

# Heroku

Web: <https://www.heroku.com/>

Heroku es una plataforma de computación en la nube que soporta diferentes tipos de lenguajes de programación y permite desplegar, alojar, supervisar y escalar las aplicaciones.

## Características:


Permite el uso de diferentes lenguajes de programación

Integra diferentes servicios

## Despliegue de una aplicación React

### Creamos nuestra aplicación React:

Nos dirigimos al directorio donde queremos crear nuestra aplicación.

 Símbolo del sistema

```
C:\>cd C:\Users\jruan\Desktop\SPRING\reacts-apps
C:\Users\jruan\Desktop\SPRING\reacts-apps>
```

Creamos nuestra app React con: create-react-app componente-simple

```
Símbolo del sistema
C:\Users\jruan\Desktop\SPRING\reacts-apps>create-react-app componente-simple
Creating a new React app in C:\Users\jruan\Desktop\SPRING\reacts-apps\componente-simple.
Installing packages. This might take a couple of minutes.
Installing react, react-dom, and react-scripts...

> core-js@2.6.9 postinstall C:\Users\jruan\Desktop\SPRING\reacts-apps\componente-simple\node_modules\babel-runtime\node_modules\core-js
> node scripts/postinstall || echo "ignore"

> core-js-pure@3.1.3 postinstall C:\Users\jruan\Desktop\SPRING\reacts-apps\componente-simple\node_modules\core-js-pure
> node scripts/postinstall || echo "ignore"

+ react-dom@16.8.6
+ react@16.8.6
+ react-scripts@3.0.1
added 1405 packages in 336.858s

Initialized a git repository.

Success! Created componente-simple at C:\Users\jruan\Desktop\SPRING\reacts-apps\componente-simple
Inside that directory, you can run several commands:

  npm start
    Starts the development server.

  npm run build
    Bundles the app into static files for production.

  npm test
    Starts the test runner.

  npm run eject
    Removes this tool and copies build dependencies, configuration files
    and scripts into the app directory. If you do this, you can't go back!

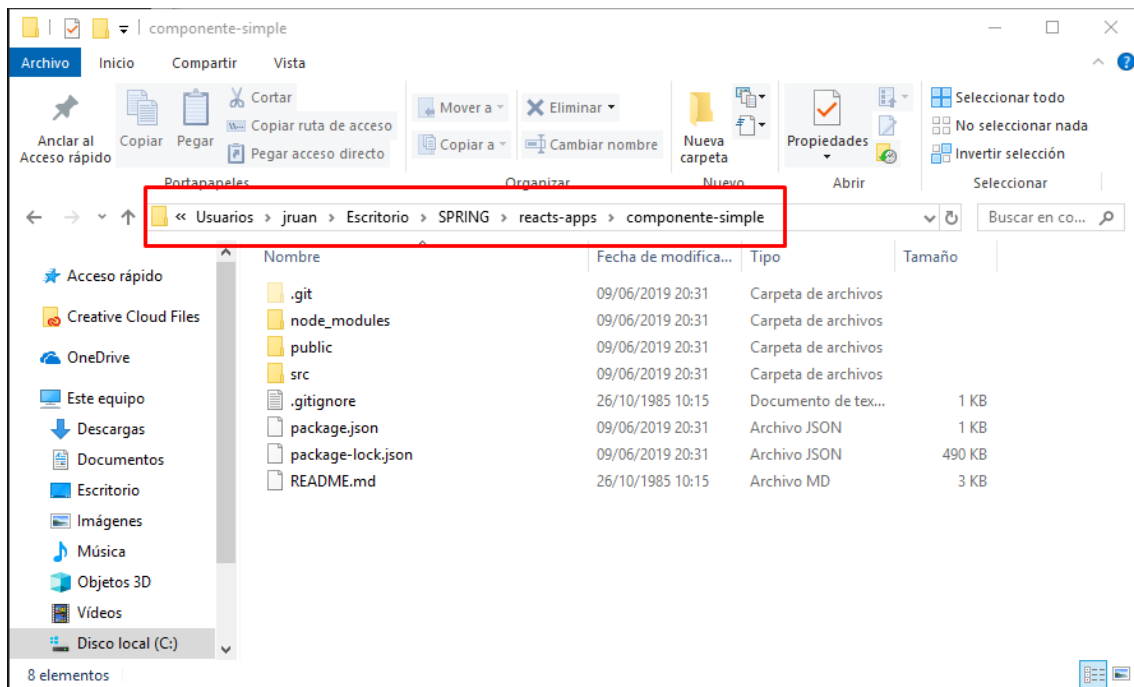
We suggest that you begin by typing:

  cd componente-simple
  npm start

Happy hacking!
```



Vamos a la ruta de la aplicación para ver que nos la ha creado correctamente.



Modificamos el fichero index.js

```
import React from 'react';
import ReactDOM from 'react-dom';
import './index.css';

class HolaMundo extends React.Component {
  render() {
    return (
      <div>
        Hola {this.props.name}
      </div>
    );
  }
}

ReactDOM.render(
  <HolaMundo name="Mundo" />,
  document.querySelector('#root')
);
```

## Descargar e instalar git:

<https://git-scm.com/download/win>

# Downloading Git



### Your download is starting...

You are downloading the latest (2.22.0) 64-bit version of Git for Windows. This is the most recent [maintained build](#). It was released 1 day ago, on 2019-06-08.

If your download hasn't started, [click here to download manually](#).

### Other Git for Windows downloads

Git for Windows Setup

[32-bit Git for Windows Setup](#).

[64-bit Git for Windows Setup](#).

Git for Windows Portable ("thumbdrive edition")

[32-bit Git for Windows Portable](#).

[64-bit Git for Windows Portable](#).

The current source code release is version 2.22.0. If you want the newer version, you can build it from [the source code](#).

Establecemos nuestro nombre de usuario y email de Git

```
git config --global user.name "jruano****"
```

```
git config --global user.email jruano***@****.com
```

```
C:\>git config --global user.name "jruano****"
C:\>git config --global user.email jruano***@****.com
```

## Descargar e instalar Heroku CLI

<https://devcenter.heroku.com/articles/heroku-cli>

### Download and install

- ⚠ The Heroku CLI requires Git, the popular version control system. If you don't already have Git installed, complete the following before installing the CLI:
- [Git installation](#)
  - [First-time Git setup](#)

#### 🍏 macOS

[Download the installer](#)

Also available via Homebrew:

```
$ brew tap heroku/brew && brew install heroku
```

#### 🪟 Windows

Download the appropriate installer for your Windows installation:

[64-bit installer](#)

[32-bit installer](#)

#### 🐧 Ubuntu 16+

Run the following from your terminal:

```
$ sudo snap install --classic heroku
```

[Snap is available on other Linux OS's as well.](#)

Verificar que está instalado heroku --version

Administrador: Símbolo del sistema

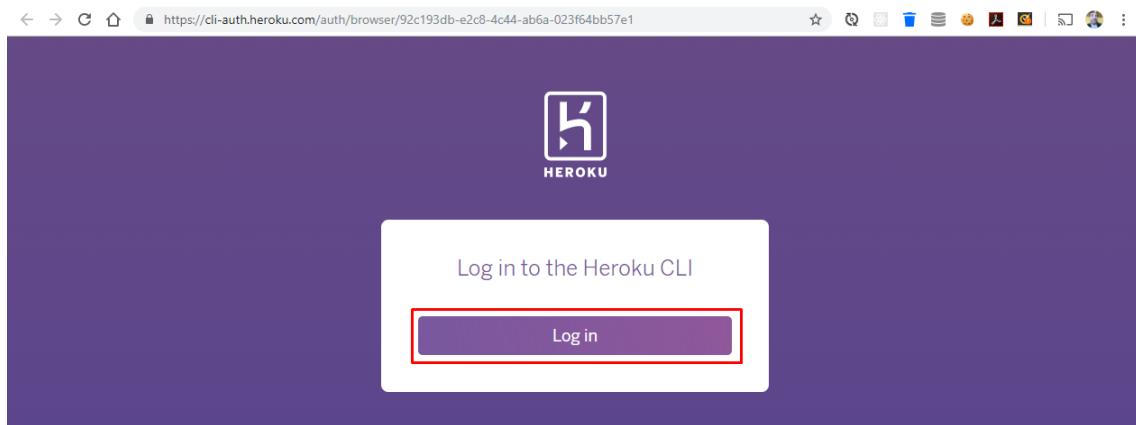
```
C:\>heroku --version
heroku/7.25.0 win32-x64 node-v11.14.0
```

Iniciar sesión en heroku heroku login

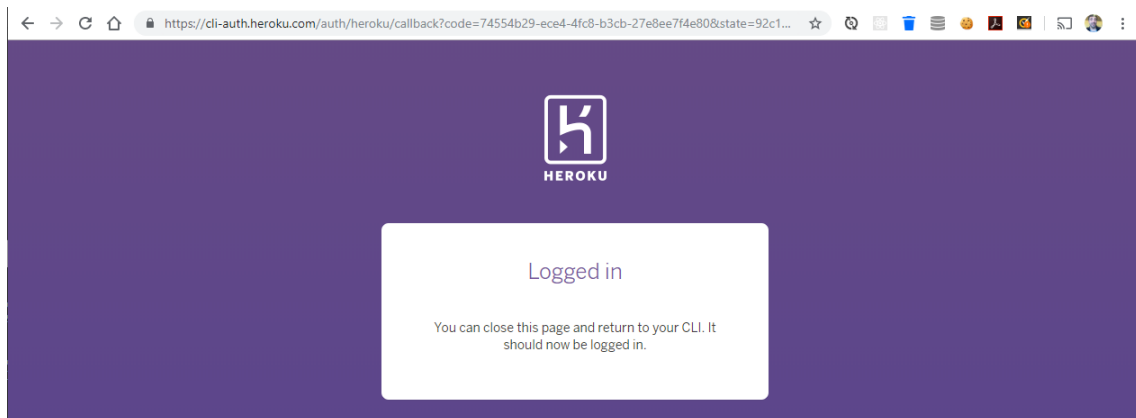
Administrador: Símbolo del sistema - heroku login

```
C:\>heroku login
heroku: Press any key to open up the browser to login or q to exit:
Opening browser to https://cli-auth.heroku.com/auth/browser/92c193db-e2c8-4c44-ab6a-023f64bb57e1
heroku: Waiting for login... /
```

Nos abre una página para que inicies sesión.



