



Angular Unit Testing With Jest



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ThoughtWorks®

What is *Jest*?

noun:

**A thing said or done for
amusement; a joke**

javascript:

A tool which makes unit
testing delightful; not as a joke

Why Use Jest?

- Superfast
- Snapshot Testing
- Isolated
- Zero Config

Why Use Jest?

- Superfast
- Snapshot Testing
- Isolated
- Only Two Config

Jest for Regular

Use Jest with CLI



Adding Jest

```
npm install -D jest jest-  
preset-angular @types/jest
```

```
Hide test.ts
Import jest-preset
Import jest configurations
```

```
{  
  "extends": "../tsconfig.base.json",  
  "compilerOptions": {  
    "outDir": "../out-tsc/spec",  
    "types": [  
      "jasmine"  
    ]  
  },  
  "files": [  
    "src/test.ts"  
    "src/polyfills.ts"  
  ],  
  "include": [  
    "src/**/*.ts",  
    "spec/**/*.ts"  
  ]  
}
```


...

```
moduleNameMapper: {
  '^src/(.*)$': '<rootDir>/src/$1',
  '^app/(.*)$': '<rootDir>/src/app/$1',
  '^assets/(.*)$': '<rootDir>/src/assets/$1',
  '^environments/(.*)$': '<rootDir>/src/environments/
$1',
},
transformIgnorePatterns: ['node_modules/(?!countup.js)',
'<rootDir>/src/test.ts'],
```

...

...

```
moduleNameMapper: {  
  '^src/(.*)$': '<rootDir>/src/$1',  
  '^app/(.*)$': '<rootDir>/src/app/$1',  
  '^assets/(.*)$': '<rootDir>/src/assets/$1',  
  '^environments/(.*)$': '<rootDir>/src/environments/$1',  
},  
  
transformIgnorePatterns: ['node_modules/(?!countup.js)',  
<rootDir>/src/test.ts'],
```

...

Few Testing Principles

Avoid Hasty Abstractions

Avoid Nesting While Testing

Avoid Testing Implementation Details



Few Testing Principles

Avoid Hasty Abstractions

Avoid Nesting While Testing

Almost Avoid Testing Implementation Details



Jest with CLI

```
npm install -D @nrwl/jest
```

```
...
"test": {
  "builder": "@angular-devkit/build-angular:karma",
  "options": {
    "main": "src/test.ts",
    "polyfills": "src/polyfills.ts",
    "tsConfig": "tsconfig.spec.json",
    "karmaConfig": "karma.conf.js",
    "assets": [
      "src/favicon.ico",
      "src/assets"
    ],
    "styles": [
      "src/styles.scss"
    ],
    "scripts": []
  }
},
...
```

```
...  
"test": {  
  "builder": "@nrwl/jest:jest",  
  "options": {  
    "jestConfig": "./jest.config.js",  
    "setupFile": "src/setup-jest.ts",  
    "tsConfig": "tsconfig.spec.json"  
  }  
},  
...
```



**While Using Builders, Look
into their `package.json` for
relevant library versions.**

...
...

```
"devDependencies": {
```

...
...

```
"@types/jest": "26.0.8",
```

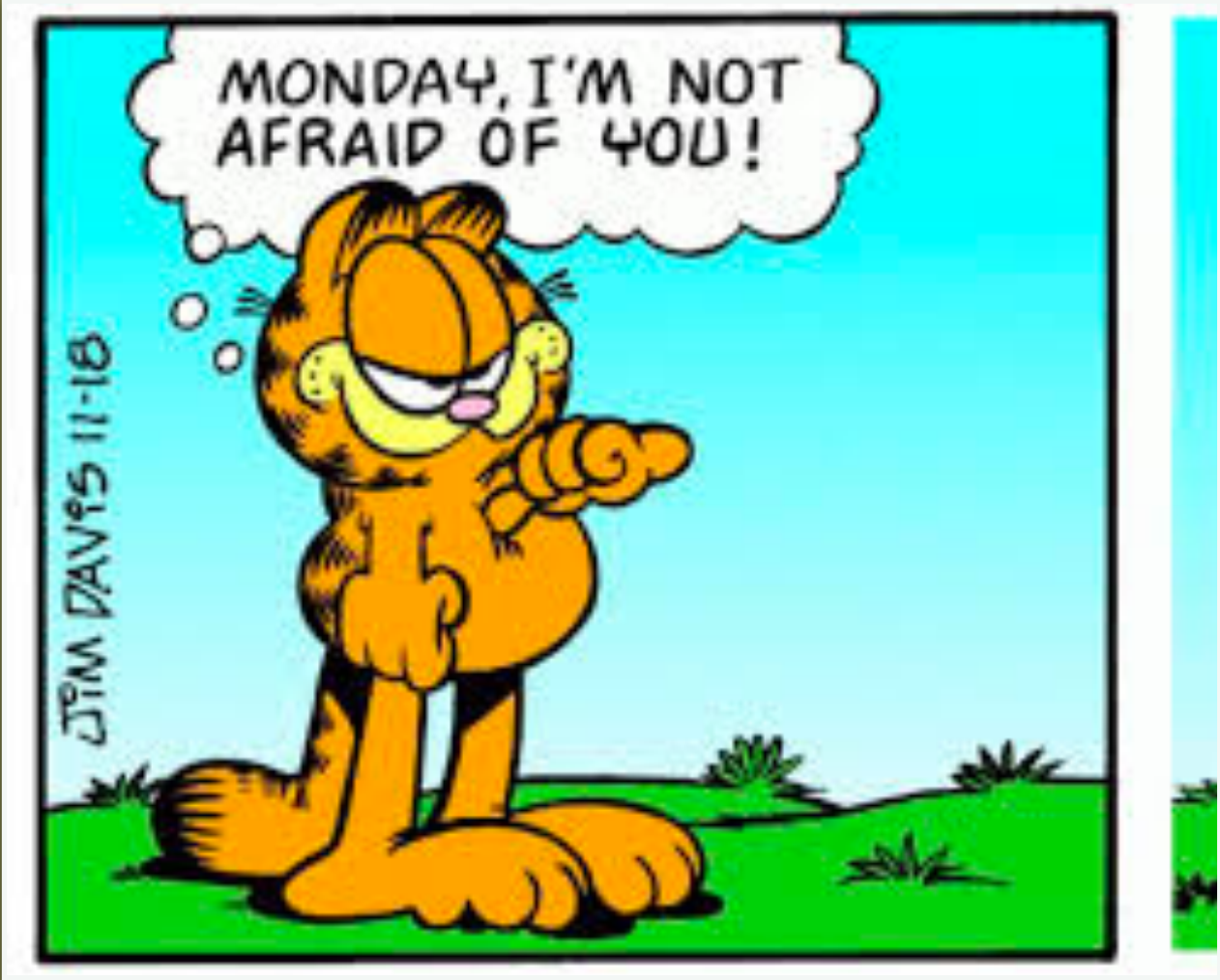
```
"jest": "26.2.2",
```

```
"jest-preset-angular": "8.2.1",
```

```
"ts-jest": "26.1.4"
```

```
}
```

But its Saturday,
Garfield



Codes And Slides : <https://github.com/agugan/ng-keralam-meetup-demo>



Any
Questions



**Thank You
Very
Much**