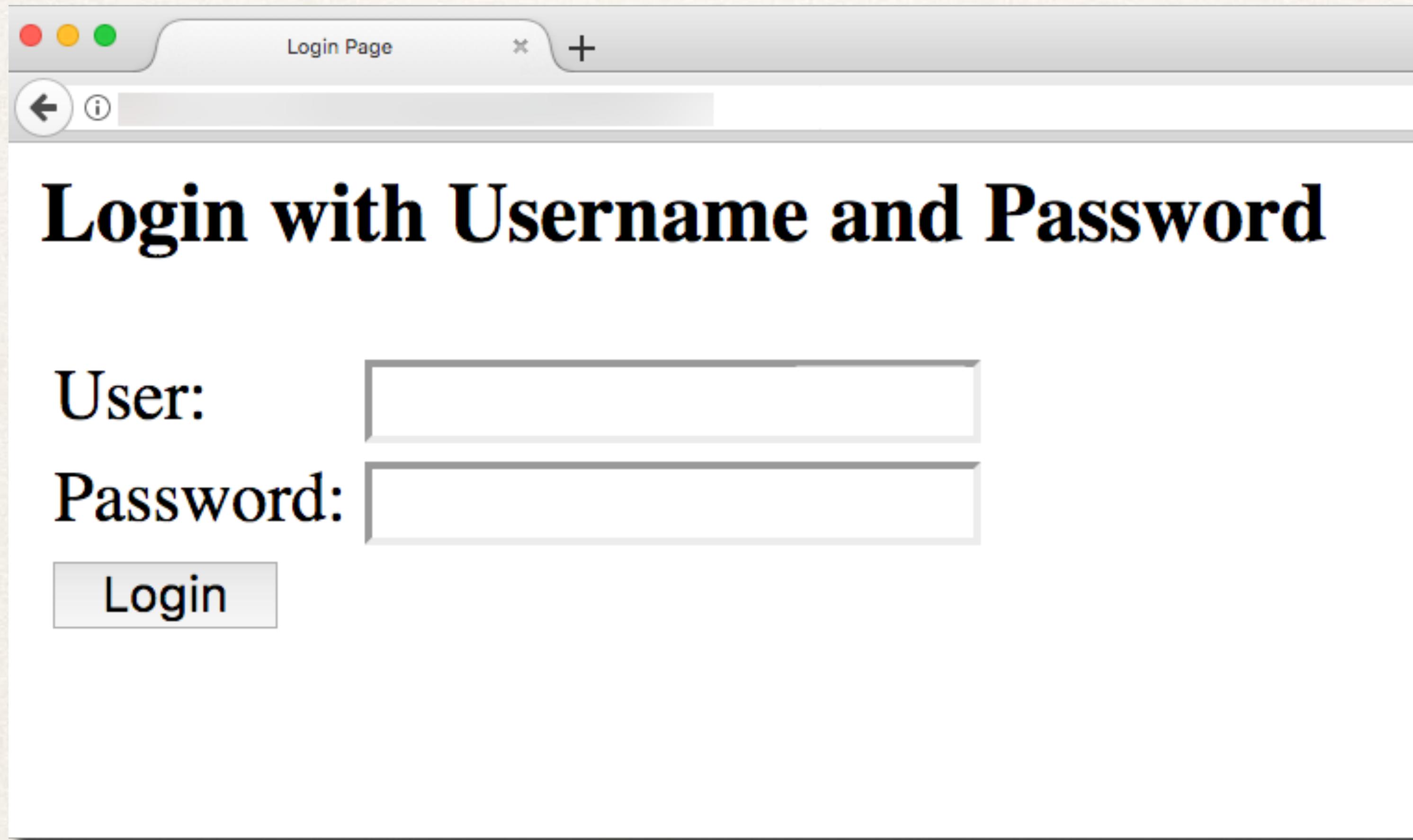


# Spring Security - Custom Login Form

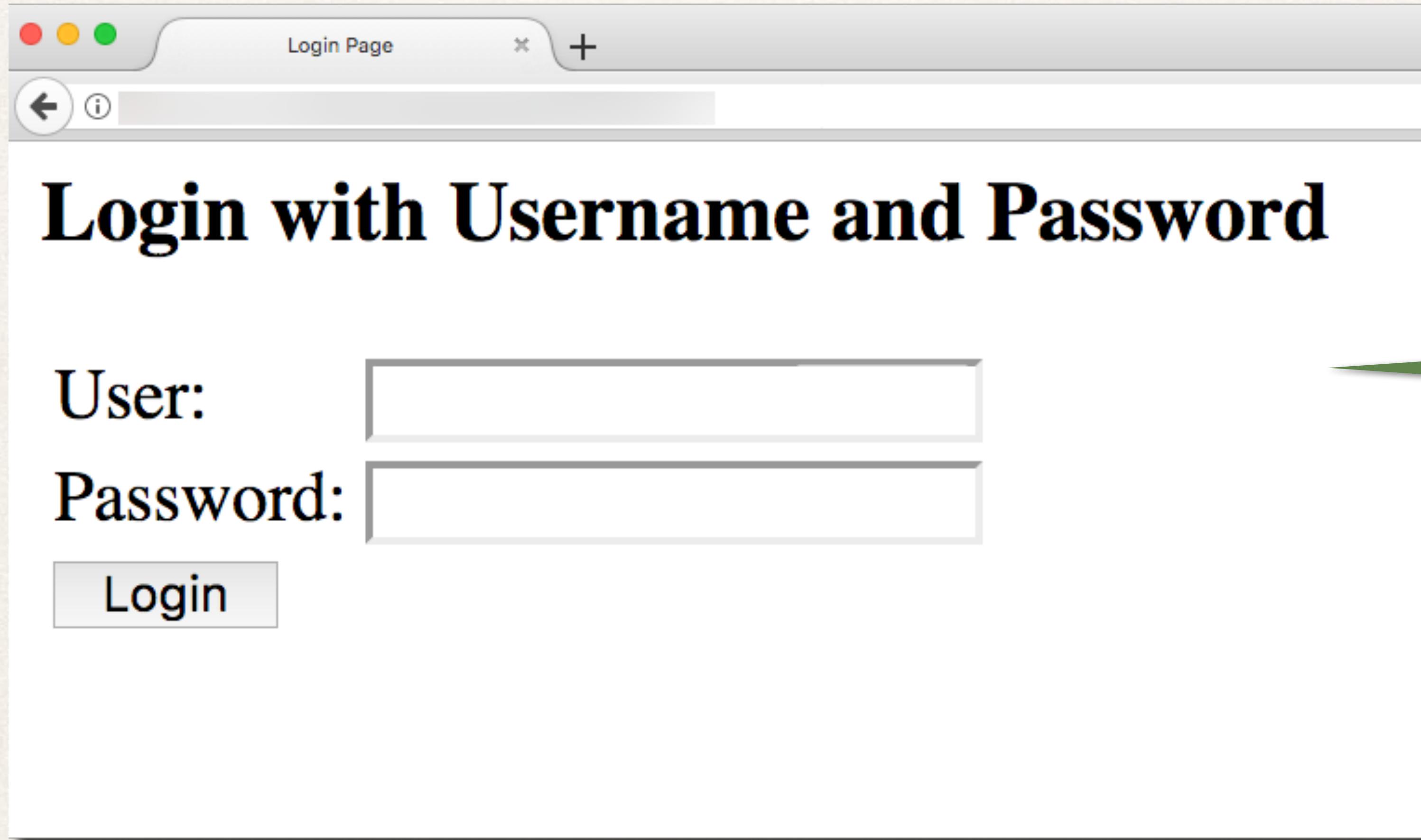


# Spring Security - Default Login Form

# Spring Security - Default Login Form



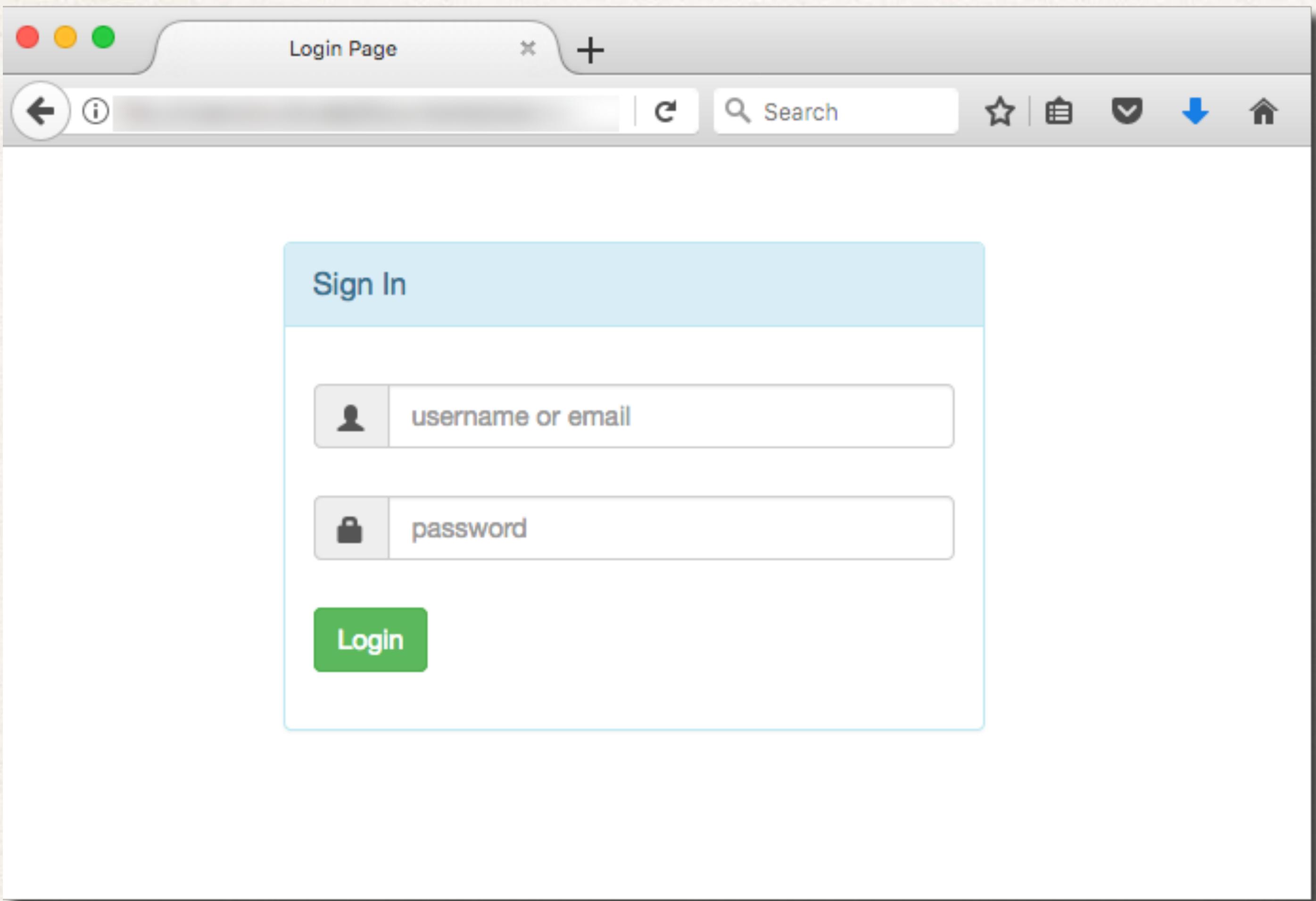
# Spring Security - Default Login Form



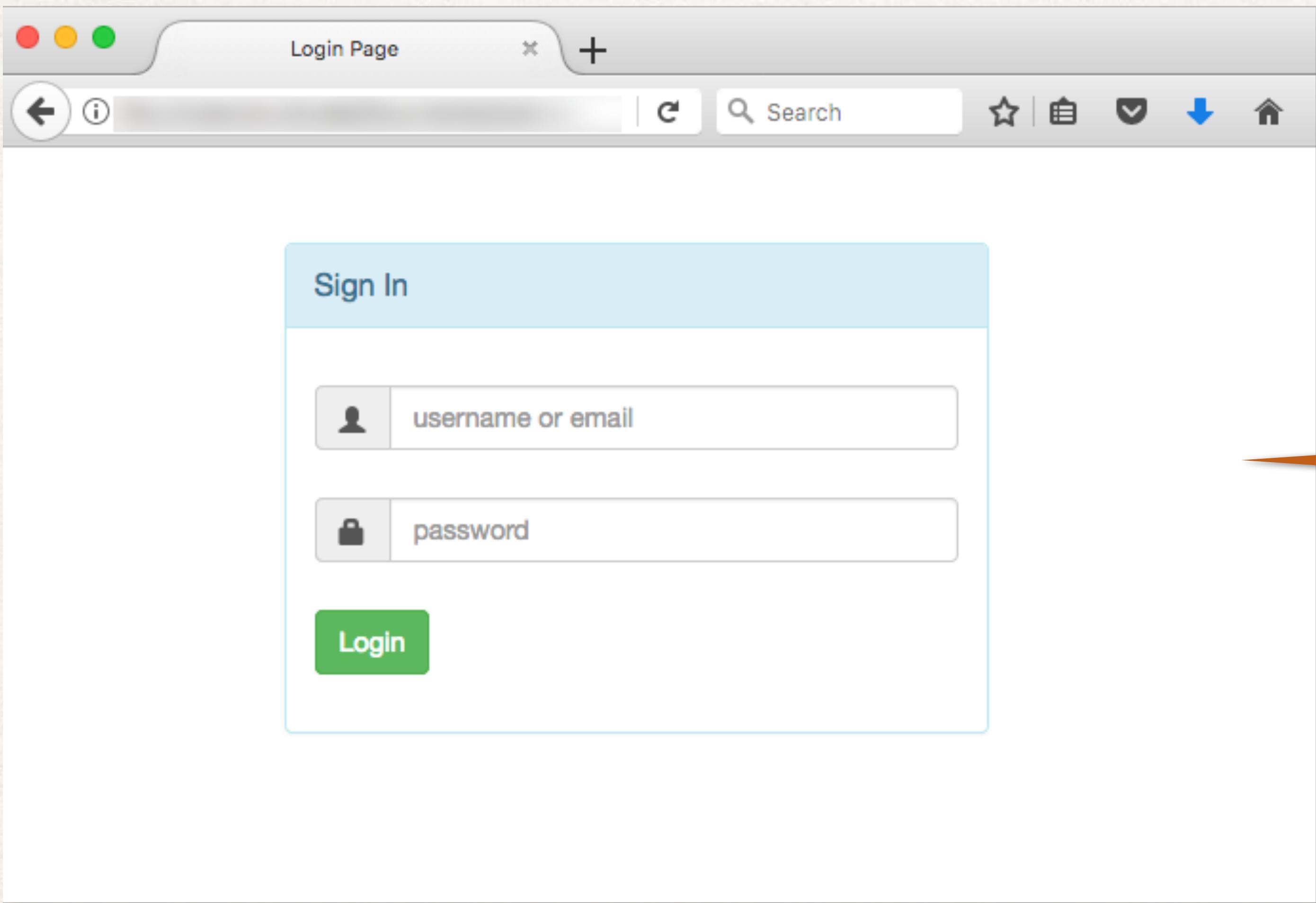
Good for quick start

# Your Own Custom Login Form

# Your Own Custom Login Form



# Your Own Custom Login Form



**Your own custom  
look-and-feel  
HTML + CSS**

# Spring Security Overview

# Spring Security Overview

Web  
Browser

# Spring Security Overview

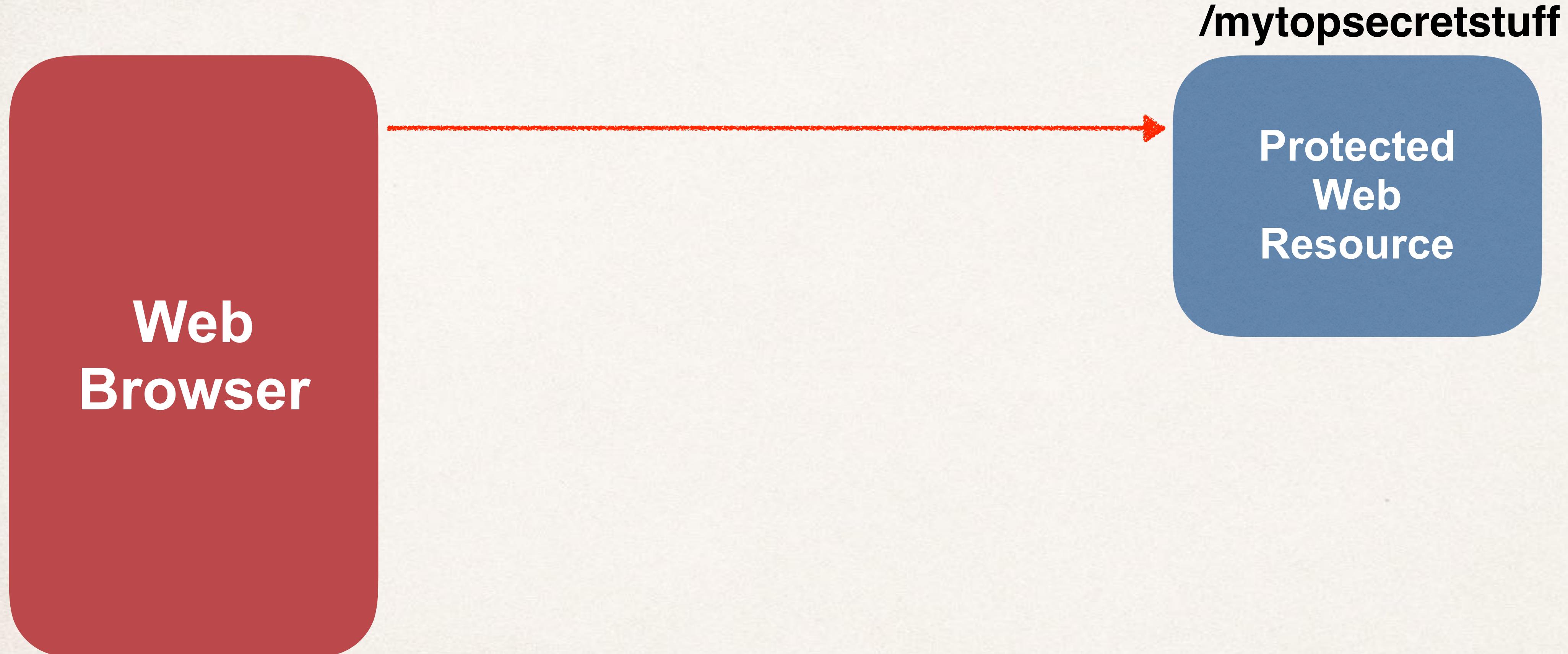


Web  
Browser

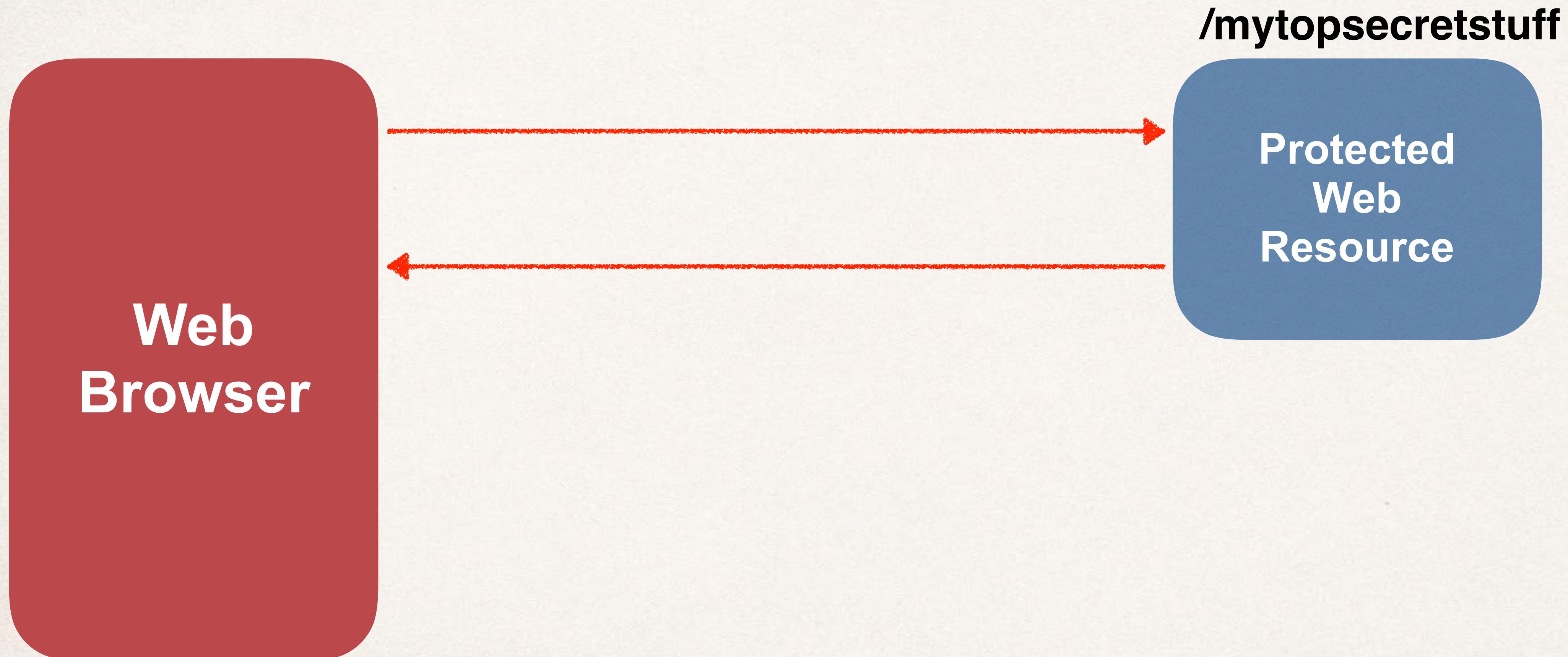
**/mytopsecretstuff**

Protected  
Web  
Resource

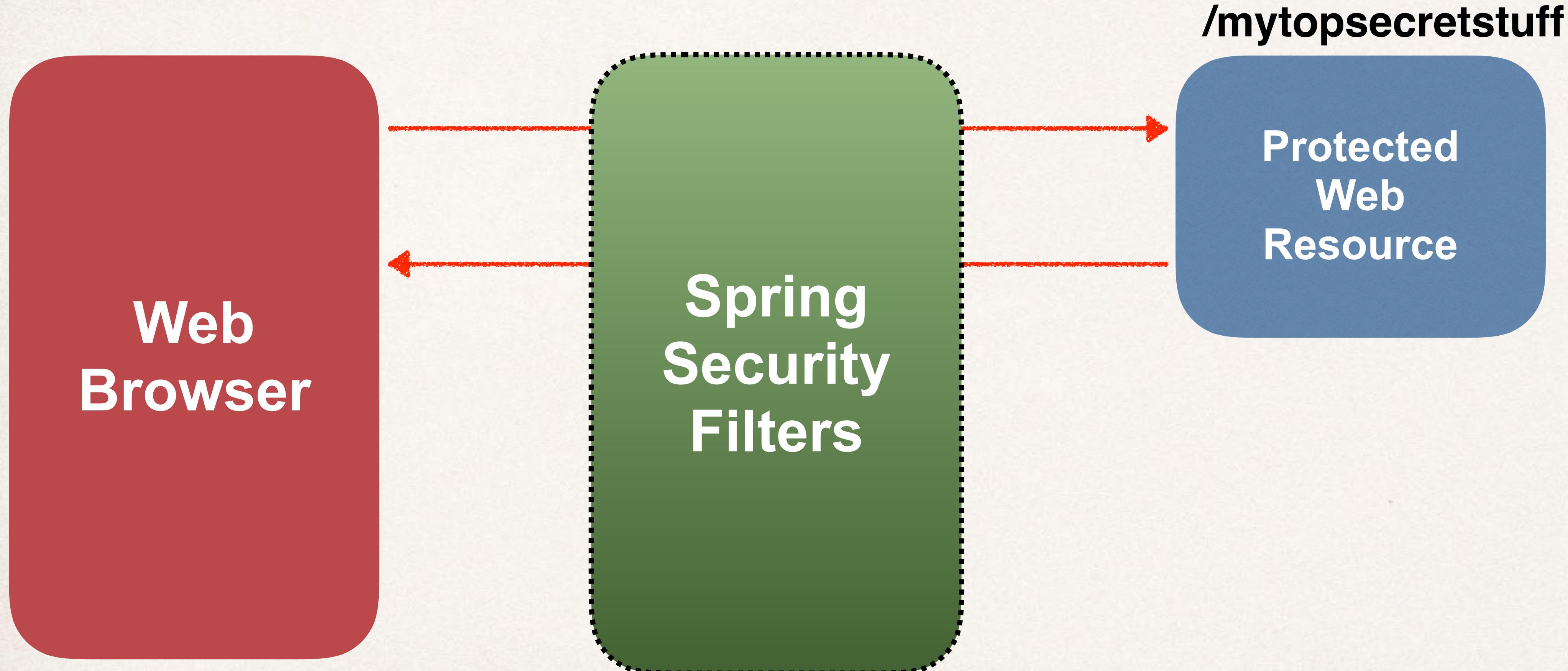
# Spring Security Overview



# Spring Security Overview



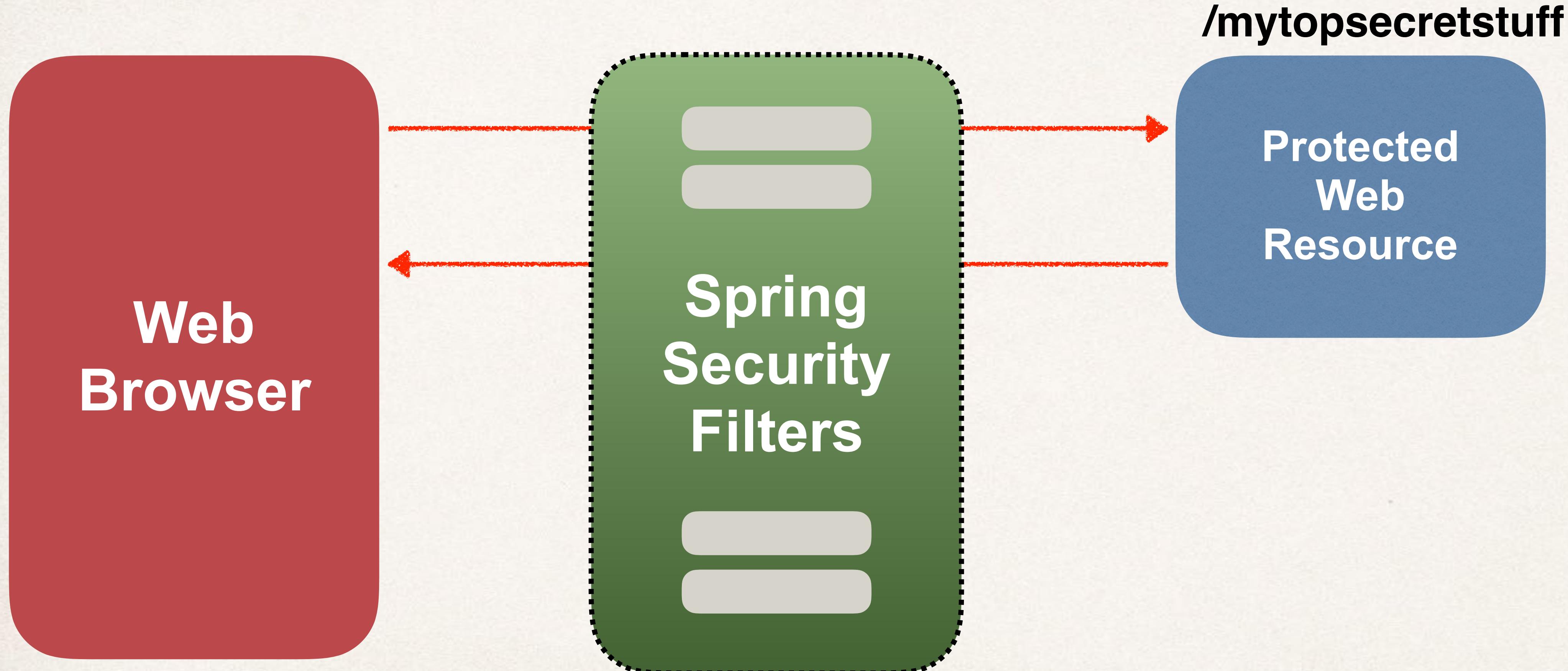