Nos solicita que cierres la página que se ha abierto anteriormente.

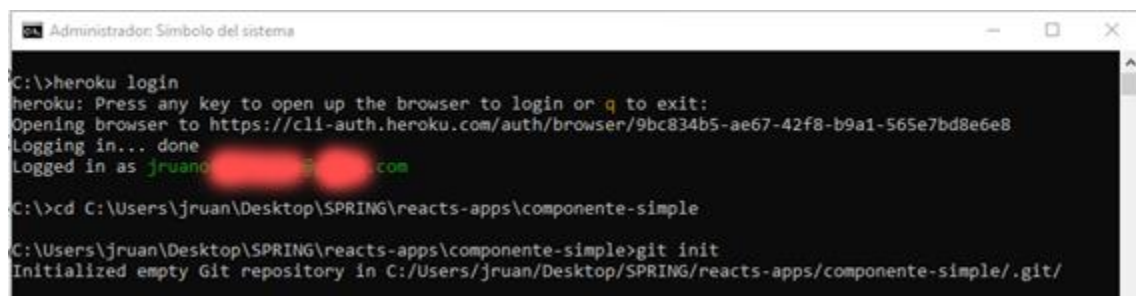


E iniciamos nuestra sesión.



Nos dirigimos al directorio donde esta nuestra aplicación para crear un repositorio git:

`git init`



Añadimos los ficheros del directorio con:

git add .

```
Administrador: Símbolo del sistema
C:\Users\jruan\Desktop\SPRING\reacts-apps\componente-simple>git add .
warning: LF will be replaced by CRLF in .gitignore.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in README.md.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in package-lock.json.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in package.json.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in public/index.html.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in public/manifest.json.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in src/App.css.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in src/App.js.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in src/App.test.js.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in src/index.css.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in src/index.js.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in src/logo.svg.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in src/serviceWorker.js.
The file will have its original line endings in your working directory.
```

Comiteamos la aplicación:

Git commit -m "initial commit"

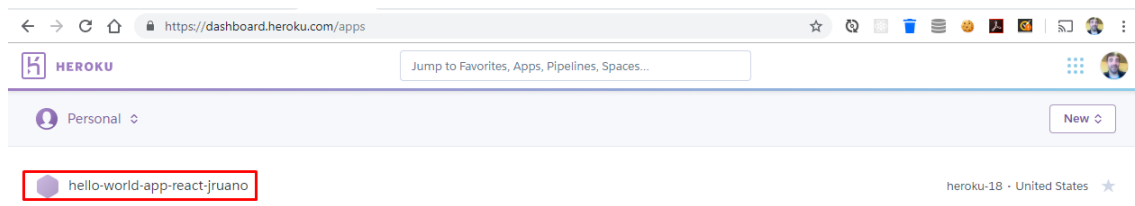
```
Administrador: Símbolo del sistema
C:\Users\jruan\Desktop\SPRING\reacts-apps\componente-simple>git commit -m "initial commit"
[master (root-commit) daba1ba] initial commit
14 files changed, 13144 insertions(+)
create mode 100644 .gitignore
create mode 100644 README.md
create mode 100644 package-lock.json
create mode 100644 package.json
create mode 100644 public/favicon.ico
create mode 100644 public/index.html
create mode 100644 public/manifest.json
create mode 100644 src/App.css
create mode 100644 src/App.js
create mode 100644 src/App.test.js
create mode 100644 src/index.css
create mode 100644 src/index.js
create mode 100644 src/logo.svg
create mode 100644 src/serviceWorker.js
```

Creamos la aplicación de heroku, este nombre debe de ser único y como máximo tiene que tener 30 caracteres.

heroku create hello-world-app-react-jruano

```
Administrador: Símbolo del sistema
C:\Users\jruan\Desktop\SPRING\reacts-apps\componente-simple>heroku create hello-world-app-react-jruano
Creating @ hello-world-app-react-jruano... done
https://hello-world-app-react-jruano.herokuapp.com/ | https://git.heroku.com/hello-world-app-react-jruano.git
```

Como podemos ver en nuestro panel de administración de heroku la ha creado



Desplegamos nuestra aplicación con:

git push heroku master

```
Administrador: Símbolo del sistema

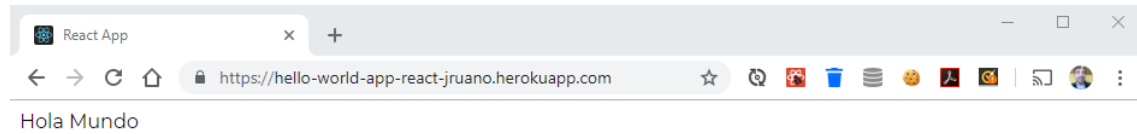
C:\Users\jruan\Desktop\SPRING\reacts-apps\componente-simple>git push heroku master
Enumerating objects: 18, done.
Counting objects: 100% (18/18), done.
Delta compression using up to 8 threads.
Compressing objects: 100% (18/18), done.
Writing objects: 100% (18/18), 137.67 KiB | 3.28 MiB/s, done.
Total 18 (delta 0), reused 0 (delta 0)
remote: Compressing source files... done.
remote: Building source:
remote:
remote: -----> Node.js app detected
remote:
remote: -----> Creating runtime environment
remote:
remote:       NPM_CONFIG_LOGLEVEL=error
remote:       NODE_ENV=production
remote:       NODE_MODULES_CACHE=true
remote:       NODE_VERBOSE=false
remote:
remote: -----> Installing binaries
remote:       engines.node (package.json):  unspecified
remote:       engines.npm (package.json):   unspecified (use default)
remote:
remote:       Resolving node version 10.x...
remote:       Downloading and installing node 10.16.0...
remote:       Using default npm version: 6.9.0
remote:
remote: -----> Installing dependencies
remote:       Installing node modules (package.json + package-lock)
remote:
remote:       > core-js@2.6.9 postinstall /tmp/build_6a1bd0dff90939e063fea406fc516059/node_modules/babel-runtime/no
de_modules/core-js
remote:       > node scripts/postinstall || echo "ignore"
remote:
remote:       > core-js-pure@3.1.3 postinstall /tmp/build_6a1bd0dff90939e063fea406fc516059/node_modules/core-js-pur
a
```

Nos dice que ha ido bien.

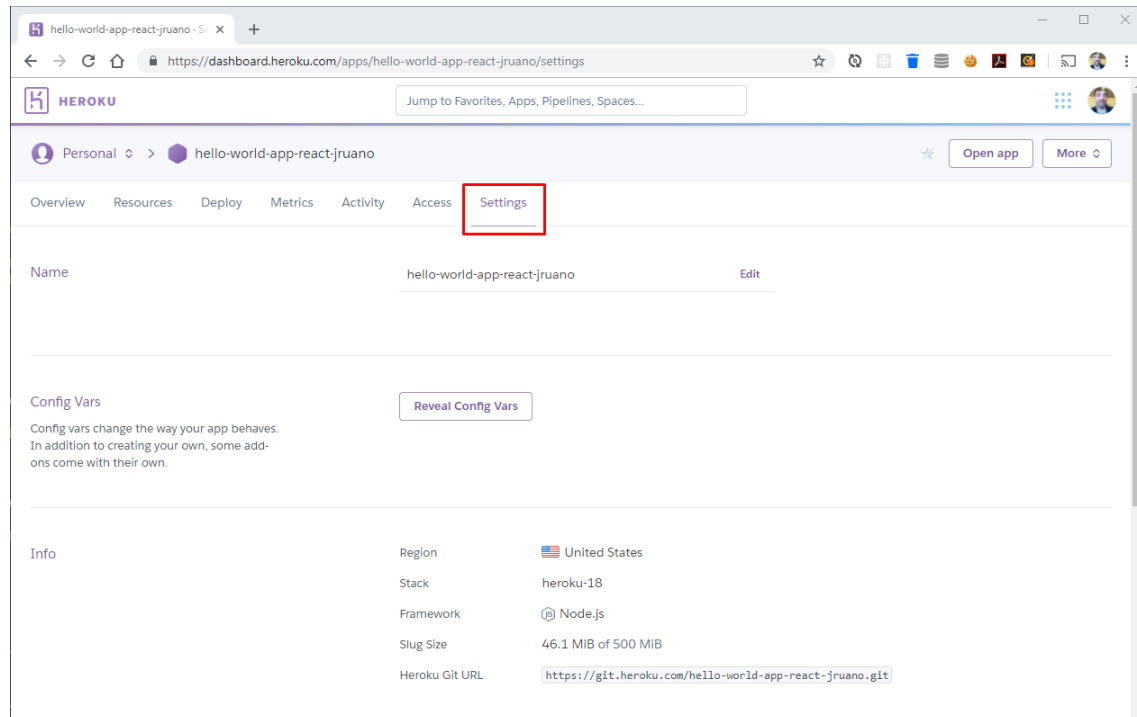
```
remote:
remote: -----> Caching build
remote:       - node_modules
remote:
remote: -----> Pruning devDependencies
remote:       audited 888973 packages in 11.375s
remote:       found 0 vulnerabilities
remote:
remote: -----> Build succeeded!
remote: -----> Discovering process types
remote:       Procfile declares types   -> (none)
remote:       Default types for buildpack -> web
remote:
remote: -----> Compressing...
remote:       Done: 46.1M
remote: -----> Launching...
remote:       Released v3
remote:       https://hello-world-app-react-jruano.herokuapp.com/ deployed to Heroku
remote:
remote: Verifying deploy... done.
To https://git.heroku.com/hello-world-app-react-jruano.git
* [new branch]      master -> master
```

Si vamos a nuestra dirección para ver que tenemos desplegada la aplicación.

