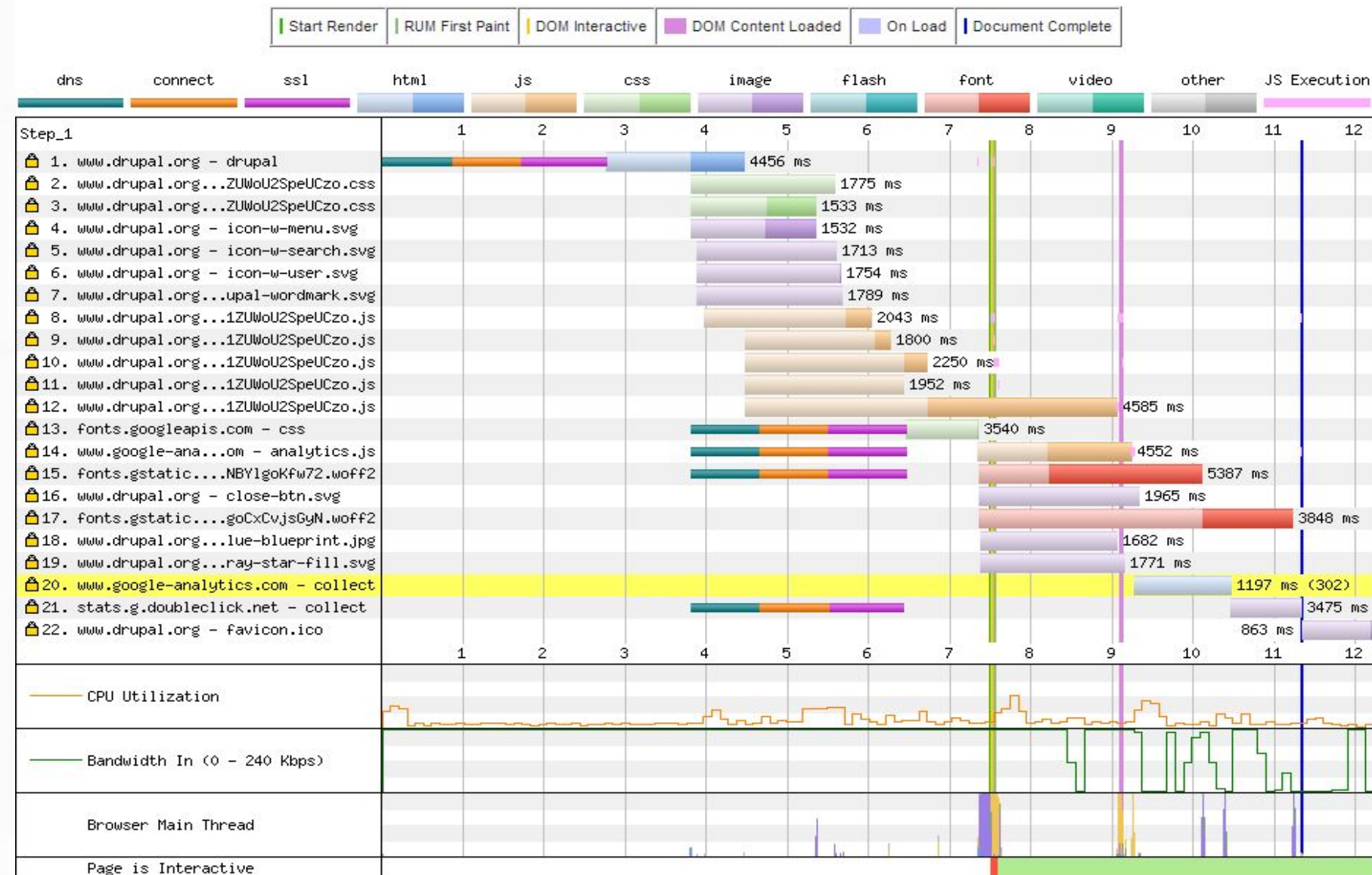
Tester: VM3-01-192.168.11.108
First View only

[Export HTTP Archive \(.har\)](#)
[Custom Metrics](#)

