



Microsoft

ASP .NET CORE,
Angular 2, e TypeScript

Scaffolding



O que é Scaffolding



VS





Hulk:

- Força bruta!
- Mais código
- Muito rápido
- Difícil de achar
- Ou se tornar
- (ninguém quer ser verde)

Homem de ferro:

- Ferramentas!
- Menos código
- Atalhos, IDEs
- Fácil de disseminar
- (todo mundo quer ser milionário)





Qual é melhor?



+53

Armaduras diferentes do Iron Man

http://marvel.wikia.com/wiki/Iron_Man_Armor

Hulkbuster Armor

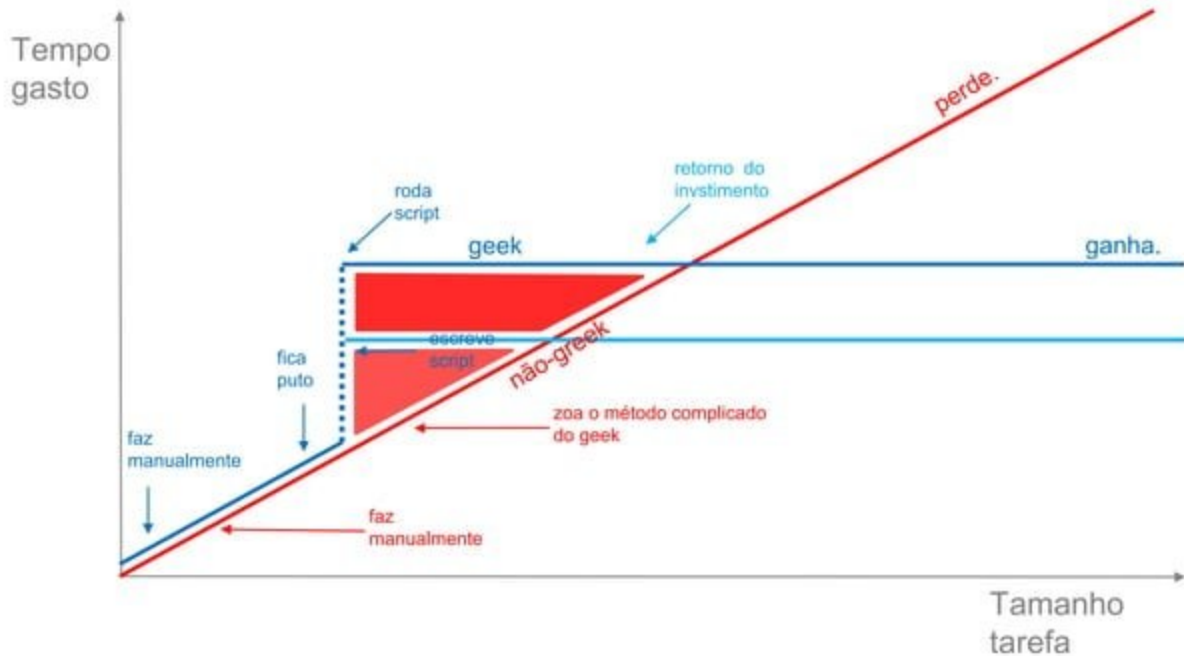
Como o nome sugere, foi feita especificamente feita para batalhar contra o Hulk. [...] Durante seu primeiro uso enagural, ela conseguiu aguentar um combate fisico contra o Hulk