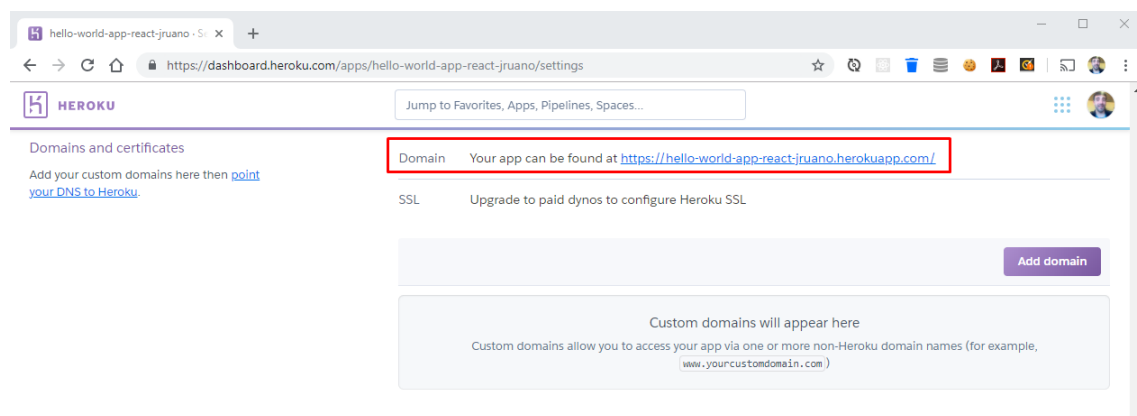
<https://hello-world-app-react-jruano.herokuapp.com/>



En nuestro panel de administración si vamos a Settings.



Podemos ver el dominio de nuestra aplicación.



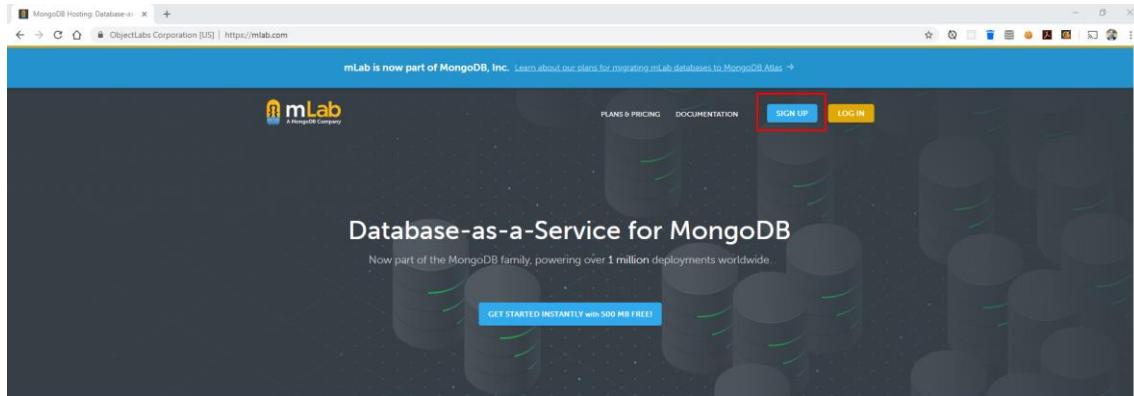


# Despliegue de una aplicación Rest en Java con Spring boot y mongodb

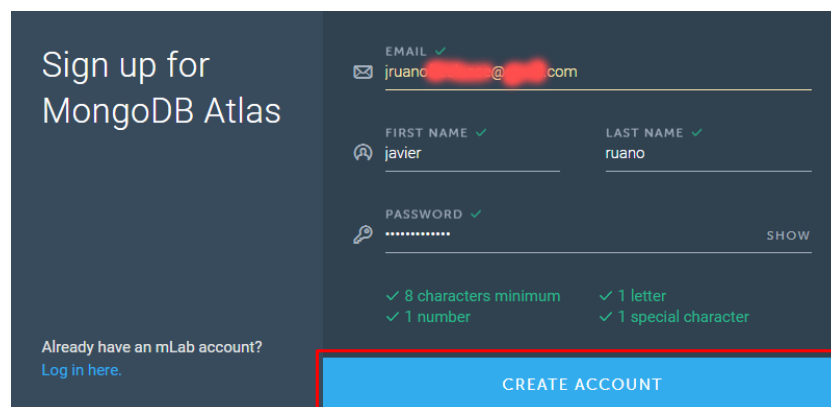
Creamos nuestra base de datos en mlab:

<https://mlab.com/>

Accedemos a la web y hacemos click para registrarnos.



Completamos el formulario y hacemos click en create account.

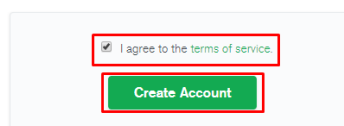


Aceptamos los términos del servicio.

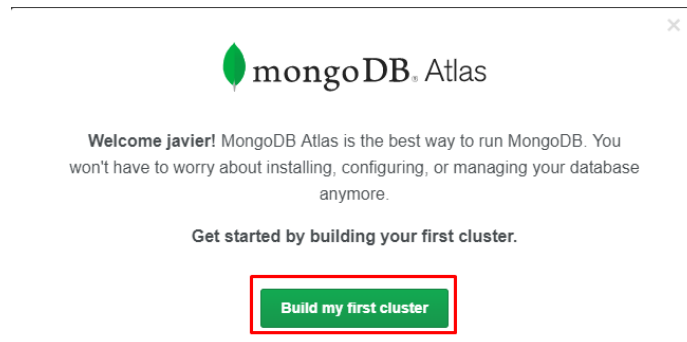


Almost Done!

To finish creating your MongoDB Atlas account,  
please accept our terms of service.



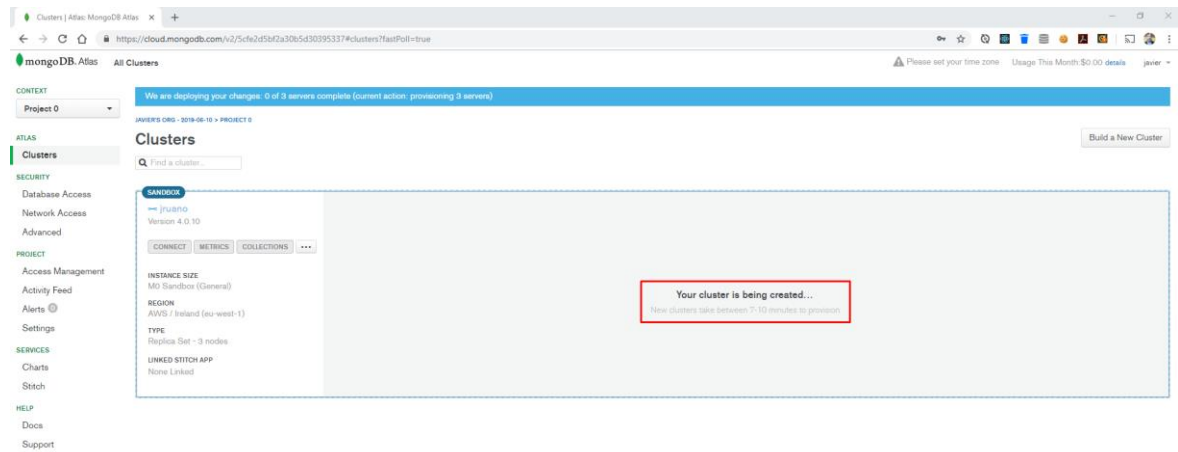
Podemos cerrar el siguiente mensaje para que nos ofrezcan ayuda o proseguir con una pequeña ayuda, hacemos click en Build my first cluster.



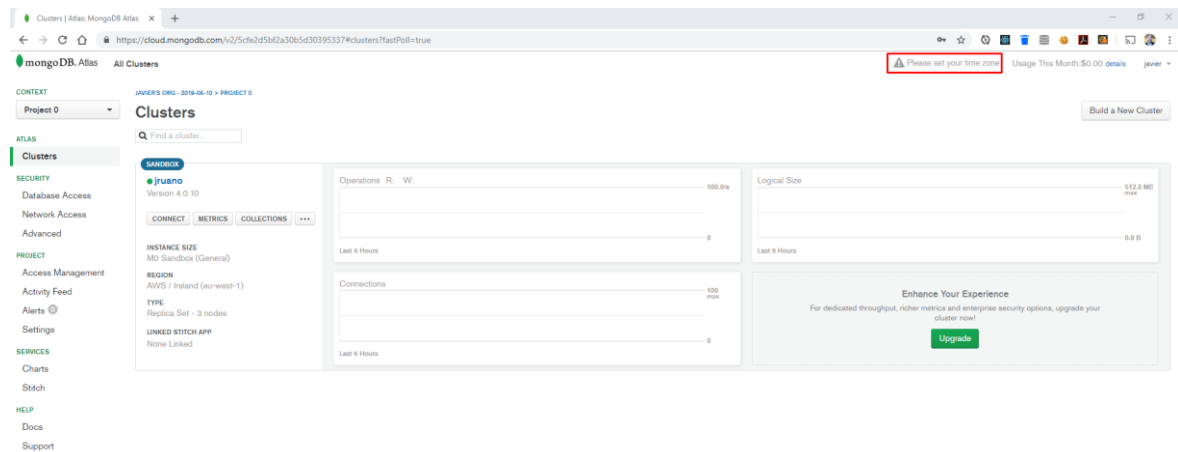
Elegimos la configuración global, en nuestro caso gratuita y desde Europa y hacemos click en Create Cluster.

A screenshot of the "Global Cluster Configuration" form in MongoDB Atlas. The form has several sections: "Cloud Provider & Region" with buttons for AWS, Google Cloud Platform, and Azure; a list of regions categorized by continent (North America, Europe, Asia, South America, Australia); "Cluster Tier" set to "M0 Sandbox (Shared RAM, 512 MB Storage) Encrypted"; "Additional Settings" set to "MongoDB 4.0, No Backup"; and "Cluster Name" set to "jruano". In the "Cloud Provider & Region" section, the "aws" button is highlighted with a red box. In the "Europe" region list, "Ireland (eu-west-1)" is highlighted with a red box and marked as "FREE TIER AVAILABLE". At the bottom, there is a "FREE" label, a "Cancel" button, and a "Create Cluster" button which is highlighted with a red box.

Nos dirigirá a nuestra pantalla de administración donde nos informa de que debemos esperar unos minutos a que se cree el Cluster.