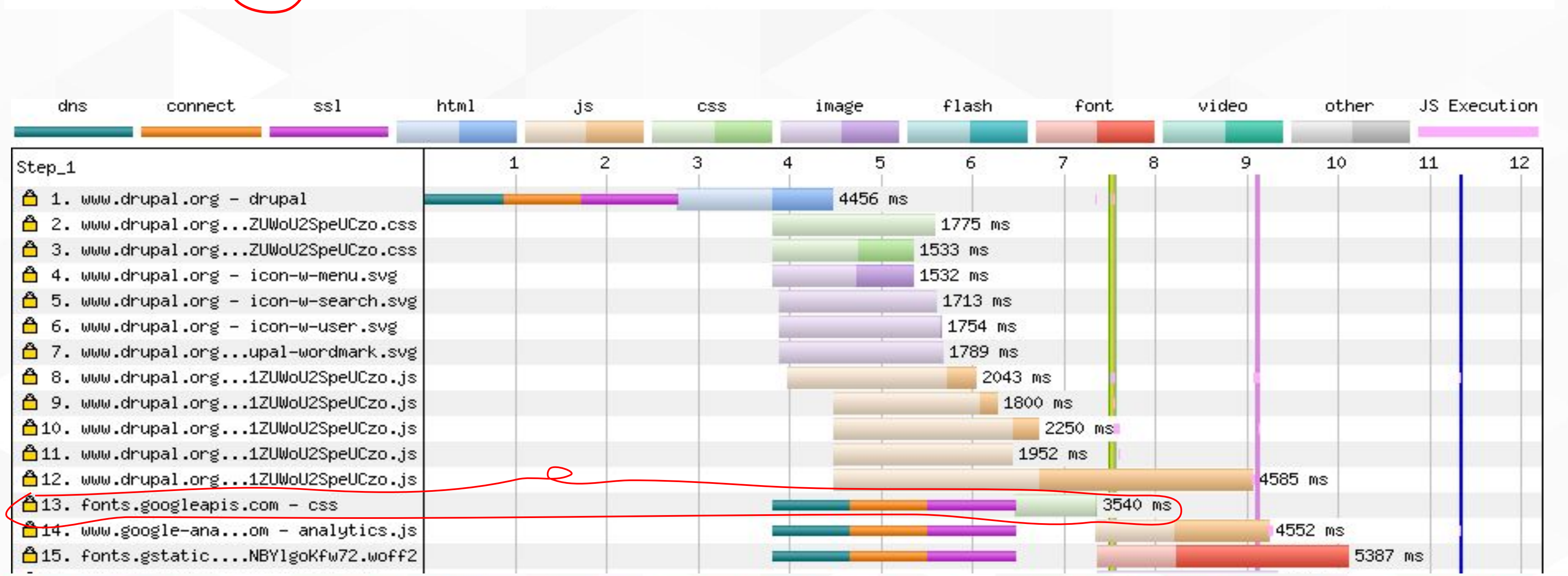
Load Time	First Byte	Start Render	Visually Complete	Speed Index	First Interactive (beta)	Result (error code)	Document Complete			Fully Loaded		
							Time	Requests	Bytes In	Time	Requests	Bytes In
11.339s	3.789s	7.500s	9.100s	7636	9.135s	0	11.339s	21	341 KB	12.207s	22	349 KB

First Interactive (beta)	Colordepth	RUM First Paint	domInteractive	domContentLoaded	loadEvent
9.135s	24	7.544s	7.517s	9.088s - 9.135s (0.047s)	11.340s - 11.340s (0.000s)

Waterfall View



Load Time	First Byte	Start Render	Visually Complete	Speed Index	First Interactive (beta)	Result (error code)	Document Complete			Fully Loaded		
							Time	Requests	Bytes In	Time	Requests	Bytes In
11.339s	3.789s	7.500s	9.100s	7636	9.135s	0	11.339s	21	341 KB	12.207s	22	349 KB