# Spring Security Overview



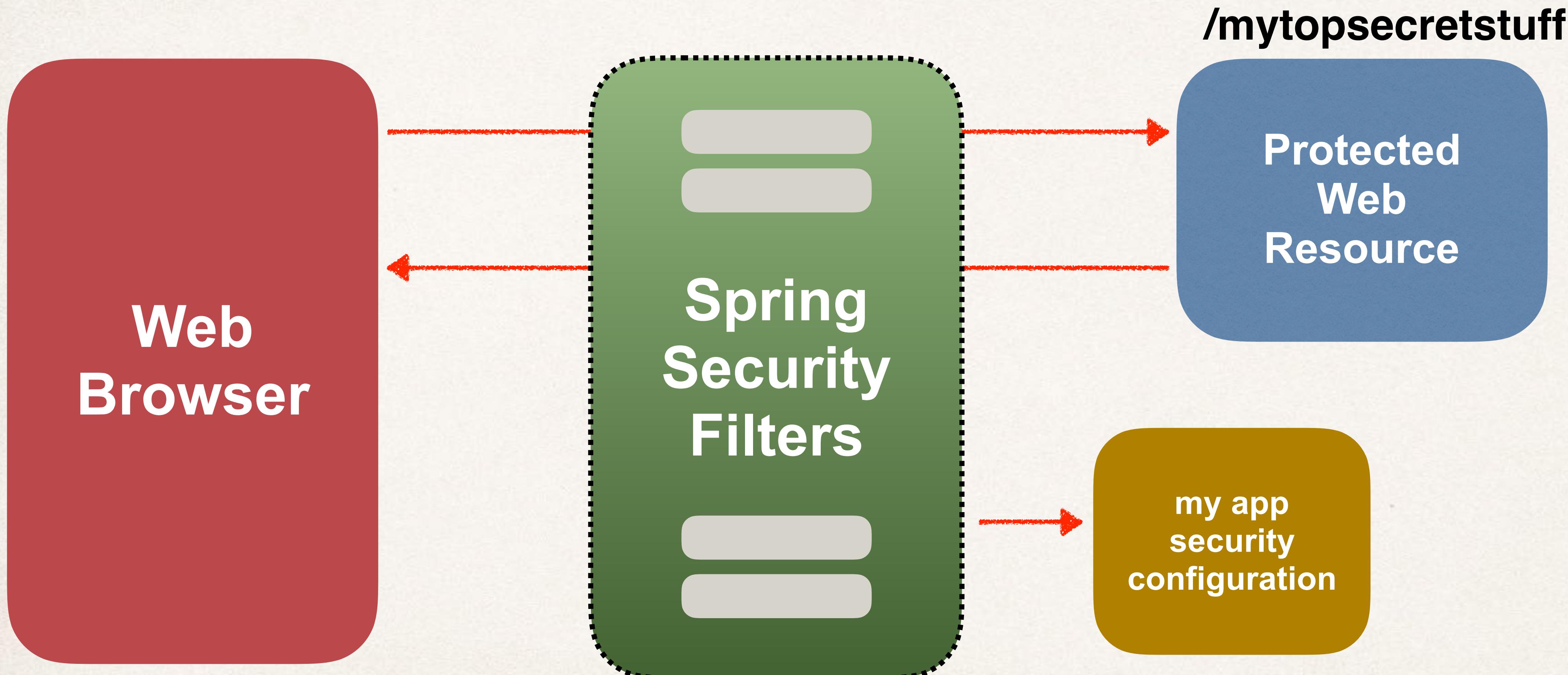
# Spring Security Overview



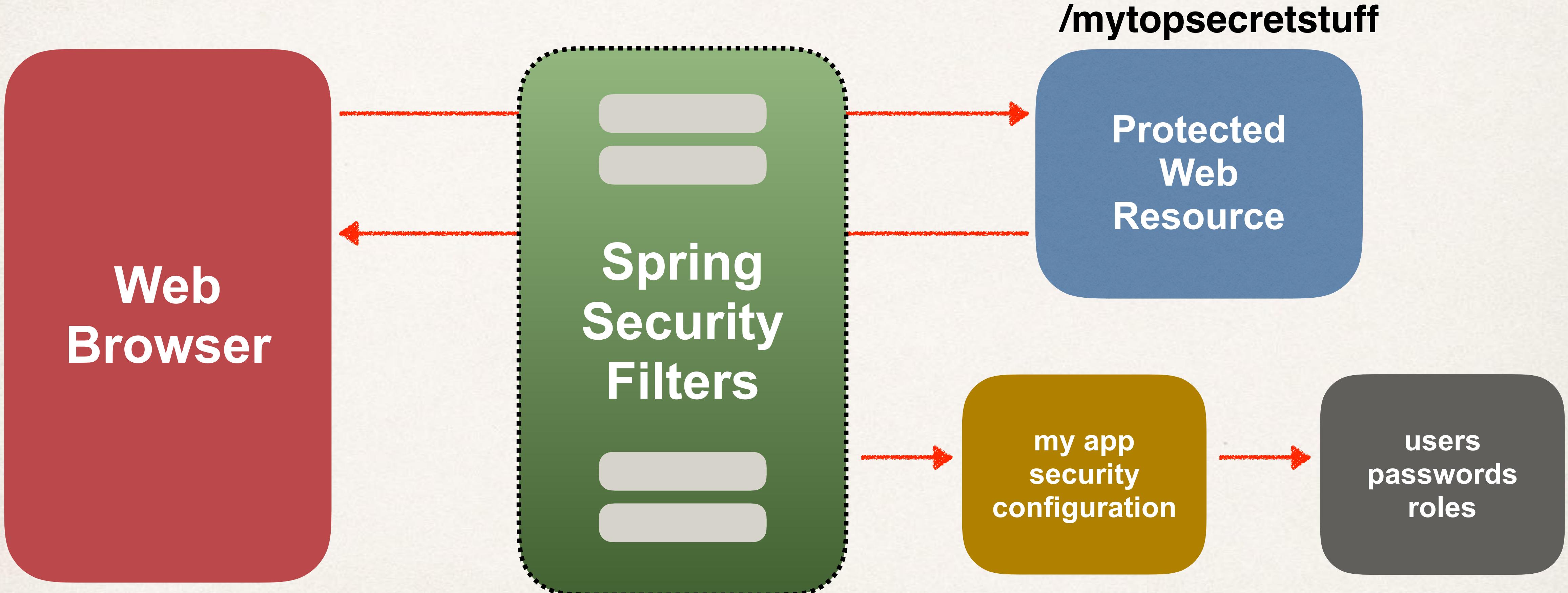
# Spring Security Overview



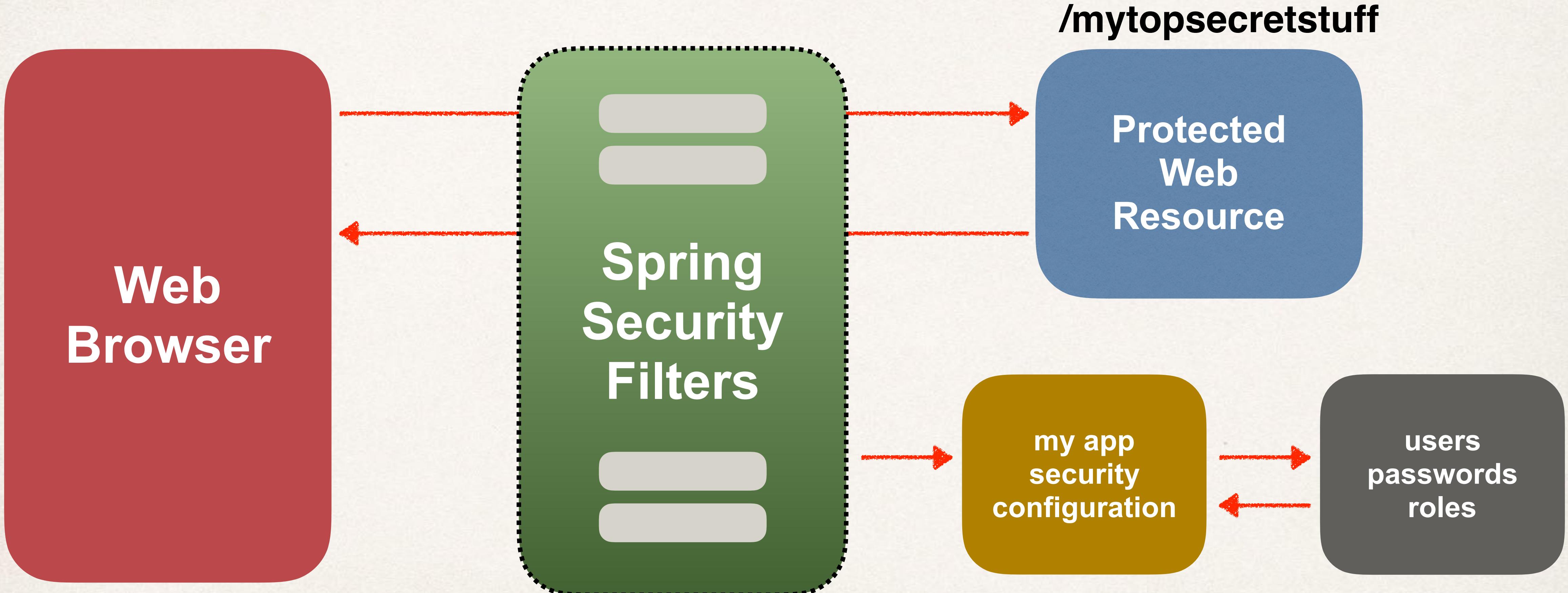
# Spring Security Overview



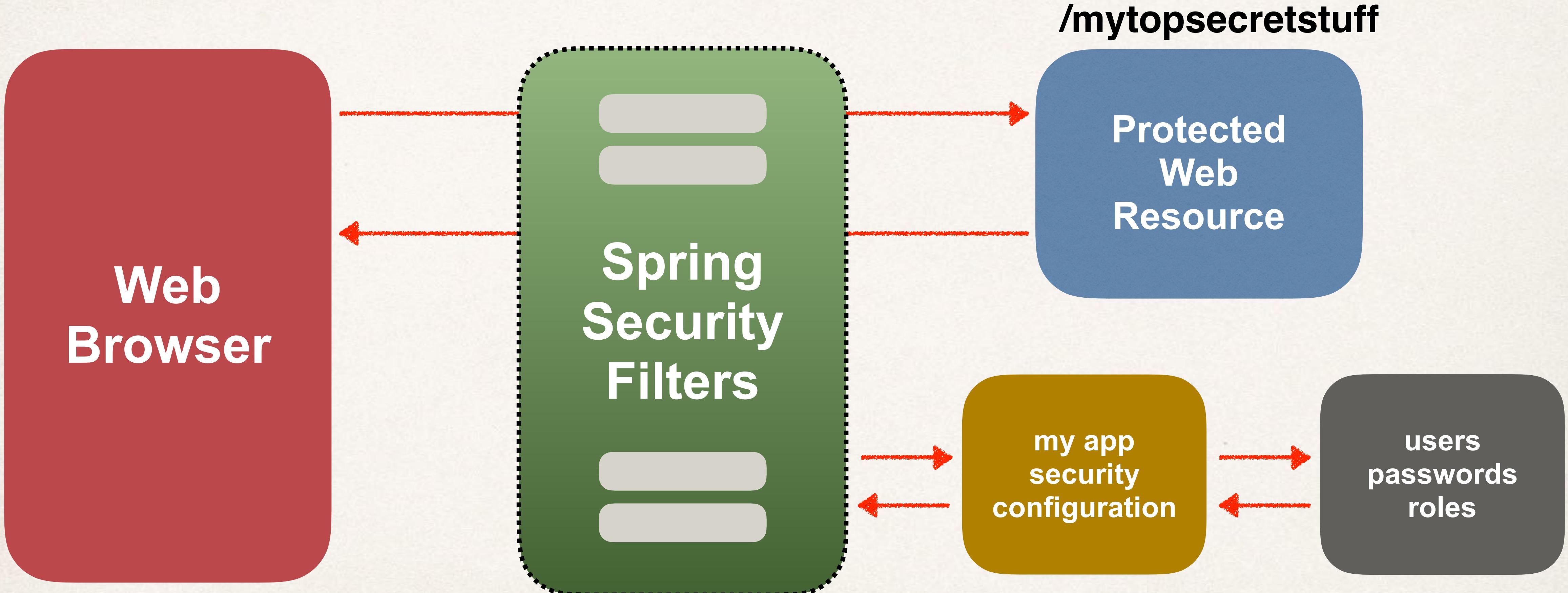
# Spring Security Overview



# Spring Security Overview



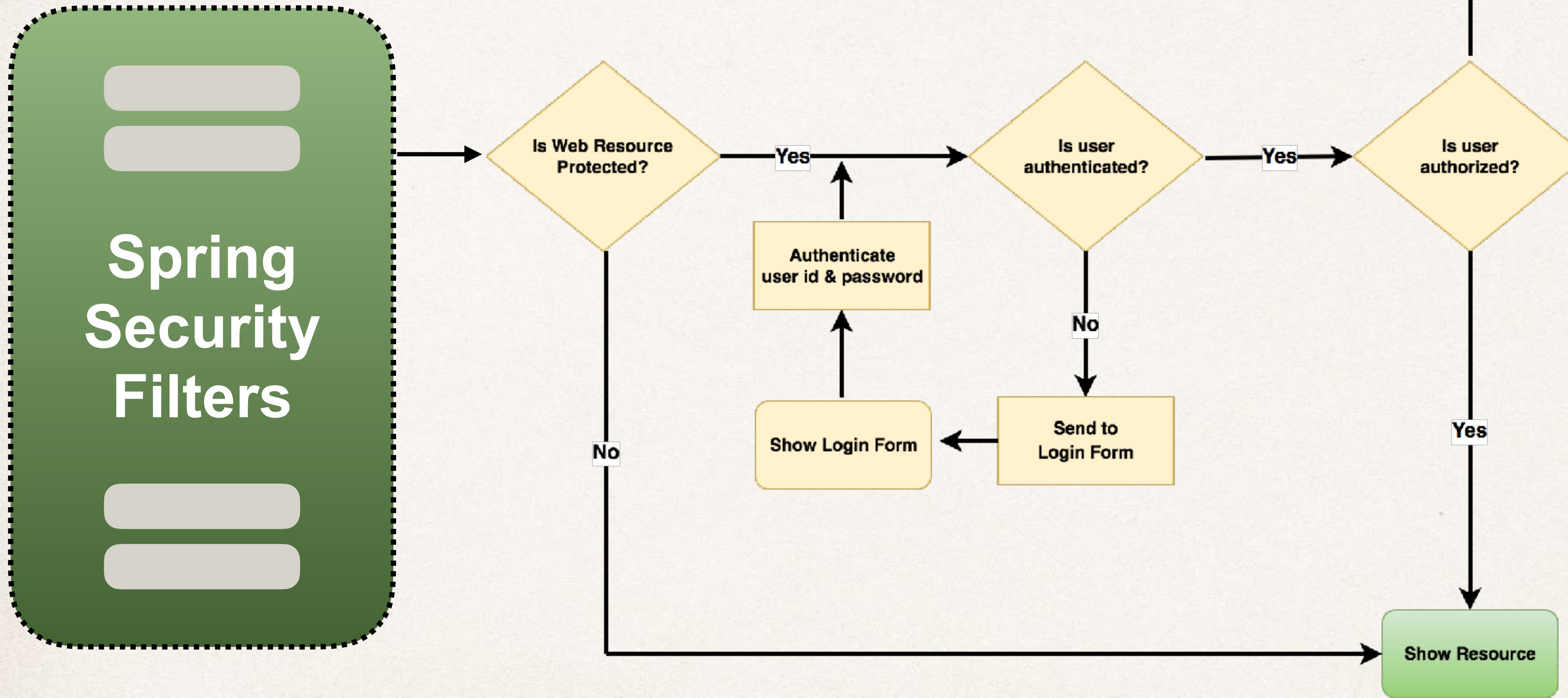
# Spring Security Overview



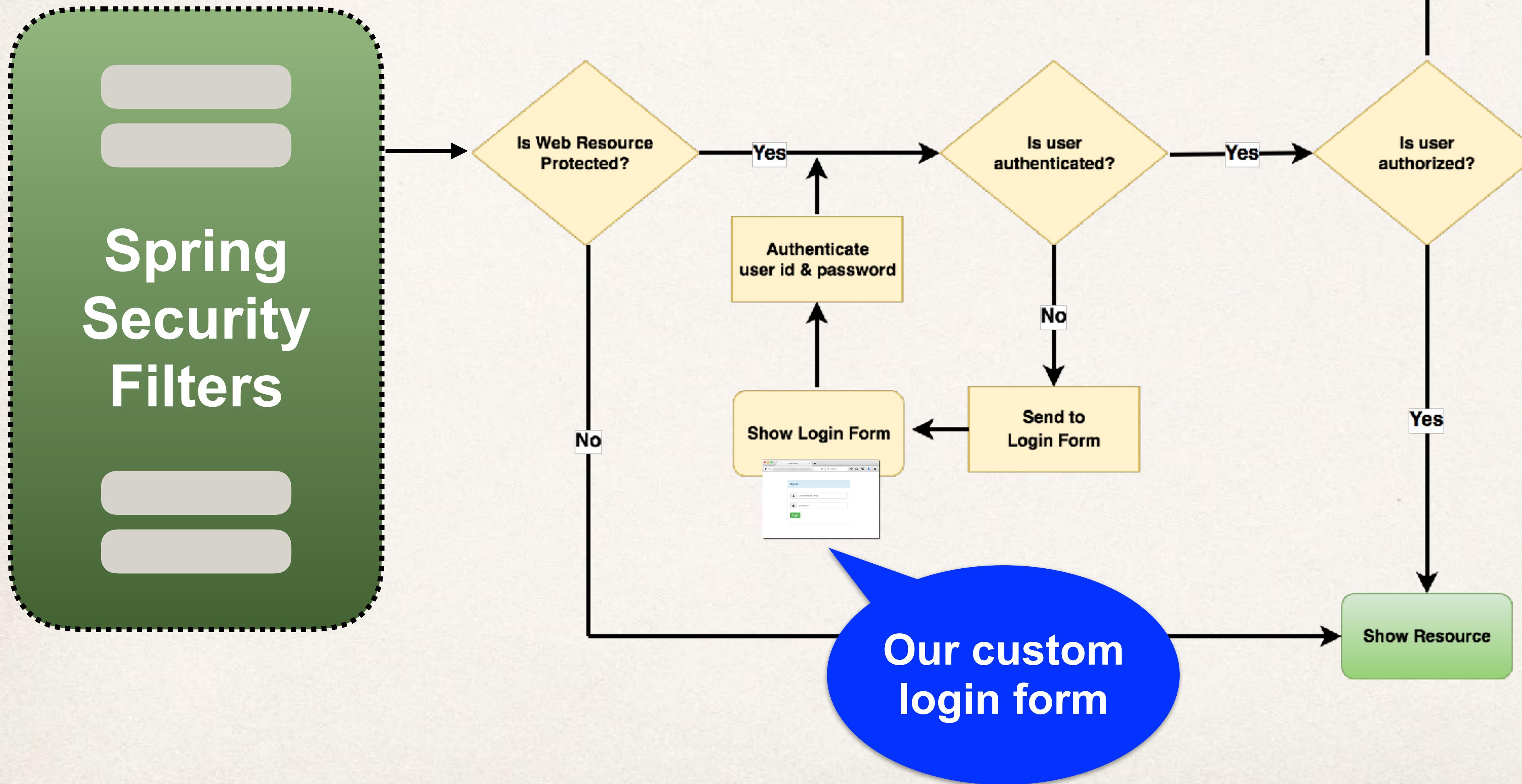
# Spring Security in Action



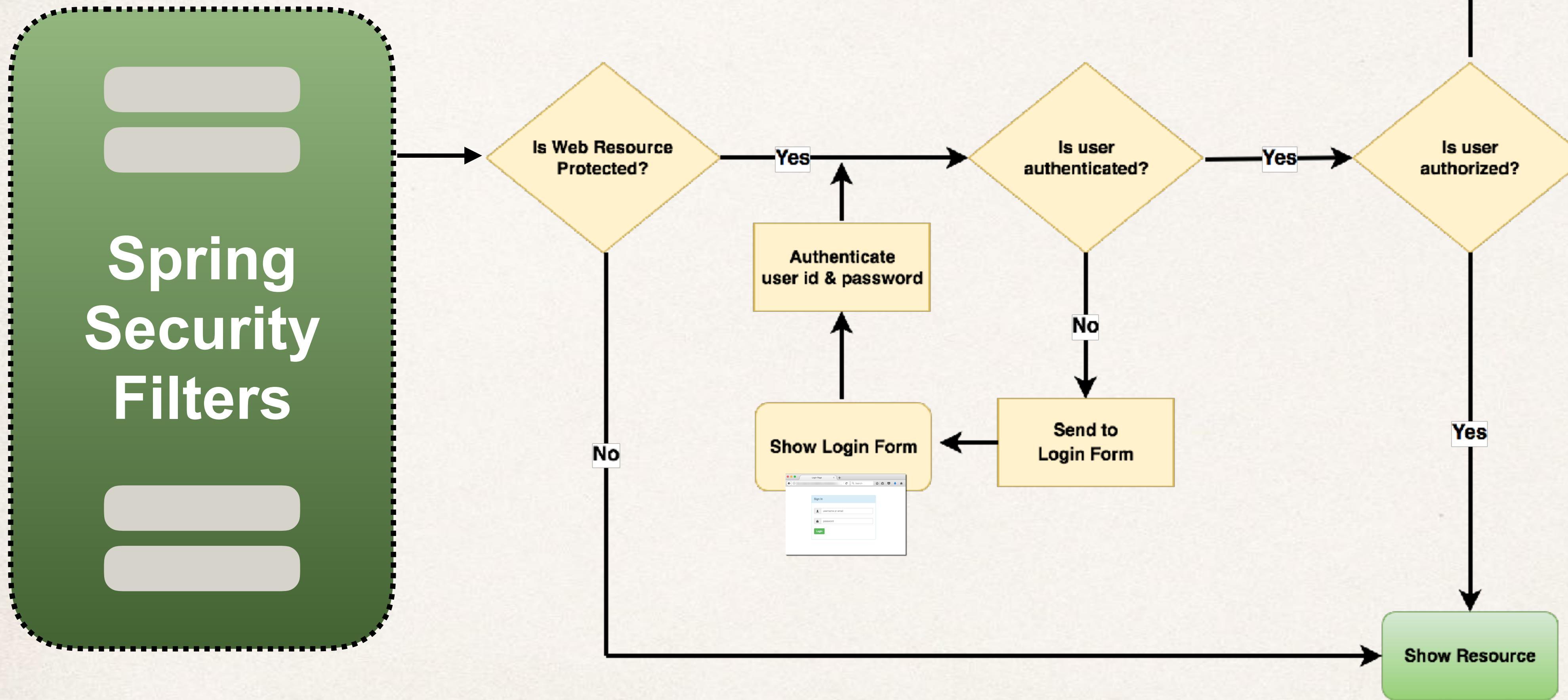
# Spring Security in Action



# Spring Security in Action



# Spring Security in Action



# Development Process

*Step-By-Step*

# Development Process

*Step-By-Step*

1. Modify Spring Security Configuration to reference custom login form

# Development Process

Step-By-Step

1. Modify Spring Security Configuration to reference custom login form