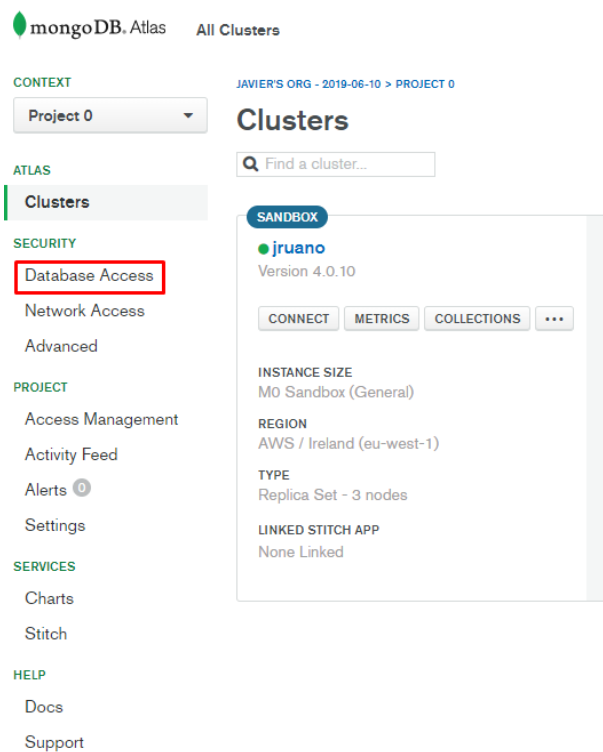
Una vez ya se haya creado podemos empezar por introducir nuestra zona horaria.



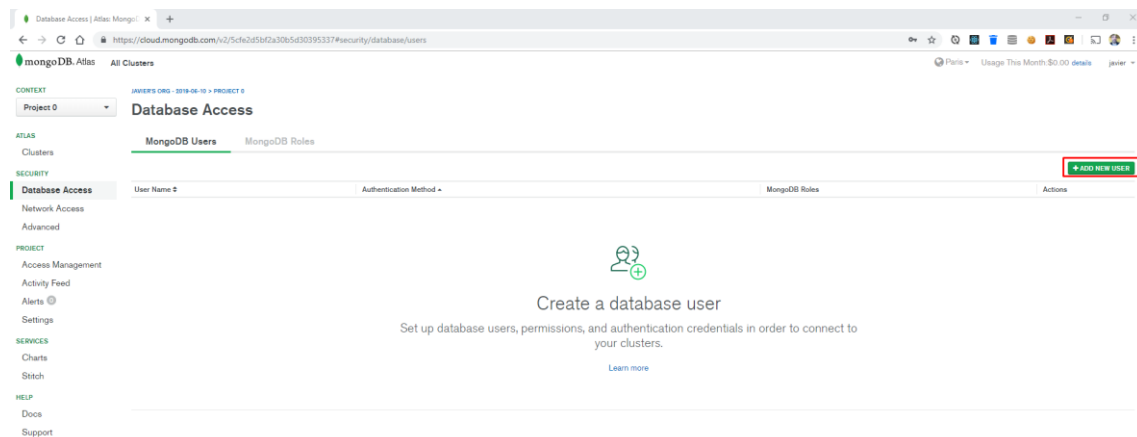
Seleccionamos parís y hacemos click en Set.



Hacemos click en Database Access para configurar nuestra base de datos en mongo.

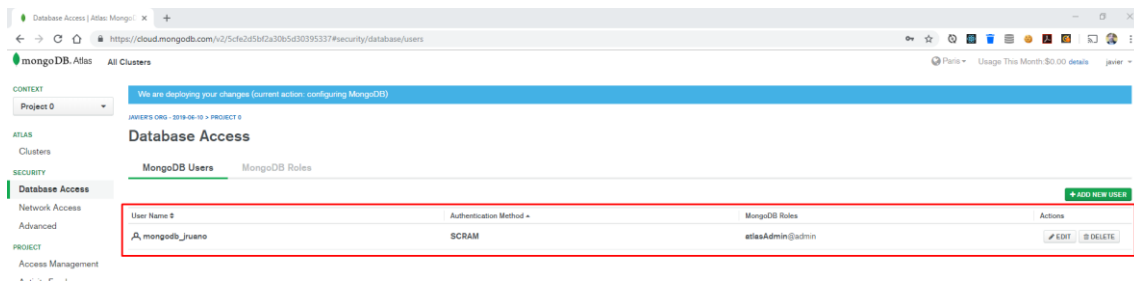


Primeramente, añadimos nuestro usuario para ello hacemos click en Add new user.

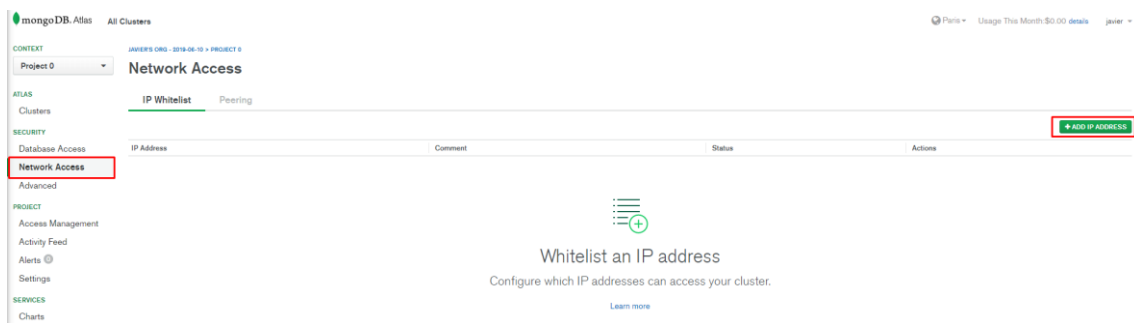


Completamos el formulario de creación del usuario y hacemos click en Add User.

Y como vemos se nos ha creado nuestro usuario.



Ahora debemos de configurar las direcciones IPs que tendrán acceso a nuestra base de datos haciendo click en Network Access y después en Add ip address.



Al ser una prueba haremos click en que cualquier dirección se pueda conectar, si fuera un entorno real añadiríamos la dirección o direcciones que quisiéramos que se conectaran a la bd por lo que hacemos click en Allow Access from anywhere y click en Confirm.

## Add Whitelist Entry

Add a whitelist entry using either CIDR notation or a single IP address. [Learn more.](#)

[ADD CURRENT IP ADDRESS](#)

[ALLOW ACCESS FROM ANYWHERE](#)

Whitelist Entry:

0.0.0.0/0

Comment:

Optional comment describing this entry

☐ Save as temporary whitelist

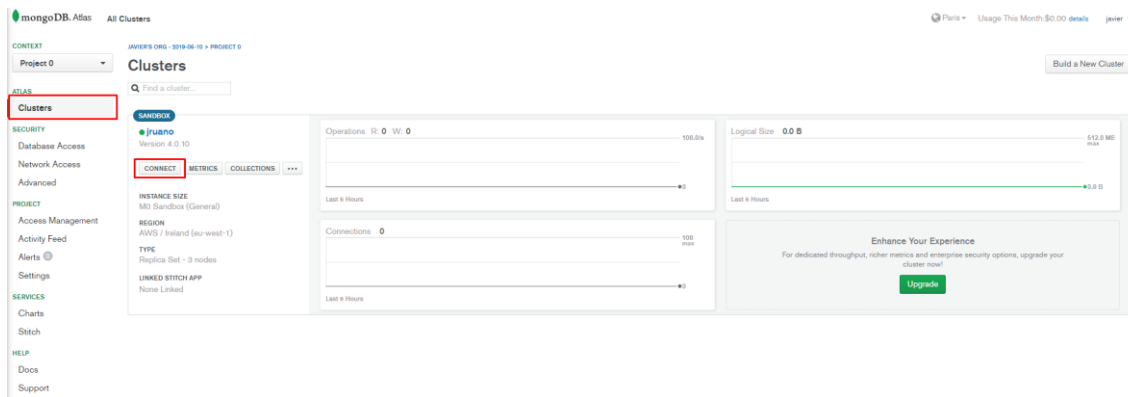
[Cancel](#)

[Confirm](#)

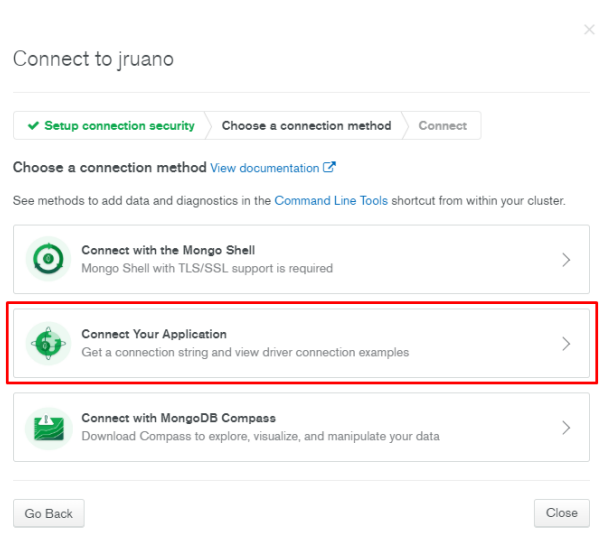
Y como vemos se añade a nuestro panel.



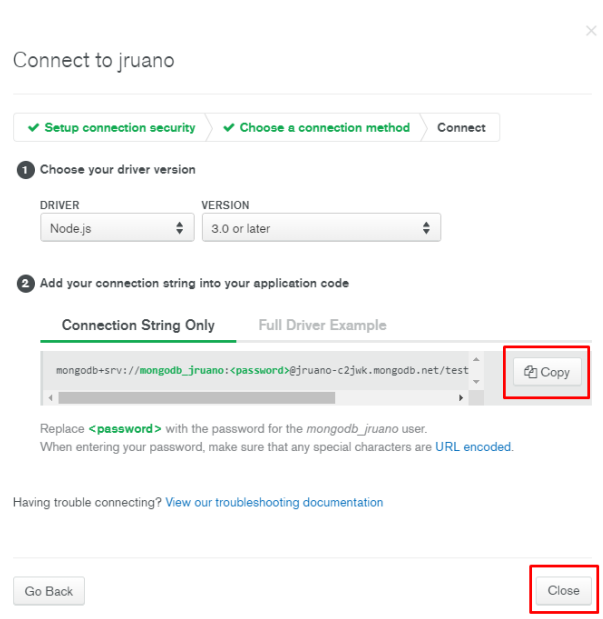
Ahora volveríamos a Clusters y haríamos click en connect.



Y nos aparecen tres opciones, usar la consola, conectar la aplicación o usar un cliente gráfico (MongoDB Compass), seleccionamos conectar nuestra aplicación haciendo click sobre Connect Your Application.



Copiamos nuestra conexión haciendo click sobre Copy y cerramos en Close.