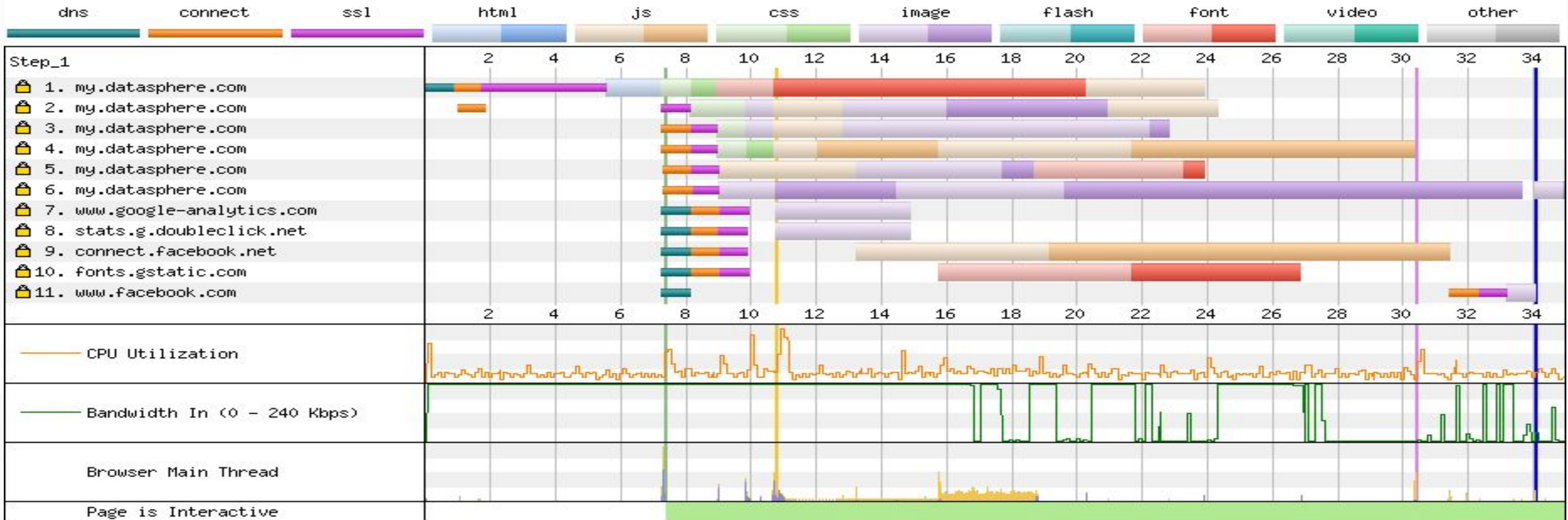
HTTP 2

Connection View



HTTP 1.1

Connection View



Lighthouse

<https://developers.google.com/web/tools/lighthouse/>

- Built into Chrome under the Audits tab.
- Works on local sites.
- A lot more info in comparison to Google PageSpeed Insights.



Performance



Progressive Web App



Accessibility



Best Practices



SEO

20

Performance

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Progressive Web App

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Accessibility

81

Best Practices

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SEO

Performance

These encapsulate your web app's current performance and opportunities to improve it.

20

Metrics

These metrics encapsulate your web app's performance across a number of dimensions.



- ▶ First meaningful paint 7,090 ms
- ▶ First Interactive (beta) 16,400 ms
- ▶ Consistently Interactive (beta) 16,400 ms
- ▶ Perceptual Speed Index: 9,556 22
- ▶ Estimated Input Latency: 618 ms 0

Opportunities

These are opportunities to speed up your application by optimizing the following resources.

- ▶ Offscreen images 4,500 ms
820 KB
- ▶ Serve images in next-gen formats 3,930 ms
717 KB
- ▶ Reduce render-blocking stylesheets 2,320 ms
- ▶ Unused CSS rules 440 ms
81 KB
- ▶ Optimize images 410 ms
74 KB
- ▶ Properly size images 360 ms
66 KB
- ▶ Minify JavaScript 60 ms
11 KB

Diagnostics

More information about the performance of your application.

- ▼ **Has enormous network payloads: Total size was 1,848 KB** 99
Large network payloads cost users real money and are highly correlated with long load times. [Learn more.](#)
 - ▶ View Details
- ▼ **Uses inefficient cache policy on static assets: 39 assets found** 69
A long cache lifetime can speed up repeat visits to your page. [Learn more.](#)
 - ▶ View Details
- ▼ **Critical Request Chains: 6**
The Critical Request Chains below show you what resources are issued with a high priority. Consider reducing the length of chains, reducing the download size of resources, or deferring the download of unnecessary resources to improve page load. [Learn more.](#)
Longest chain: **4,679.3ms** over **2** requests, totalling **13.23 KB**
 - ▶ View critical network waterfall:
- ▼ **User Timing marks and measures: 3**
Consider instrumenting your app with the User Timing API to create custom, real-world measurements of key user experiences. [Learn more.](#)
 - ▶ View Details
- ▼ **JavaScript boot-up time is too high: 2,080 ms**
Consider reducing the time spent parsing, compiling and executing JS. You may find delivering smaller JS payloads helps with this.
 - ▶ View Details

▶ 6 Passed Audits

Progressive Web App

These checks validate the aspects of a Progressive Web App, as specified by the baseline [PWA Checklist](#).