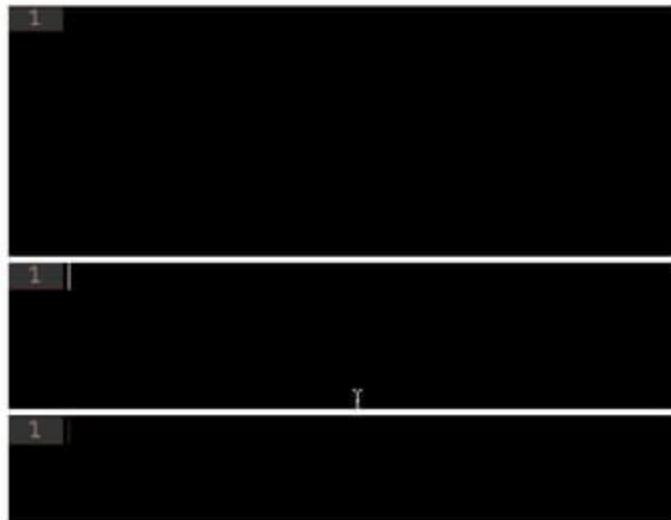


Use ferramentas de produtividade

- Frameworks, Bibliotecas ...
- Snippets, shortcuts, scripts ...
- IDEs, livre reload, hot deploy ...
- **Geradores de código**



Emmet - Ferramenta para desenvolvedores Web



<http://emmet.io/>



SCAFFOLDING

É um termo [...] da engenharia civil, que denota a colocação de andaimes e outras estruturas para suportar temporariamente trabalhadores e/ou maquinário enquanto a construção definitiva não está pronta [...]



Scaffolding

- Rails (Ruby)
- Spring Roo (Java)
- Cake (PHP)
- Yeomen (WEB)



HTML



CSS



JS



Nova paradigma...



...vem com muitas outras ferramentas!



"Git is a fast, scalable, distributed revision control system with an unusually rich command set that provides both high-level operations and full access to internals."

Open-Source
Version Control
Multiplatforma (Linux, Windows, Mac, [...])
<https://github.com/git/git>

git / git



Watch 1,478



Star 14,655



Fork 8,300

Code

Pull requests 54

Projects 0

Pulse

Graphs



“GitHub is a web-based Git repository hosting service”

Open-Source
Social Network
Git Repository

<https://github.com/git/git.github.io>

git / git.github.io

Watch

25

★ Star

46

Fork

63

Code

Issues 7

Pull requests 0

Projects 0

Pulse

Graphs



YEOMAN

Scaffolding Tool



“Yeoman is a robust and opinionated set of tools, libraries, and a workflow that can help developers quickly build beautiful, compelling web apps.”

Open-Source
Scaffolding
Web Components

<https://github.com/yeoman/yeoman>

yeoman / yeoman



Watch

498



Star

8,187



Fork

750



Code



Issues 12



Pull requests 0



Projects 0



Pulse



Graphs

BUILD

TOLL



“Gulp is a toolkit that helps you automate painful or time-consuming tasks in your development workflow.”

Open-Source
Automation

<https://github.com/gulpjs/gulp>

gulpjs / gulp



Watch

1,080



Star

23,293



Fork

3,186



Code



Issues 19



Pull requests 4



Projects 0



Pulse



Graphs

ou



“Grunt: The JavaScript Task Runner”

Open-Source
Automation

<https://github.com/gruntjs/grunt>

gruntjs / grunt

👁 Watch 607

★ Star 11,065

🍴 Fork 1,416

🔗 Code

📄 Issues 302

🔀 Pull requests 21

📁 Projects 0

📖 Wiki

📶 Pulse

📊 Graphs

Qual melhor?



2,437,448	2,656	174	23,052	493ms
Download ultimo mês	Plugins disponíveis	Contribuidores GitHub	Perguntas Stackoverflow	Benchmarks
1,910,975	5,915	64	22,945	930ms

Diferença código

```
1 gulp.task('sass', function () {  
2   gulp.src('dev/*.scss')  
3     .pipe(sass())  
4     .pipe(autoprefixer())  
5     .pipe(gulp.dest('css/styles'));  
6 });  
7 gulp.task('default', function() {  
8   gulp.run('sass');  
9   gulp.watch('dev/*.scss', function() {  
10     gulp.run('sass');  
11   });  
12 });
```



Diferença código

```
1  grunt.initConfig({
2    sass: {
3      dist: {
4        files: [{
5          src: 'dev/*.scss',
6          dest: '.tmp/styles',
7          expand: true,
8          ext: '.css'
9        }]
10   },
11 },
12 autoprefixer: {
13   dist: {
14     files: [{
15       expand: true,
16       cwd: '.tmp/styles',
17       src: '{,*/}*.css',
18       dest: 'css/styles'
19     }]
20   },
21 },
22 watch: {
23   styles: {
24     files: ['dev/*.scss'],
25     tasks: ['sass:dist', 'autoprefixer:dist']
26   }
27 },
28 });
29 grunt.registerTask('default', ['styles', 'watch']);
```