2. Develop a Controller to show the custom login form

# Development Process

Step-By-Step

1. Modify Spring Security Configuration to reference custom login form
2. Develop a Controller to show the custom login form
3. Create custom login form

# Development Process

Step-By-Step

1. Modify Spring Security Configuration to reference custom login form
2. Develop a Controller to show the custom login form
3. Create custom login form
  - ✿ HTML (CSS optional)

# Development Process

Step-By-Step

1. Modify Spring Security Configuration to reference custom login form
2. Develop a Controller to show the custom login form
3. Create custom login form
  - ✿ HTML (CSS optional)
  - ✿ Spring MVC form tag <form:form>

# Step 1: Modify Spring Security Configuration

# Step 1: Modify Spring Security Configuration

File: DemoSecurityConfig.java

```
@Configuration  
@EnableWebSecurity  
public class DemoSecurityConfig extends WebSecurityConfigurerAdapter {  
  
    // override method to configure users for in-memory authentication ...  
  
}
```

# Step 1: Modify Spring Security Configuration

File: DemoSecurityConfig.java

```
@Configuration  
@EnableWebSecurity  
public class DemoSecurityConfig extends WebSecurityConfigurerAdapter {  
  
    // override method to configure users for in-memory authentication ...  
  
}
```

Method

Description

# Step 1: Modify Spring Security Configuration

File: DemoSecurityConfig.java

```
@Configuration  
@EnableWebSecurity  
public class DemoSecurityConfig extends WebSecurityConfigurerAdapter {  
  
    // override method to configure users for in-memory authentication ...  
  
}
```

Method	Description
<code>configure(AuthenticationManagerBuilder)</code>	Configure users (in memory, database, ldap, etc)