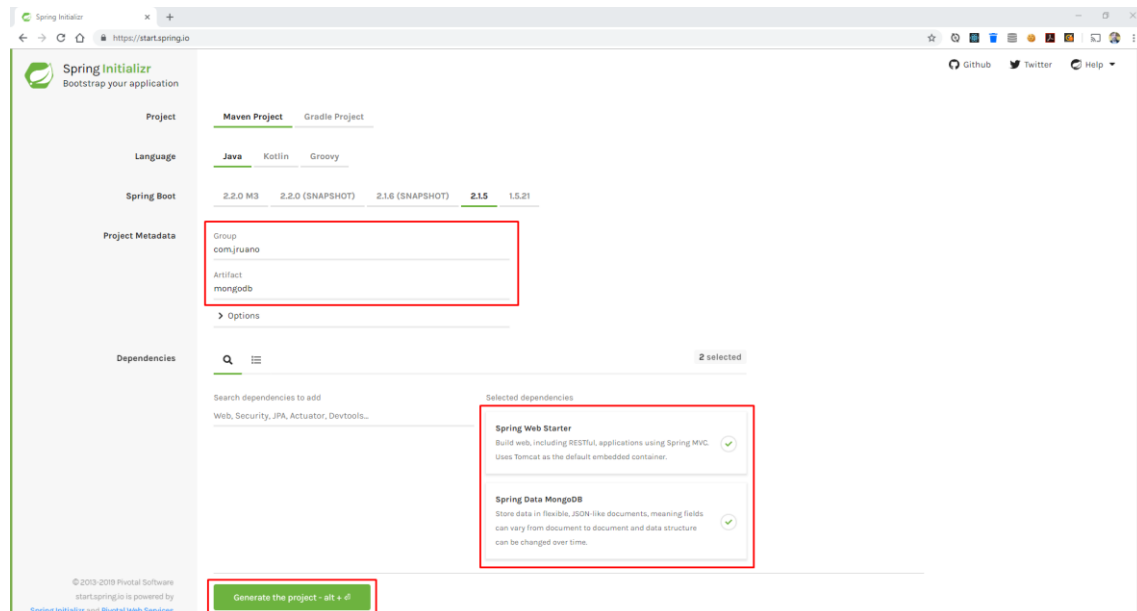


## Creamos nuestro Servicio REST con Spring Boot:

Nos dirigimos a la web de spring inicializr

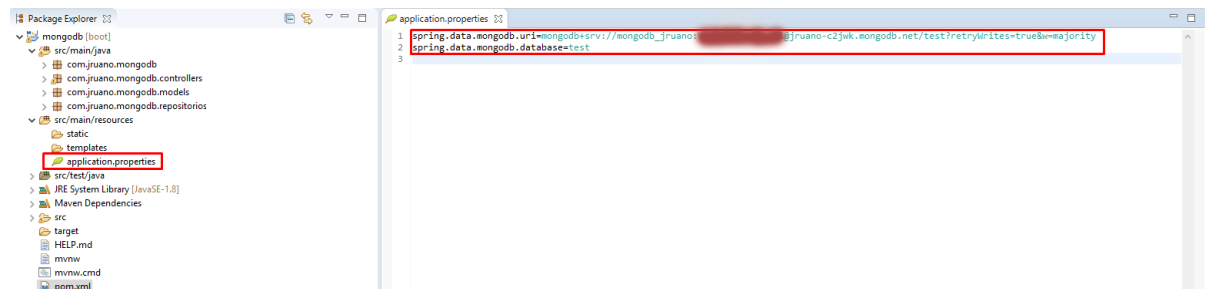
<https://start.spring.io/>

Nombramos la paquetería, añadimos las dependencias Spring Web Starter, Spring Data MongoDB y hacemos click en Generate the project.

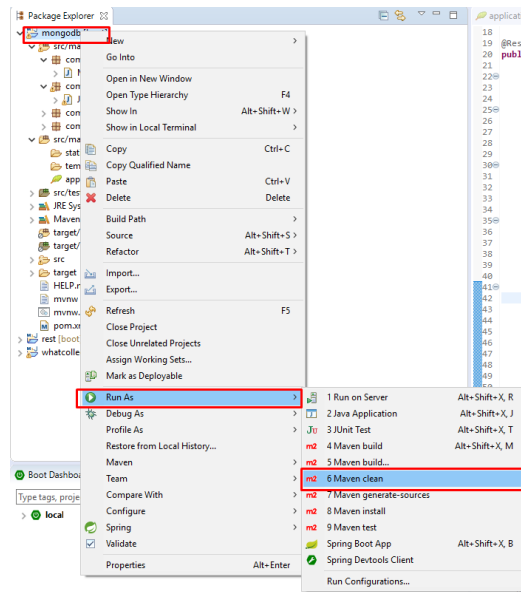


Desarrollamos nuestra aplicación, una vez la tengamos acabada procedemos a añadir la conexión a nuestra bd de mongo, lo que ya podemos hacer es ir a nuestra aplicación en Spring boot y añadir la conexión a nuestro fichero de properties o yaml.

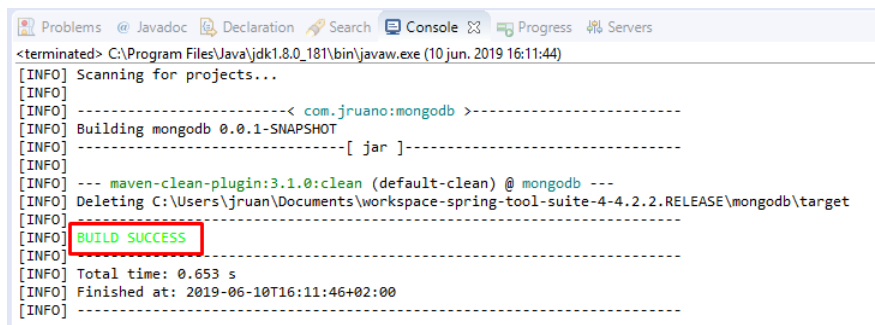
mongodb+srv://mongodb\_jruano:<password>@jruano-c2jwk.mongodb.net/test?retryWrites=true&w=majority



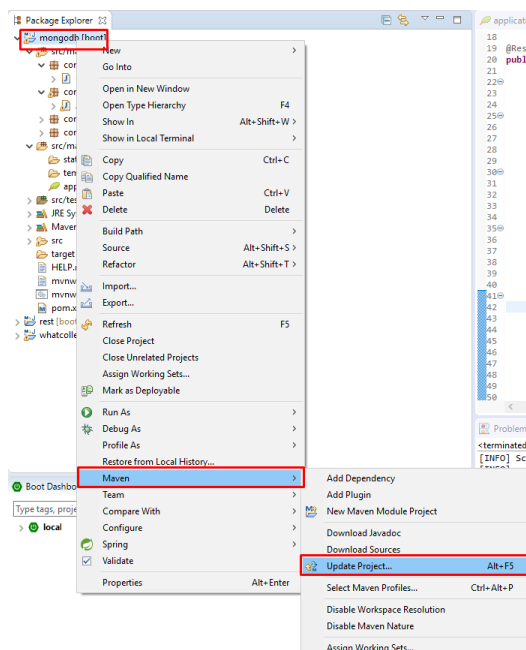
Hacemos maven clean mediante click botón derecho sobre nuestro proyecto, vamos a Run as y click en Maven clean.



Vemos que ha acabado correctamente.

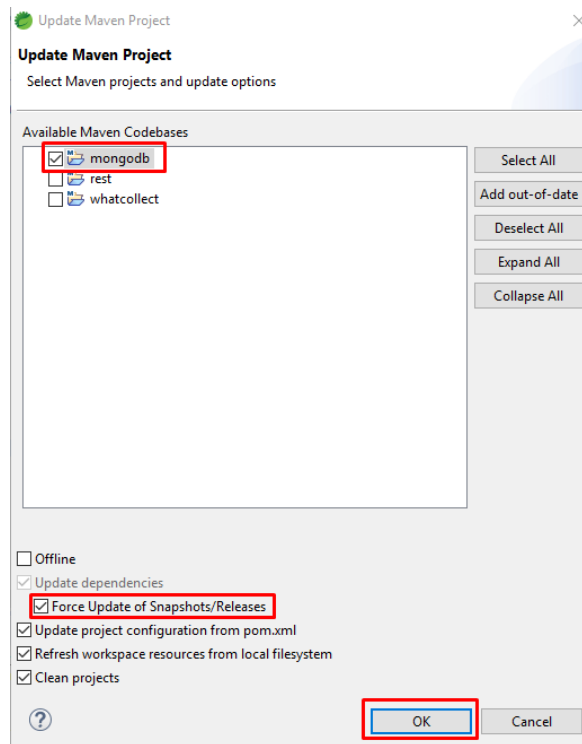


Hacemos Update Project, haciendo click botón derecho sobre nuestro proyecto, vamos a Maven y click en Update Project.