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6 Failed Audits

- ▼ Does not register a service worker
The service worker is the technology that enables your app to use many Progressive Web App features, such as offline, add to homescreen, and push notifications. [Learn more](#).
- ▼ Does not respond with a 200 when offline
If you're building a Progressive Web App, consider using a service worker so that your app can work offline. [Learn more](#).
- ▼ Page load is not fast enough on 3G
A fast page load over a 3G network ensures a good mobile user experience. [Learn more](#).
First Interactive was at 14,640 ms. More details in the "Performance" section.
- ▼ User will not be prompted to Install the Web App
Browsers can proactively prompt users to add your app to their homescreen, which can lead to higher engagement. [Learn more](#).
Failures: No manifest was fetched, Site does not register a service worker, Service worker does not successfully serve the manifest's start_url.
- ▼ Is not configured for a custom splash screen
A themed splash screen ensures a high-quality experience when users launch your app from their homescreens. [Learn more](#).
Failures: No manifest was fetched.
- ▼ Address bar does not match brand colors
The browser address bar can be themed to match your site. [Learn more](#).
Failures: No manifest was fetched, No ``<meta name="theme-color">`` tag found.

▶ 5 Passed Audits

- ▶ Additional items to manually check

Accessibility

These checks highlight opportunities to [improve the accessibility of your web app](#). Only a subset of accessibility issues can be automatically detected so manual testing is also encouraged.

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Elements Have Discernable Names

These are opportunities to improve the semantics of the controls in your application. This may enhance the experience for users of assistive technology, like a screen reader.

▼ Links do not have a discernable name

Link text (and alternate text for images, when used as links) that is discernible, unique, and focusable improves the navigation experience for screen reader users. [Learn more](#).

▶ View failing elements

Elements Describe Contents Well

These are opportunities to make your content easier to understand for a user of assistive technology, like a screen reader.

▼ <frame> or <iframe> elements do not have a title

Screen reader users rely on frame titles to describe the contents of frames. [Learn more](#).

▶ View failing elements

Color Contrast Is Satisfactory

These are opportunities to improve the legibility of your content.

▼ Background and foreground colors do not have a sufficient contrast ratio.

Low-contrast text is difficult or impossible for many users to read. [Learn more](#).

▶ View failing elements

▶ 13 Passed Audits

▶ 19 Not Applicable Audits

▶ Additional items to manually check

Best Practices

We've compiled some recommendations for modernizing your web app and avoiding performance pitfalls.

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2 Failed Audits

- ▶ Includes front-end JavaScript libraries with known security vulnerabilities: 3 vulnerabilities detected.
- ▶ Manifest's `short_name` will be truncated when displayed on homescreen

▶ 14 Passed Audits

SEO

These checks ensure that your page is optimized for search engine results ranking. There are additional factors Lighthouse does not check that may affect your search ranking. [Learn more](#).

80

2 Failed Audits

- ▼ Links do not have descriptive text: 2 links found
Descriptive link text helps search engines understand your content. [Learn more](#).
 - ▶ View Details
- ▼ Document does not have a valid `rel=canonical`
Canonical links suggest which URL to show in search results. Read more in [Use canonical URLs](#).
Multiple URLs (<https://www.drupal.org/home>, <https://www.drupal.org/home>)

▶ 8 Passed Audits

▼ Additional items to manually check

Run these additional validators on your site to check additional SEO best practices.

- ▼ Page is mobile friendly
Take the [Mobile-Friendly Test](#) to see how easily a visitor can use your page on a mobile device. [Learn more](#).
- ▼ Structured data is valid
Run the [Structured Data Testing Tool](#) and the [Structured Data Linter](#) to validate structured data. [Learn more](#).

Chrome User Experience Report

<https://developers.google.com/web/tools/chrome-user-experience-report/>

Provides a lot of metrics from real users

- | | |
|------------------------|--|
| First Paint | - Browser started to render the page |
| First Contentful Paint | - Browser rendered text |
| DOMContentLoaded | - HTML document has been fully parsed |
| onload | - Page and dependent resources have finished loading |

https://www.youtube.com/watch?v=_srJ7eHS3IM



What will happen if I don't go for
a 100/100?