# Step 1: Modify Spring Security Configuration

File: DemoSecurityConfig.java

```
@Configuration  
@EnableWebSecurity  
public class DemoSecurityConfig extends WebSecurityConfigurerAdapter {  
  
    // override method to configure users for in-memory authentication ...  
  
}
```

Method	Description
<b>configure (AuthenticationManagerBuilder)</b>	Configure users (in memory, database, ldap, etc)
<b>configure (HttpSecurity)</b>	Configure security of web paths in application, login, logout etc

# Step 1: Modify Spring Security Configuration

File: DemoSecurityConfig.java

```
@Configuration  
@EnableWebSecurity  
public class DemoSecurityConfig extends WebSecurityConfigurerAdapter {  
  
    @Override  
    protected void configure(AuthenticationManagerBuilder auth) throws Exception {  
  
        // add our users for in memory authentication  
        ...  
    }  
  
}
```

# Step 1: Modify Spring Security Configuration

File: DemoSecurityConfig.java

```
@Configuration
@EnableWebSecurity
public class DemoSecurityConfig extends WebSecurityConfigurerAdapter {

    @Override
    protected void configure(AuthenticationManagerBuilder auth) throws Exception {
        // add our users for in memory authentication
        ...
    }

    @Override
    protected void configure(HttpSecurity http) throws Exception {
        http.authorizeRequests()
            .anyRequest().authenticated()
            .and()
            .formLogin()
            .loginPage("/showMyLoginPage")
            .loginProcessingUrl("/authenticateTheUser")
            .permitAll();
    }
}
```

# Step 1: Modify Spring Security Configuration

File: DemoSecurityConfig.java

```
@Configuration  
@EnableWebSecurity  