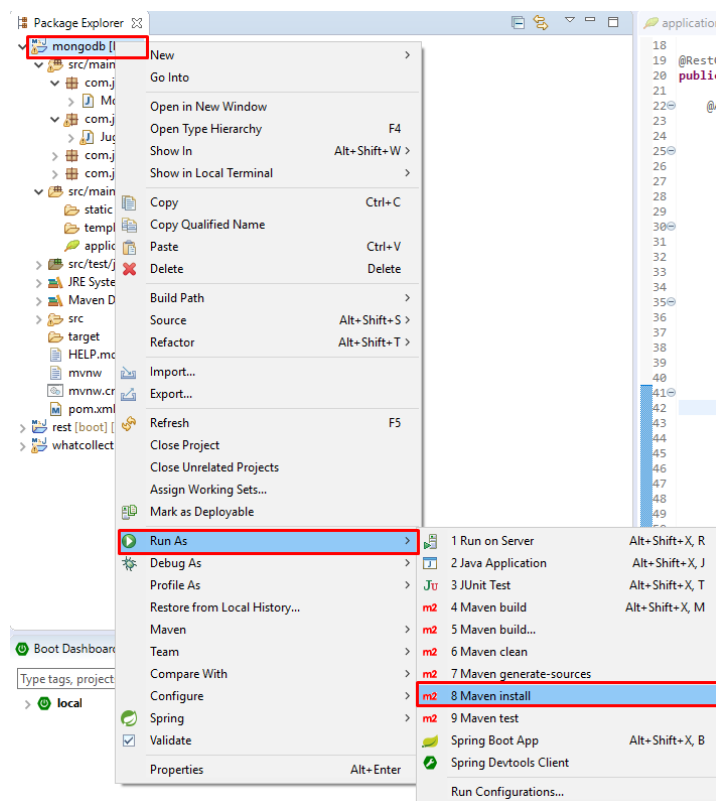




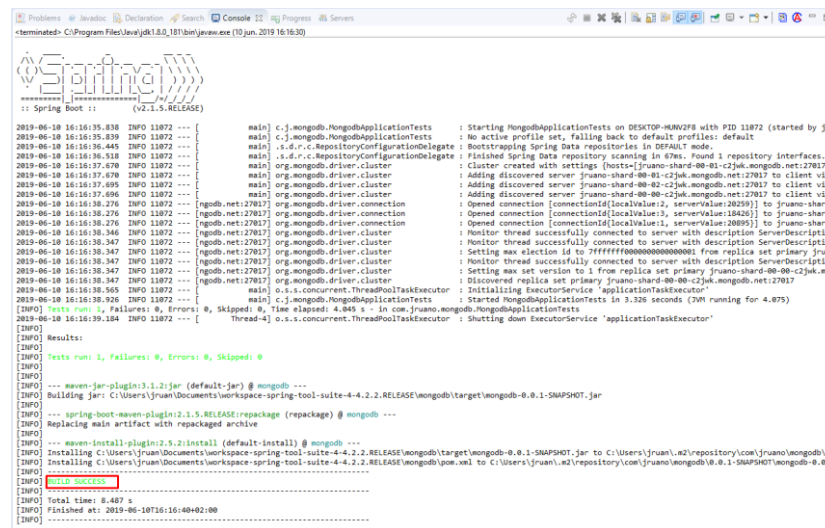
Seleccionamos nuestro proyecto y marcamos Force Update of Snapshots/Releases y click en OK



Realizamos el maven install para generar nuestro .jar para ello hacemos click derecho sobre nuestro proyecto, vamos a Run As y click en Maven install.



Vemos que todo ha ido bien.



```

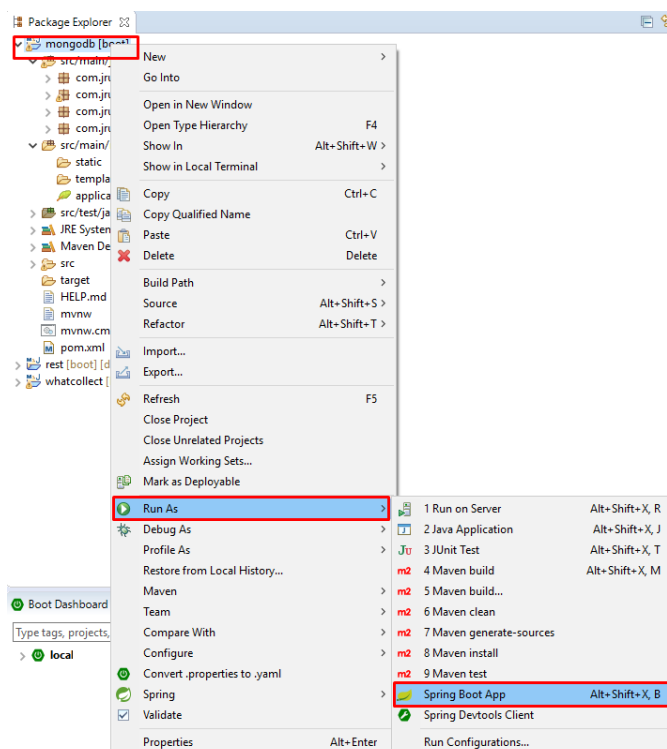
Spring
=====
:: Spring Boot ::
(V2.1.5.RELEASE)

2019-06-10 16:16:35.838 INFO 11872 --- [main] c.j.mongodh.MongodhApplicationTests : Starting MongodhApplicationTests on DESKTOP-HUNV2F9 with PID 11872 (started by j-
2019-06-10 16:16:35.839 INFO 11872 --- [main] c.j.mongodh.MongodhApplicationTests : No active profile set, falling back to default profiles: default
2019-06-10 16:16:36.445 INFO 11872 --- [main] s.d.r.c.RepositoryConfigurationDelegate : Bootstrapping Spring Data repositories in DEFAULT mode.
2019-06-10 16:16:36.518 INFO 11872 --- [main] s.d.r.c.RepositoryConfigurationDelegate : Finished Spring Data repository scanning in 87ms. Found 1 repository interfaces.
2019-06-10 16:16:37.670 INFO 11872 --- [main] org.mongodb.driver.cluster : Cluster created with settings (hosts=[juano-shard-00-01-c2jk.mongodb.net:27017],
2019-06-10 16:16:37.670 INFO 11872 --- [main] org.mongodb.driver.cluster : Adding discovered server 'juano-shard-00-01-c2jk.mongodb.net:27017' to client vi-
2019-06-10 16:16:37.695 INFO 11872 --- [main] org.mongodb.driver.cluster : Adding discovered server 'juano-shard-00-02-c2jk.mongodb.net:27017' to client vi-
2019-06-10 16:16:37.696 INFO 11872 --- [main] org.mongodb.driver.cluster : Adding discovered server 'juano-shard-00-00-c2jk.mongodb.net:27017' to client vi-
2019-06-10 16:16:38.076 INFO 11872 --- [ngodb.net:27017] org.mongodb.driver.connection : Opened connection [connectionId{localValue:1, serverValue:202391}] to juano-shar-
2019-06-10 16:16:38.076 INFO 11872 --- [ngodb.net:27017] org.mongodb.driver.connection : Opened connection [connectionId{localValue:1, serverValue:18485}] to juano-shar-
2019-06-10 16:16:38.076 INFO 11872 --- [ngodb.net:27017] org.mongodb.driver.connection : Opened connection [connectionId{localValue:1, serverValue:20895}] to juano-shar-
2019-06-10 16:16:38.346 INFO 11872 --- [ngodb.net:27017] org.mongodb.driver.cluster : Monitor thread successfully connected to server with description ServerDescripti-
2019-06-10 16:16:38.347 INFO 11872 --- [ngodb.net:27017] org.mongodb.driver.cluster : Monitor thread successfully connected to server with description ServerDescripti-
2019-06-10 16:16:38.347 INFO 11872 --- [ngodb.net:27017] org.mongodb.driver.cluster : Setting max election id to 7fffffff0000000000000000 from replica set primary ju-
2019-06-10 16:16:38.347 INFO 11872 --- [ngodb.net:27017] org.mongodb.driver.cluster : Monitor thread successfully connected to server with description ServerDescripti-
2019-06-10 16:16:38.347 INFO 11872 --- [ngodb.net:27017] org.mongodb.driver.cluster : Setting max set version to 1 from replica set primary juano-shard-00-00-c2jk.m-
2019-06-10 16:16:38.347 INFO 11872 --- [ngodb.net:27017] org.mongodb.driver.cluster : Discovered replica set primary juano-shard-00-00-c2jk.mongodb.net:27017
2019-06-10 16:16:38.365 INFO 11872 --- [main] o.s.s.concurrent.ThreadPoolTaskExecutor : Initializing ExecutorService 'applicationTaskExecutor'
2019-06-10 16:16:38.366 INFO 11872 --- [main] c.j.mongodh.MongodhApplicationTests : Starting MongodhApplicationTests in 3.326 seconds (JVM running for 4.875)
2019-06-10 16:16:38.366 INFO 11872 --- [main] c.j.mongodh.MongodhApplicationTests : Shutting down ExecutorService 'applicationTaskExecutor'
2019-06-10 16:16:39.184 INFO 11872 --- [main] org.springframework.test.util.AssertionErrors : 0, Skipped: 0, Time elapsed: 4.845 s - in com.jruano.mongodh.MongodhApplicationTests
2019-06-10 16:16:39.184 INFO 11872 --- [main] org.springframework.test.util.AssertionErrors : Thread-4) o.s.s.concurrent.ThreadPoolTaskExecutor : Shutting down ExecutorService 'applicationTaskExecutor'

[INFO] Results:
[INFO]
[INFO] Tests run: 1, failures: 0, errors: 0, Skipped: 0
[INFO]
[INFO]
[INFO] --- maven-jar-plugin:3.1.2:jar (default-jar) @ mongodh ---
[INFO] Building jar: C:\Users\Juan\Documents\workspace-spring-tool-suite-4-4.2.2.RELEASE\mongodh\target\mongodh-0.0.1-SNAPSHOT.jar
[INFO]
[INFO] --- spring-boot-maven-plugin:2.1.5.RELEASE:repackage (repackage) @ mongodh ---
[INFO] Replacing main artifact with repackaged archive
[INFO]
[INFO] --- maven-install-plugin:2.5.2:install (default-install) @ mongodh ---
[INFO] Installing C:\Users\Juan\Documents\workspace-spring-tool-suite-4-4.2.2.RELEASE\mongodh\target\mongodh-0.0.1-SNAPSHOT.jar to C:\Users\Juan\m2\repository\com\juano\mongodh\0.0.1-SNAPSHOT\mongodh-0.0.1-SNAPSHOT.jar
[INFO]
[INFO] BUILD SUCCESS
[INFO]
[INFO] Total time: 8.487 s
[INFO] Finished at: 2019-06-10T16:16:40+02:00
[INFO]

