Source Maps

...what the heck are they?

obligatory title slide brought to you by @sblaurock

- Easier debugging of minified code.

- Can be used with both JS and CSS.

- Support from both Chrome and Firefox.

- Initial setup, then almost no maintenance.

1. Comment appended to minified file.

   ```
   //# sourceMappingURL=/path/script.js.map
   ```

2. HTTP Header

   ```
   SourceMap: /path/script.js.map
   ```

```
{
    version: version of source map spec (3)
    file: name of optimized file
    sources: array of original source files
    sourceRoot: path to files in sources
    names: symbols used for mapping
    mappings: Base64 VLQ's ...magic
}
```

Generators

- Closure Compiler, Uglify, JSMin, Browserify

Consumers

- Chrome / Firefox DevTools, WebStorm (IDE)

Libraries

- jQuery 1.9+, Backbone   *+ more*

Enable Source Maps

Chrome

Firefox

it's totally pronounced "gif", not "gif"

Important

- No source maps for inline JavaScript.
- Watch expressions aren't supported (yet).

Generator Responsibilities

- XSSI evaded with forced `)]}` syntax error.
- `//#` preferred to `//@`

- When are source maps loaded?

- Are source maps cacheable?

- Can they be served over HTTPS?

- Can we gzip compress them?

Resources

HTML5Rocks, Source Maps & SASS, Tuts+, Chrome Dev Blog, Revision 3 Proposal

Tools

mozilla/source-map, SourceMap Validator

Basically Everything

ryanseddon/source-map