Speedy Rails Sites

Story of an unlaunched website

- A mobile homepage for a Fortune 50 company.
- Rails, RefineryCMS, jQuery Mobile.
- Client is excited for the site.
- Devs are excited for a green field to use latest tech.

Four Months Later

I'm called in to rescue the project.

Standard Rescue Project

- Behind schedule
- Busted budget
- Everybody is sick of it
- Nobody believes in it
- But we gotta finish it



Standard Rescue Procedures

- Bring in new developers.
- Build a list of must-haves for launch.
- Work the list
- And at the top of their list was...

go fast.

Slow Rails App

A page on this *mobile-only* site took 2.5 to 8 seconds for a server response.

Server responses times were very **inconsistent**, and crashed under any load.

With jQuery Mobile, the site felt even slower.

No Escape

Data sat in a poorly-designed MongoDB database.

Data used in multiple controllers, subsites.

The views were a mess.

The authors were incredibly opinionated.

Bad DB Bad Views

Bad DB The Perfect Rails App Bad Views

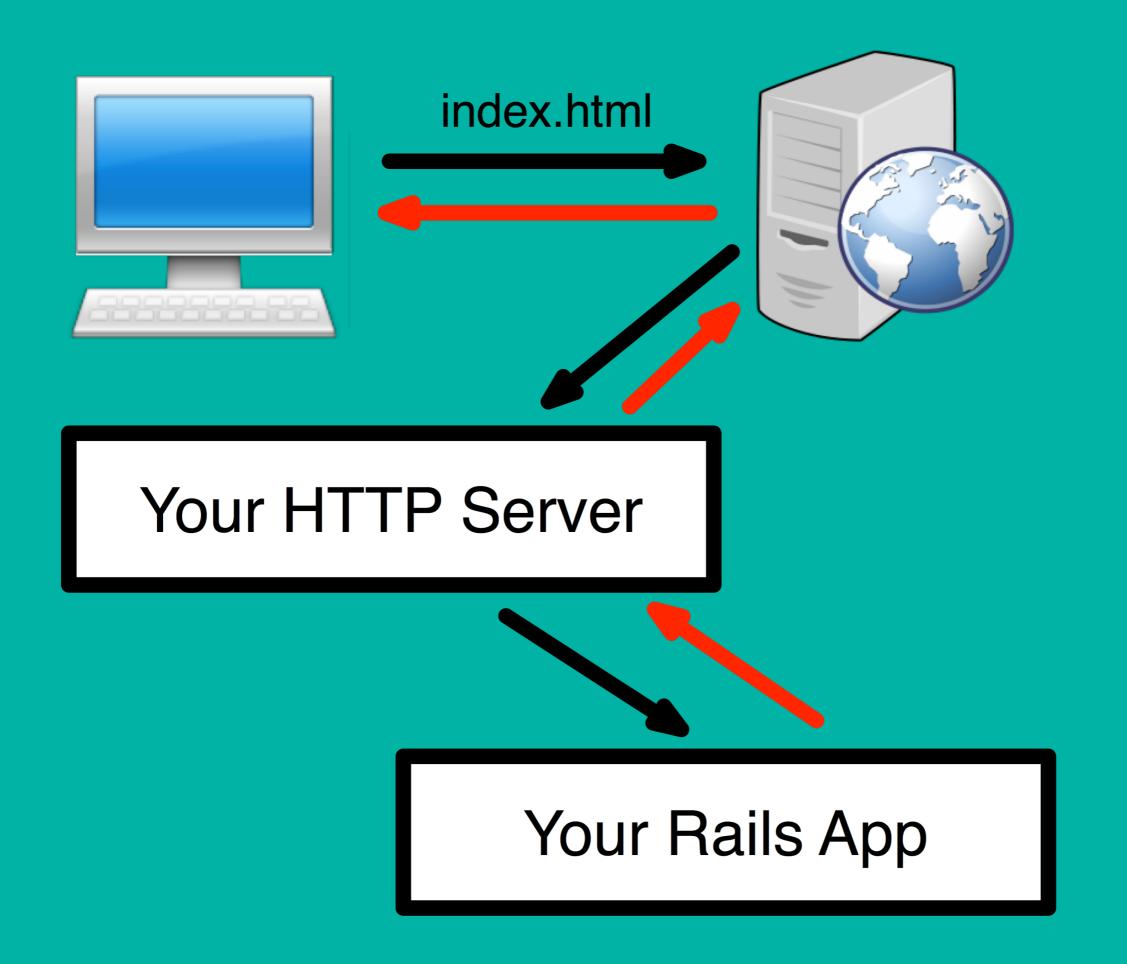
Until I found the One Line Fix

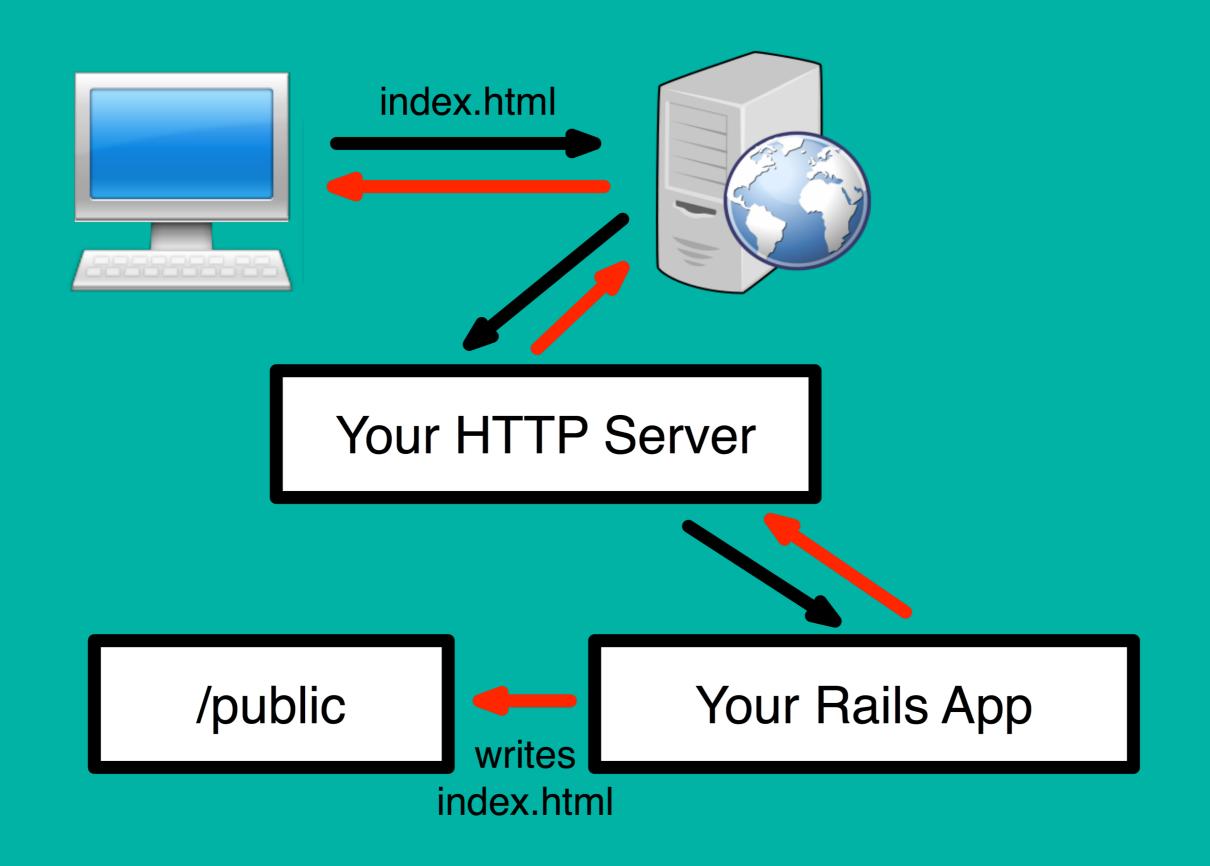
caches_page:view

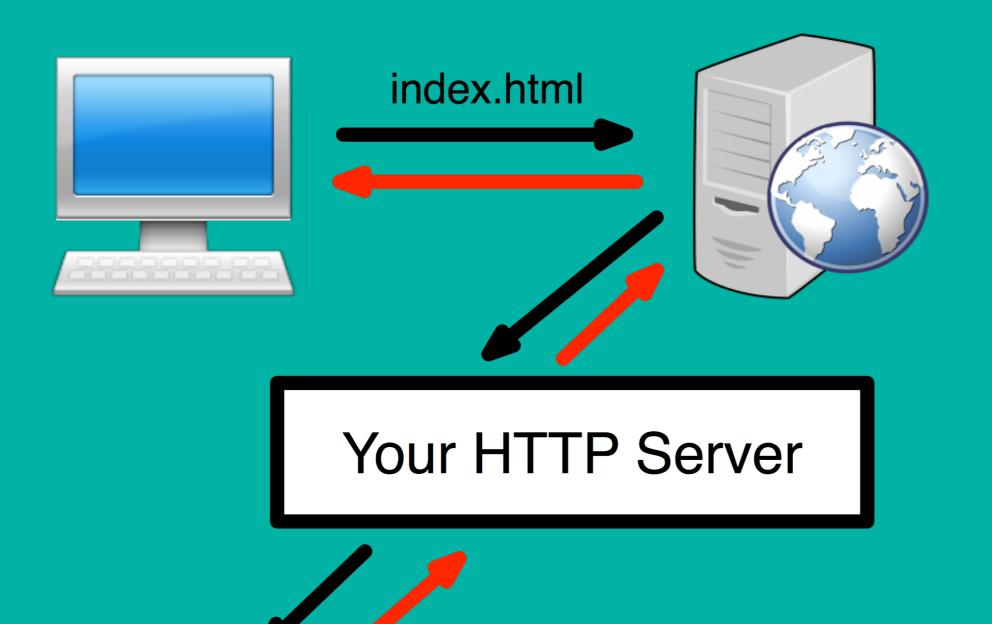
In full context

```
class ContentController < ApplicationController
  caches_page :the_slowest_action_in_the_world
  def the_slowest_action_in_the_world
    # my view
  end</pre>
```

end







/public

Your Rails App

Page Caching Improvements

- 2.5 to 8 seconds response dropped to <80 ms.
- Server response was very consistent.
- Site felt snappier.
- It took little code to accomplish.
- Client approved, the site launched.

Page Caching Costs

- Cache invalidation
- User-specific content
- "The Rails Way"
- Hosting support

Cache Invalidation

It's easy...

Just delete all of those files Rails wrote!

Cache Invalidation

```
def files to remove
  `cd public; git status -u`
    .split("\n")
    .select { |f| f.starts with?('#') }
    .select { |f| f.ends with?('.html') }
    .map { |f| f.gsub('#', '').strip }
end
files_to_remove.each { |x| `rm public/#{x}` }
```

User-specific Content

User could select their closest dealer.

Layout ERB page: "Your closest dealer is [X]"

Moved message to client-side jQuery render

Data populated through AJAX

Deviating From "The Rails Way"

"Static page caching for Action Pack (removed from core in Rails 4.0)."

"NOTE: It will continue to be officially maintained until Rails 4.1."

"See DHH's key-based cache expiration overview for the newly-preferred method."

- Rails Docs

Hosting Support

Can't write to /public, it won't work.

(looking at you, Heroku)

So When Should You Consider Page Caching?

"Content management systems -- including weblogs and wikis -- have many pages that are a great fit for this approach, but account-based systems where people log in and manipulate their own data are often less likely candidates."

- Rails Docs

Additional Thoughts

- Page caching is not all-or-nothing.
- Requires planning and thought.
- It could be a way to stretch your hosting dollar.
- May not be elegant, but IT WORKS.