```

Seguidamente arrancamos nuestra aplicación spring boot en local para probar que la conexión funciona correctamente, haciendo click derecho sobre el proyecto, y seleccionando Run As, click en Spring Boot App.



```
Problems ▾ Inlaydoc Declaration Search Console Progress Servers
mongodb - MongoDB Application [Spring Boot App] C:\Program Files\Java\jdk-1.8.0_181\bin\java.exe (10-jun-2019 13:31:05)

=====
:: Spring Boot ::      (v2.1.5.RELEASE)

2019-06-10 13:31:06.128 INFO 18040 --- main    com.juan.mongodb.MongoDbApplication : Starting MongoDbApplication on DESKTOP-HUNYFZP with PID 18040 (C:\Users\juan\Documents\workspace-spring-tool-suite
2019-06-10 13:31:06.130 INFO 18040 --- main    com.juan.mongodb.MongoDbApplication : No active profile set, falling back to default profiles: default
2019-06-10 13:31:06.490 INFO 18040 --- main    s.d.r.c.RepositoryConfigurationDelegate : Bootstrapping Spring Data repositories in DEFAULT mode.
2019-06-10 13:31:06.512 INFO 18040 --- main    s.d.r.c.RepositoryConfigurationDelegate : Finished Spring Data repository scanning in 37ms. Found 1 repository interfaces
2019-06-10 13:31:06.828 INFO 18040 --- main    s.b.w.e.embedded.Tomcat.TomcatServer : Tomcat initializing with port(s): 8080 (http)
2019-06-10 13:31:06.845 INFO 18040 --- main    o.apache.catalina.core.StandardService : Starting service [/Tomcat]
2019-06-10 13:31:06.845 INFO 18040 --- main    org.apache.catalina.core.StandardEngine : Starting Servlet engine: [Apache/Tomcat/9.0.19]
2019-06-10 13:31:06.860 INFO 18040 --- main    o.a.c.c.C.[Tomcat].[localhost].[/] : Initializing Spring embedded WebApplicationContext
2019-06-10 13:31:06.910 INFO 18040 --- main    s.o.web.context.ContextLoader : Root WebApplicationContext: initialization completed in 754 ms
2019-06-10 13:31:07.592 INFO 18040 --- main    org.mongodb.driver.cluster : Cluster created with settings {hosts:[juano-shard-00-01-c2jwk.mongodb.net:27017, juano-shard-00-01-c2jwk.mongodb.net:27017], mode:replicaSet}
2019-06-10 13:31:07.592 INFO 18040 --- main    org.mongodb.driver.cluster : Adding discovered server juano-shard-00-01-c2jwk.mongodb.net:27017 to client view of cluster
2019-06-10 13:31:07.608 INFO 18040 --- main    org.mongodb.driver.cluster : Adding discovered server juano-shard-00-01-c2jwk.mongodb.net:27017 to client view of cluster
2019-06-10 13:31:07.669 INFO 18040 --- main    org.mongodb.driver.cluster : Adding discovered server juano-shard-00-02-c2jwk.mongodb.net:27017 to client view of cluster
2019-06-10 13:31:07.971 INFO 18040 --- main    s.o.s.concurrent.ThreadPoolTaskExecutor : Initializing Executor Service "applicationTaskExecutor"
2019-06-10 13:31:08.187 INFO 18040 --- main    s.b.w.e.embedded.Tomcat.TomcatServer : Started tomcat on port(s): 8080 (http) with context path '/'
2019-06-10 13:31:08.189 INFO 18040 --- main    com.juan.mongodb.MongoDbApplication : Started MongoDbApplication in 2.198 seconds (JVM running for 2.755s)
[ngdbd.net:27017] Opened connection [connectionId(localValue=3), serverValue=218103] to juano-shard-00-01-c2jwk.mongodb.net:27017
[ngdbd.net:27017] Opened connection [connectionId(localValue=2, serverValue=19837)] to juano-shard-00-01-c2jwk.mongodb.net:27017
[ngdbd.net:27017] Opened connection [connectionId(localValue=1, serverValue=19549)] to juano-shard-00-02-c2jwk.mongodb.net:27017
[ngdbd.net:27017] Monitor thread successfully connected to server with description ServerDescription(address=juano-shard-00-01-c2jwk.mongodb.net:27017)
[ngdbd.net:27017] Monitor thread successfully connected to server with description ServerDescription(address=juano-shard-00-01-c2jwk.mongodb.net:27017)
[ngdbd.net:27017] Monitor thread successfully connected to server with description ServerDescription(address=juano-shard-00-02-c2jwk.mongodb.net:27017)
[ngdbd.net:27017] Setting max set version to 1 from replica set primary juano-shard-00-00-c2jwk.mongodb.net:27017
[ngdbd.net:27017] Discovered replica set primary juano-shard-00-00-c2jwk.mongodb.net:27017
[ngdbd.net:27017] Monitor thread successfully connected to server with description ServerDescription(address=juano-shard-00-02-c2jwk.mongodb.net:27017)
```

SoapUI 5.5.0

File Project Suite Case Step Tools Desktop Help

Empty SOAP **REST** Import Save All Forum Trial Preferences Proxy Endpoint Explorer

New REST Project

**New REST Project**

Creates a new REST Project in this workspace

URI:

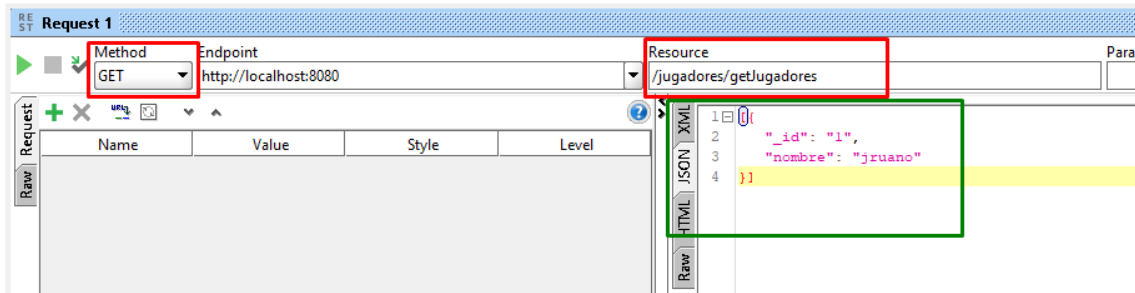
? OK Cancel Import WADL...

The screenshot displays the Swagger UI for a request named "Request 1". The configuration is as follows:

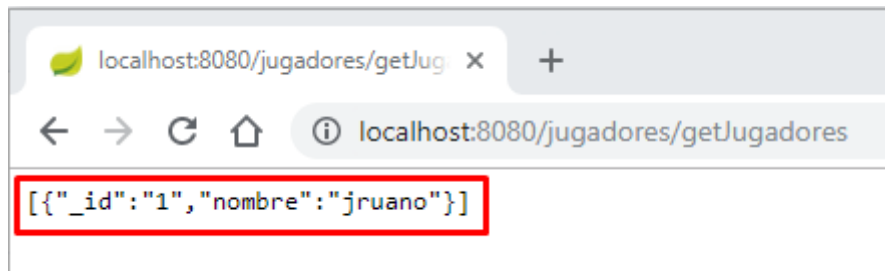
- Method:** POST
- Endpoint:** http://localhost:8080
- Resource:** /jugadores/createJugador
- Parameters:** (Empty)
- Request Body:**
  - Media Type:** application/json
  - Content:** {"\_id": "1", "nombre": "Jruano"}

The "Raw" tab is selected, showing the JSON body. The "JSON" tab is also visible, showing the same JSON body.

Ahora igualmente llamamos a la petición que nos devuelve todos los jugadores a través de GET y como vemos nos devuelve el jugador insertado.

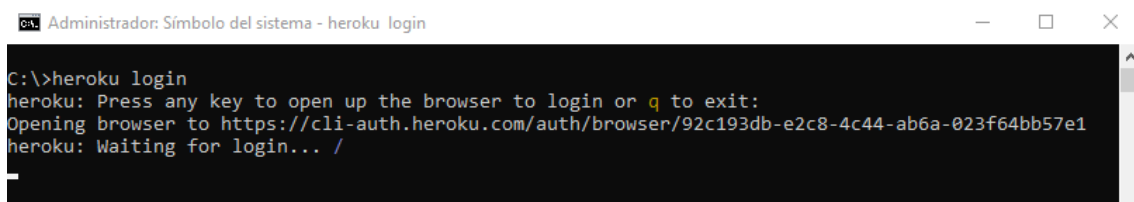


Igualmente, desde el navegador podemos ver el resultado

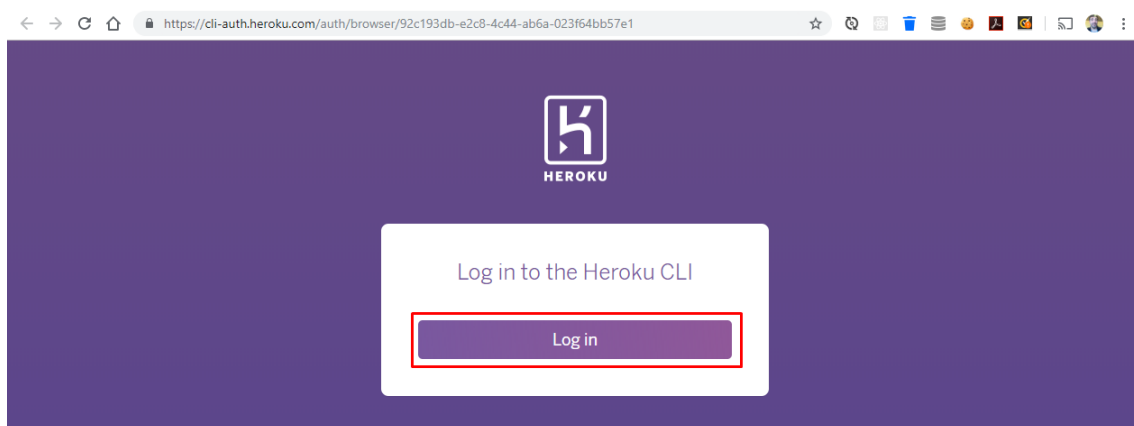


Ahora procedemos al despliegue para ello iniciamos sesión en heroku con:

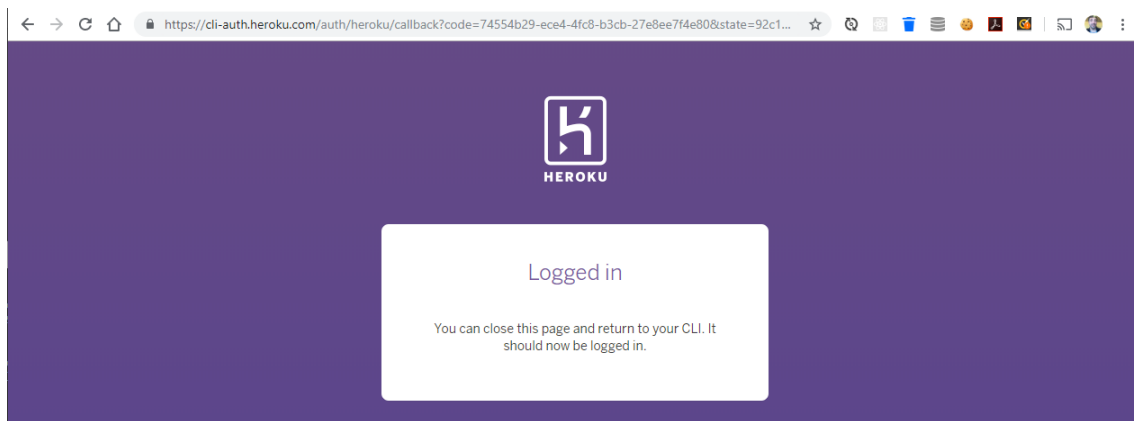
heroku login



Nos abre una página para que inicies sesión.