**Package
Manager**



“Bower package manager for the Web, created by Twitter”

Open-Source
Package manager

<https://github.com/bower/bower>

bower / bower

Watch

863

★ Star

14,607

Y Fork

1,912

Code

Issues 201

Pull requests 36

Projects 0

Wiki

Pulse

Graphs

Exemplo código

```
{  
  "name": "app-name",  
  "version": "0.0.1",  
  "dependencies": {  
    "sass-bootstrap": "~3.0.0",  
    "modernizr": "~2.6.2",  
    "jquery": "~1.10.2"  
  },  
  "private": true  
}
```



+4321

Geradores registrados, sendo +46 oficias

<http://yeoman.io/generators/>

<https://github.com/yeoman>

Geradores oficiais

- generator-angular
- generator-polymer
- generator-bootstrap
- generator-chrome-extension
- (...)

Geradores comunidade

- **Javascript:** Mean, React, Meteor
- **Mobile:** Android, iOS, Ionic, Cordova, Xaramin
- **Java:** Jhipster, Spring, JAX-RS
- **.NET:** Aspnetmvc, Aspnetcore,
- (...)



Knockout.



BACKBONE.JS



batman.js



Frameworks SPA

O que é SPA

- Single page application
- Menos lado servidor, mais do lado cliente
- Não necessariamente Parallax ou Infinite Scroll

Vantagens

- Melhor experiência usuário
- Performance
- Maior responsabilidade para o lado do cliente

Desvantagens

- Um novo framework
- Javascript desabilitado
- SEO (Search engine optimization)



“Angular is a development platform for building mobile and desktop web applications”

Open-Source
Single Page Application
Web Components

<https://github.com/angular/angular>

angular / angular

Watch ▾

2,045

★ Star

16,613

🍴 Fork

4,226

↔ Code

📄 Issues 1,209

🔀 Pull requests 65

📁 Projects 4

📈 Pulse

📊 Graphs

PRINCIPAIS BLOCOS

COMPONENTES

DIRETIVAS

ROTEAMENTO

SERVIÇOS

TEMPLATE

METADATA

DATA BINDING

INJEÇÃO
DEPÊNCIA



Barra de navegação



Barra Lateral



Star Widget



Post



Post



Post

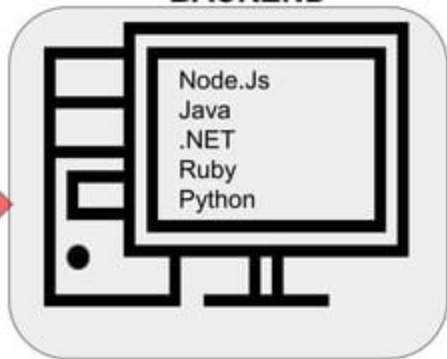
COMPONENT



SERVICE



BACKEND



TypeScript

“TypeScript is a superset of JavaScript that compiles to clean JavaScript output”

Open-Source

MultiBrowser(Chrome,Edge,Firefox, [...])

Multiplatforma (Linux, Windows,Mac, [...])

<https://github.com/Microsoft/TypeScript>

 [Microsoft / TypeScript](#)



Watch ▾ 1,159



Star 15,166



Fork 2,041

 Code

 Issues 1,268

 Pull requests 60

 Projects 1

 Wiki

 Pulse

 Graphs

```
interface IComponent{  
    getId() : string;  
}  
  
5. class Button implements IComponent{  
    id:string;  
    getId():string{  
        return this.id;  
    }  
10. }
```



```
var Button = (function () {  
    function Button() {  
    }  
    Button.prototype.getId = function () {  
5.        return this.id;  
    };  
    return Button;  
})();
```

.NET Core

“.NET Core is a blazing fast, lightweight and modular platform for creating web applications and services that run on Windows, Linux and Mac”