Google Webmaster Central Blog

Official news on crawling and indexing sites for the Google index

Using page speed in mobile search ranking

Wednesday, January 17, 2018

People want to be able to find answers to their questions as fast as possible – [studies](#) show that people really care about the speed of a page. Although speed has been used in ranking for some time, that [signal](#) was focused on desktop searches. Today we're announcing that starting in **July 2018, page speed will be a ranking factor for mobile searches.**

Users on a slow connection will give up and leave before the page loads.

Your competitor's site will rank higher in search results if they are faster; and you'll lose traffic to them.

Slow sites leave money on
the table





DrupalCon
NASHVILLE 2018
APRIL 9-13

Join us for contribution sprints

Friday, April 13, 2018

Mentored Core sprint

9:00-12:00
Room: Stolz 2

First time sprinter workshop

9:00-12:00
Room: Stolz 2

General sprint

9:00-12:00
Room: Stolz 2

#drupalsprint



What did you think?

Locate this session at the DrupalCon Nashville website:

<http://nashville2018.drupal.org/sessions/get-perfect-100-google-pagespeed-what-will-happen-if-you-dont>

Take the Survey!

<https://www.surveymonkey.com/r/DrupalConNashville>

Thank you!

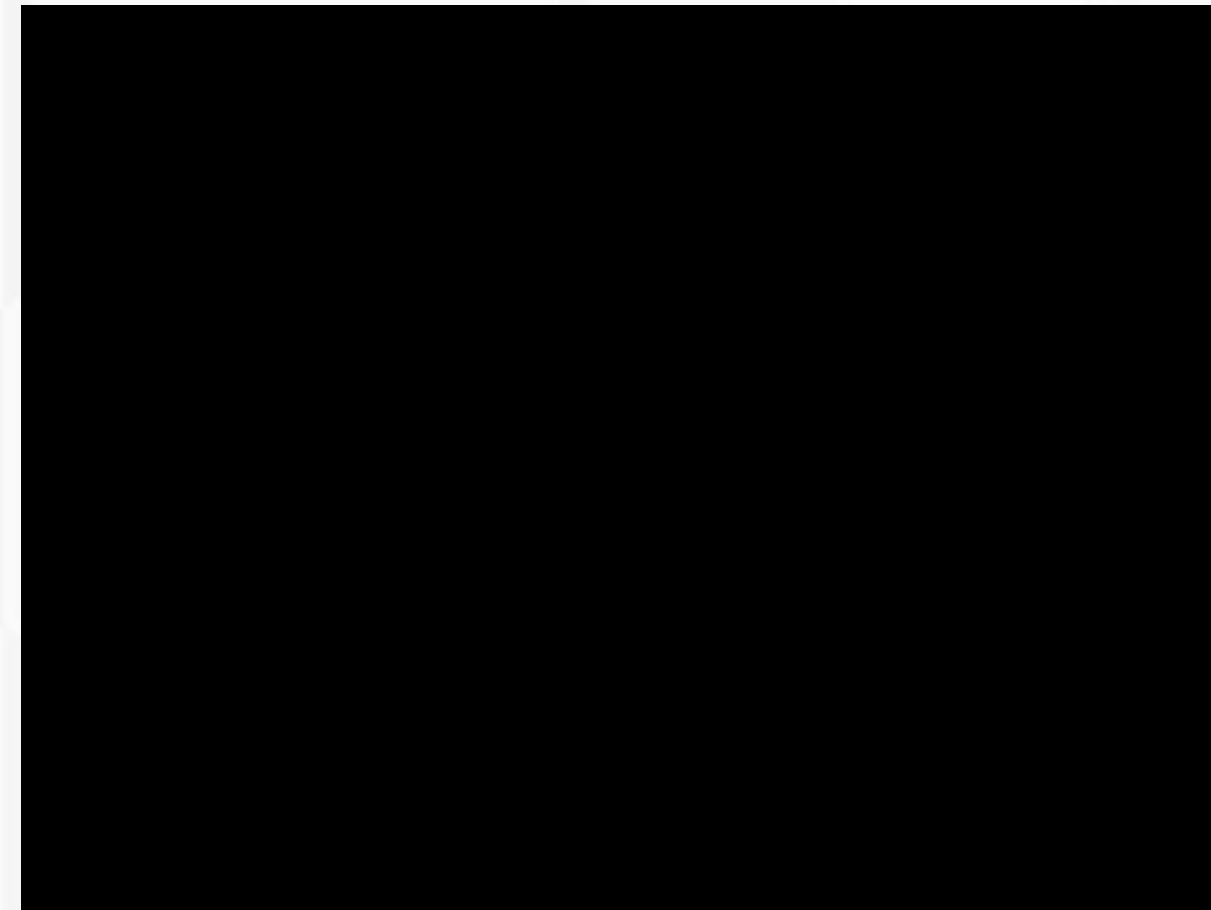
Questions?