Nos solicita que cierres la página que se ha abierto anteriormente.



E iniciamos nuestra sesión.

```
Administrador: Símbolo del sistema
C:\>heroku login
heroku: Press any key to open up the browser to login or q to exit:
Opening browser to https://cli-auth.heroku.com/auth/browser/9bc834b5-ae67-42f8-b9a1-565e7bd8e6e8
Logging in... done
Logged in as jruano@jruano.com
```

Nos dirigimos al directorio donde esta nuestra aplicación para crear un repositorio git:

git init

```
Símbolo del sistema
C:\>cd C:\Users\jruano\Documents\workspace-spring-tool-suite-4-4.2.2.RELEASE\mongodb
C:\Users\jruano\Documents\workspace-spring-tool-suite-4-4.2.2.RELEASE\mongodb>git init
Initialized empty Git repository in C:/Users/jruano/Documents/workspace-spring-tool-suite-4-4.2.2.RELEASE/mongodb/.git/
```

Añadimos los ficheros del directorio con:

git add .

```
Símbolo del sistema
C:\Users\jruano\Documents\workspace-spring-tool-suite-4-4.2.2.RELEASE\mongodb>git add .
warning: LF will be replaced by CRLF in .gitignore.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in .mvn\wrapper\MavenWrapperDownloader.java.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in .mvn\wrapper\maven-wrapper.properties.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in mvnw.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in mvnw.cmd.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in pom.xml.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in src/main/java/com/jruano/mongodb/MongodbApplication.java.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in src/main/resources/application.properties.
The file will have its original line endings in your working directory.
warning: LF will be replaced by CRLF in src/test/java/com/jruano/mongodb/MongodbApplicationTests.java.
The file will have its original line endings in your working directory.
```

Comitemos la aplicación:

Git commit -m "initial commit"

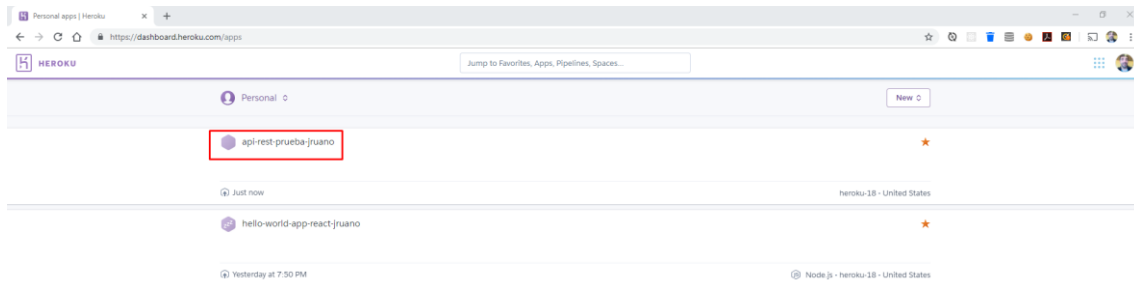
```
Símbolo del sistema
C:\Users\jruan\Documents\workspace-spring-tool-suite-4-4.2.2.RELEASE\mongodb>git commit -m "initial commit"
[master (root-commit) 97716c1] initial commit
13 files changed, 789 insertions(+)
create mode 100644 .gitignore
create mode 100644 .mvn\wrapper\MavenWrapperDownloader.java
create mode 100644 .mvn\wrapper\maven-wrapper.jar
create mode 100644 .mvn\wrapper\maven-wrapper.properties
create mode 100644 mvnw
create mode 100644 mvnw.cmd
create mode 100644 pom.xml
create mode 100644 src\main\java\com\jruano\mongodb\MongodbApplication.java
create mode 100644 src\main\java\com\jruano\mongodb\controllers\JugadoresController.java
create mode 100644 src\main\java\com\jruano\mongodb\models\Jugadores.java
create mode 100644 src\main\java\com\jruano\mongodb\repositories\JugadoresRepository.java
create mode 100644 src\main\resources\application.properties
create mode 100644 src\test\java\com\jruano\mongodb\MongodbApplicationTests.java
```

Creamos la aplicación de heroku, este nombre debe de ser único y como máximo tiene que tener 30 caracteres.

heroku create api-rest-prueba-jruano

```
Símbolo del sistema
C:\Users\jruan\Documents\workspace-spring-tool-suite-4-4.2.2.RELEASE\mongodb>heroku create api-rest-prueba-jruano
Creating api-rest-prueba-jruano... done
https://api-rest-prueba-jruano.herokuapp.com/ | https://git.heroku.com/api-rest-prueba-jruano.git
```

Como podemos ver en nuestro panel de administración de heroku la ha creado.



Desplegamos nuestra aplicación con:

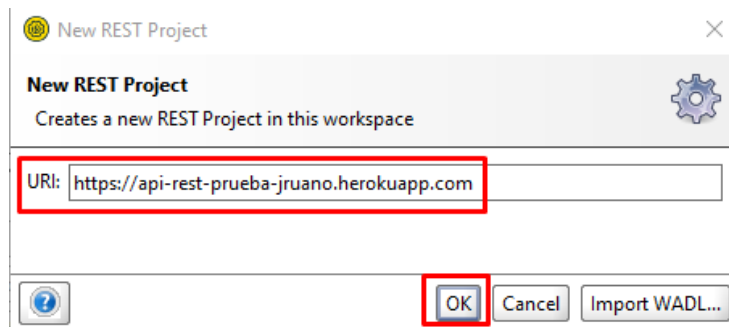
git push heroku master

```
Símbolo del sistema
C:\Users\jruan\Documents\workspace-spring-tool-suite-4-4.2.2.RELEASE\mongodb>git push heroku master
Enumerating objects: 32, done.
Counting objects: 100% (32/32), done.
Delta compression using up to 8 threads.
Compressing objects: 100% (23/23), done.
Writing objects: 100% (32/32), 51.05 KiB | 4.25 MiB/s, done.
Total 32 (delta 0), reused 0 (delta 0)
remote: Compressing source files... done.
remote: Building source:
remote:
remote: ----> Java app detected
remote: ----> Installing JDK 1.8... done
remote: ----> Executing: ./mvnw -DskipTests clean dependency:list install
remote: [INFO] Scanning for projects...
remote: [INFO] Downloading from central: https://repo.maven.apache.org/maven2/org/springframework/boot/spring-boo
t-starter-parent/2.1.5.RELEASE/spring-boot-starter-parent-2.1.5.RELEASE.pom
```

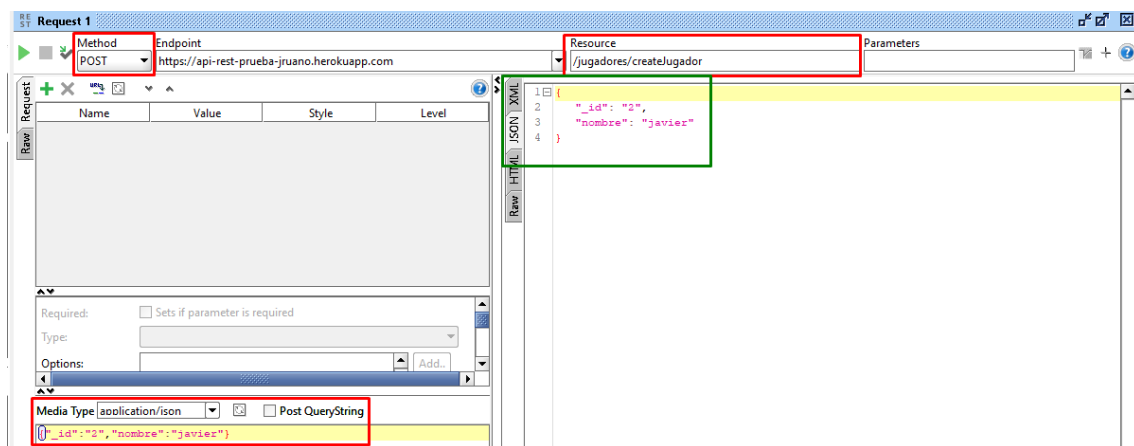
Nos dice que ha ido bien.

```
Símbolo del sistema
-utils/0.4/maven-shared-0.4.jar (155 kB at 6.0 MB/s)
remote: [INFO] Installing /tmp/build_eb403f71a78a197ae99458a78cd129f5/target/mongodb-0.0.1-SNAPSHOT.jar to /app/t
mp/cache/.m2/repository/com/jruano/mongodb/0.0.1-SNAPSHOT/mongodb-0.0.1-SNAPSHOT.jar
remote: [INFO] Installing /tmp/build_eb403f71a78a197ae99458a78cd129f5/pom.xml to /app/tmp/cache/.m2/repository/co
m/jruano/mongodb/0.0.1-SNAPSHOT/mongodb-0.0.1-SNAPSHOT.pom
remote: [INFO] -----
remote: [INFO] BUILD SUCCESS
remote: [INFO] -----
remote: [INFO] Total time: 15.899 s
remote: [INFO] Finished at: 2019-06-10T13:53:28Z
remote: [INFO] -----
remote: -----> Discovering process types
remote: Procfile declares types -> (none)
remote: Default types for buildpack -> web
remote: -----
remote: -----> Compressing...
remote: Done: 69.1M
remote: -----> Launching...
remote: Released v3
remote: https://api-rest-prueba-jruano.herokuapp.com/ deployed to Heroku
remote:
remote: Verifying deploy... done.
To https://git.heroku.com/api-rest-prueba-jruano.git
* [new branch] master -> master
```

Abrimos Soap UI, y creamos una nueva conexión REST.



Realizamos una inserción en bd a través de POST sobre nuestra api REST, y como vemos en el recuadro verde se ha insertado correctamente.



Lanzamos una petición GET en la web para ver que funciona correctamente.

<https://api-rest-prueba-jruano.herokuapp.com/jugadores/getJugadores>