Open-Source
Multiplataforma (Linux, Windows, Mac,...)
Ambiente .NET

<https://github.com/dotnet/core>

dotnet / core

Watch

663

★ Star

2,689

Fork

497

Code

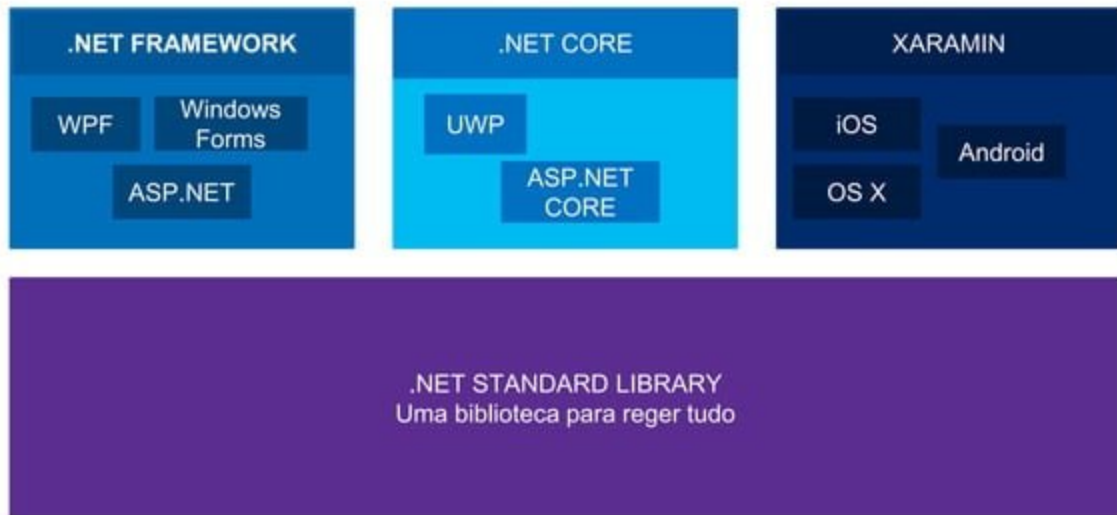
Issues 13

Pull requests 0

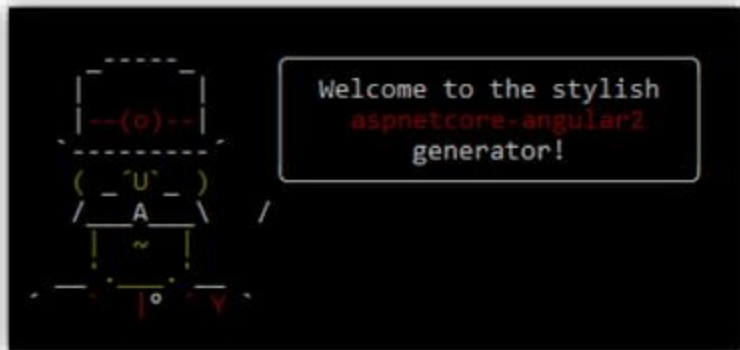
Projects 0

Pulse

Graphs



Exemplo





“Node.js is a JavaScript runtime built on Chrome's V8 JavaScript engine”

Open-Source

Roda sem auxilio do navegador

Multiplataforma (Linux, Windows, Mac,...)]

<https://github.com/nodejs/node-v0.x-archive>

nodejs / node-v0.x-archive



Watch ▾ 2,408



Star 37,015



Fork 8,335

Code

Issues 570

Pull requests 41

Projects 0

Wiki

Pulse

Graphs



Downloads

Current version: v4.4.3

Download the Node.js source code or a pre-built installer for your platform, and start developing today.