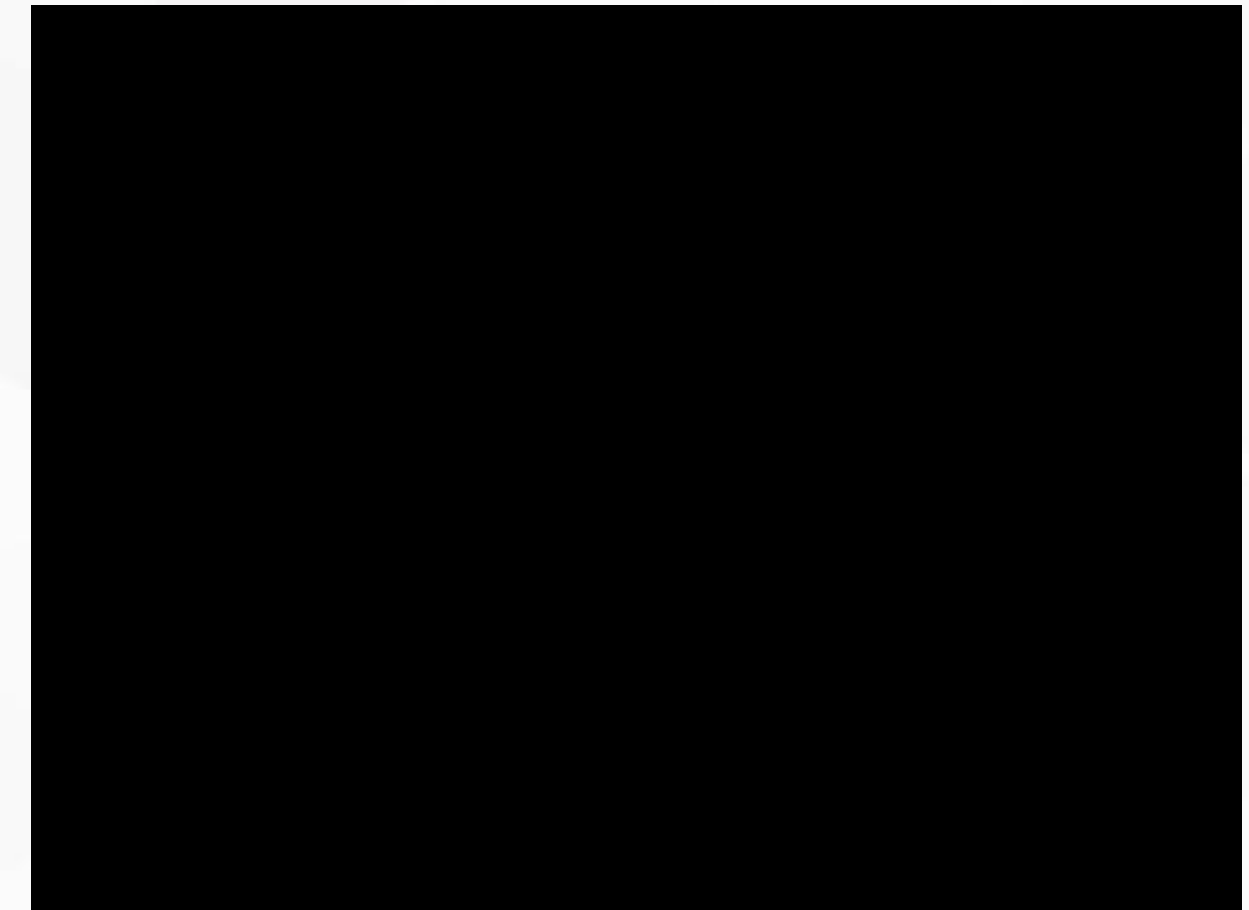
 @mcarper



drupal.org 56/100
CDN, HTTP2
Takes time to turn a big ship



my.datasphere.com
100/100
No CDN, HTTP 1.1



“unnamed site” 96/100
No CDN, HTTP 1.1
Cheating doesn't fool
the user

Go to <http://www.fixrenderblocking.com/> and receive 10% off when the service goes live