

AngularJS \Rightarrow Angular

August 29, 2017

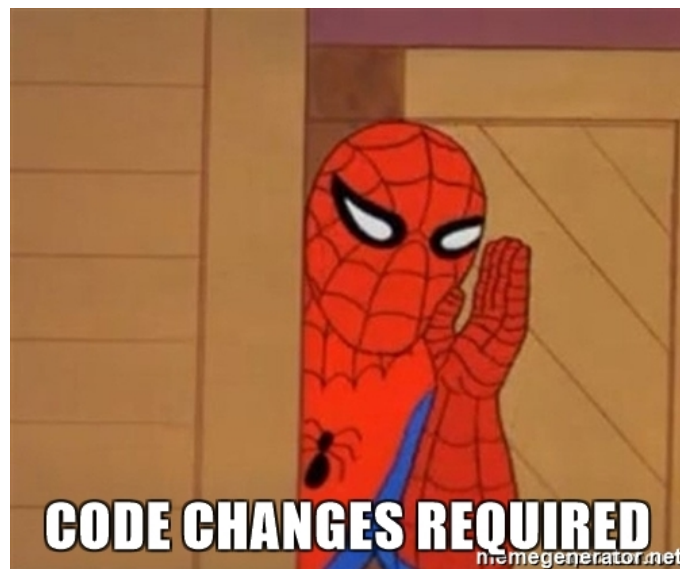
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ABOUT ME



- Graduated from LSU in Computer Science with a concentration in Mathematics
- Background in C++, PHP, and JavaScript

DISCLAIMER



UPGRADE OPTIONS

- Total Conversion
- Using *ng-metadata*
- Using *ng-upgrade*

PREREQUISITES

1. Upgrade to AngularJS 1.3+ style
2. Ideally upgrade to AngularJS 1.5+ style
3. Upgrade to a module bundler e.g. Webpack (Recommended)
4. Upgrade to TypeScript (Recommended)

PREREQUISITES (CONTINUED)

- Controllers should use *controllerAs*
- Prefer component directives

Components should not use *compile*,
replace: true, or *priority / terminal*.

YOU HAVE TESTS, RIGHT?



TOTAL CONVERSION UPGRADE PATH

Create an Angular application and convert everything

TOTAL CONVERSION UPGRADE PATH (CONTINUED)

Advantages

- Minimal setup required (a la Angular CLI)
- Fresh application architecture

TOTAL CONVERSION UPGRADE PATH (CONTINUED)

Disadvantages

- Lengthy process
- Prone to errors

ANGULAR CLI

1. cmcknight@Christophers-MacBook-Pro: ~(zsh)

ANGULAR CLI

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NG-METADATA UPGRADE PATH

ng-metadata uses AngularJS dependencies to use Angular style annotations/decorators.

NG-METADATA UPGRADE PATH

Advantages

- Migration over time
- Smaller application size over *ng-upgrade* (third upgrade method)

NG-METADATA UPGRADE PATH

Disadvantages

- Requires large refactor of AngularJS code
- Possibly interoperability issues

ng-metadata code sample

```
1. // main.js
2. angular.element(document).ready(function(){
3.     angular.bootstrap(document,['hero']);
4. });
5.
6. // hero.js
7. angular.module('hero',[]);
8.
9. // hero.service.js
10. angular.module('hero')
11.     .service('heroSvc', HeroService);
--
```


NG-UPGRADE UPGRADE PATH

ng-upgrade allows AngularJS code to run inside of Angular. AngularJS and Angular run together in the same application.

NG-UPGRADE UPGRADE PATH

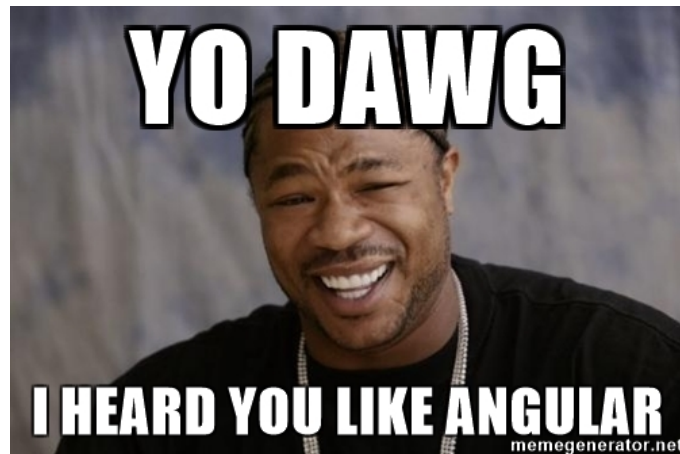
Advantages

- Convert between Angular and AngularJS
- Better interoperability

NG-UPGRADE UPGRADE PATH

Disadvantages

- Large build sizes
- Configuration



ng-upgrade code sample

```
1. // upgrade-adapter.ts
2. // Angular 2 Vendor Import
3. import {UpgradeAdapter} from
 '@angular/upgrade';
4. import {NgModule, forwardRef} from
 '@angular/core';
5. import {BrowserModule} from
 '@angular/platform-browser';
6.
7. // Instantiate an adapter with the AppModule
8. // Use forwardRef to pass AppModule reference
```

QUESTIONS?