LTS
Recommended For Most Users

Stable
Latest Features



Windows Installer

node-v4.4.3-win32-x64.msi



Macintosh Installer

node-v4.4.3.pkg



Source Code

node-v4.4.3.tar.gz

Windows Installer (.msi)

Windows Binary (.exe)

Mac OS X Installer (.pkg)

Mac OS X Binaries (.tar.gz)

Linux Binaries (.tar.xz)

[Source Code](#)

32-bit	64-bit
32-bit	64-bit
64-bit	
64-bit	
32-bit	64-bit

node-v4.4.3-linux-arm



Installing Node.js via package manager

Note: The packages on this page are maintained and supported by their respective packagers, **not** the Node.js core team. Please report any issues you encounter to the package maintainer. If it turns out your issue is a bug in Node.js itself, the maintainer will report the issue upstream.

- Arch Linux
- Debian and Ubuntu based Linux distributions
- Enterprise Linux and Fedora
- FreeBSD and OpenBSD
- Gentoo
- NetBSD
- openSUSE and SLE
- OSX
- SmartOS and illumos

Instalação

`npm install -g yo`

`npm install -g generator-aspnetcore-angular2`

`npm install -g typescript`

Gerar um novo projeto

`yo aspnetcore-angular2`

Command-line

```
cd src/sua-aplicacao  
tsc  
dotnet restore  
dotnet run
```

```
Command Prompt
m-test@1.5.1, indash@1.18.1)

C:\Users\osmar\workspace\generator-aspnetcore-angular>
C:\Users\osmar\workspace\generator-aspnetcore-angular>yo aspnetcore-angular2
? .....
We're constantly looking for ways to make yo better!
May we anonymously report usage statistics to improve the tool over time?
More info: https://github.com/yeoman/insight & http://yeoman.io
? ..... Yes

  _____
 /         \
|  -.-.  -  |
|  (U)  -  |
|  -.-.  -  |
 \         /
  _____

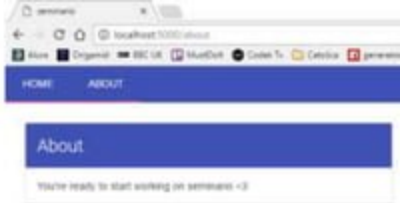
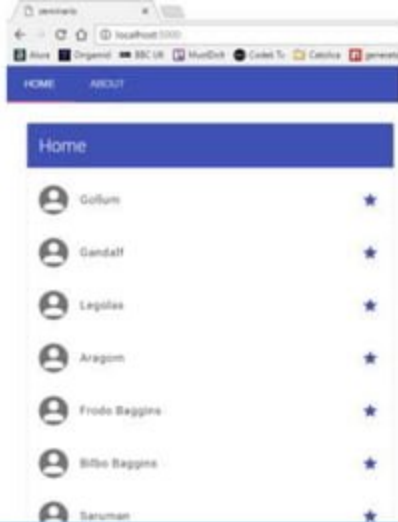
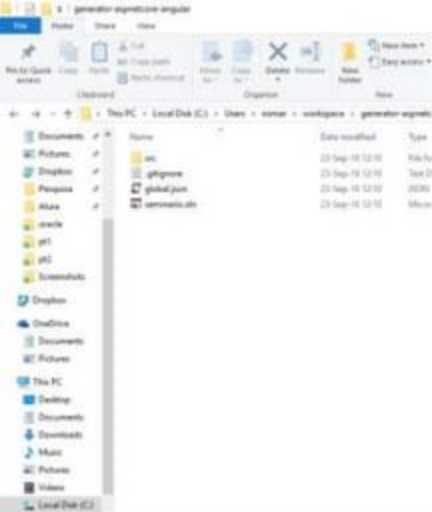
Welcome to the stylish
generator!

? What's the project name (this will also be your namespace name)? seminario
? Want me to create the directory for you? No
? Want me to generate VS Code debug configuration? No
? Want me to include Swagger? No

creating files...

create .gitignore
create global.json
create seminario.sln
create src\seminario\appsettings.json
create src\seminario\package.json
create src\seminario\project.json
create src\seminario\Program.cs
create src\seminario\Startup.cs
create src\seminario\tsconfig.json
create src\seminario\web.config
create src\seminario\typings.json
create src\seminario\seminario.xproj
```

Resultado



O que gerou 😊

Se informe sobre Yomen



<http://yeoman.io/>



Microsoft

ASP .NET CORE,
Angular 2, e TypeScript

Scaffolding