public class DemoSecurityConfig extends WebSecurityConfigurerAdapter {  
  
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    protected void configure(AuthenticationManagerBuilder auth) throws Exception {  
  
        // add our users for in memory authentication  
        ...  
    }  
  
    @Override  
    protected void configure(HttpSecurity http) throws Exception {  
  
        http.authorizeRequests()  
            .anyRequest().authenticated()  
            .and()  
            .formLogin()  
                .loginPage("/showMyLoginPage")  
                .loginProcessingUrl("/authenticateTheUser")  
                .permitAll();  
  
    }  
}
```

Configure security of web paths  
in application, login, logout etc

# Step 1: Modify Spring Security Configuration

```
@Override  
protected void configure(HttpSecurity http) throws Exception {  
  
    http.authorizeRequests()  
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}
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            .loginPage("/showMyLoginPage")  
            .loginProcessingUrl("/authenticateTheUser")  
        .permitAll();  
  
}
```

Restrict access based on  
the HttpServletRequest

# Step 1: Modify Spring Security Configuration

```
@Override  
protected void configure(HttpSecurity http) throws Exception {  
  
    http.authorizeRequests()  
        .anyRequest().authenticated()  
        .and()  
        .formLogin()  
            .loginPage("/showMyLoginPage")  
            .loginProcessingUrl("/authenticateTheUser")  
        .permitAll();  
  
}
```

Any request to the app  
must be authenticated  
(ie logged in)

# Step 1: Modify Spring Security Configuration

```
@Override  
protected void configure(HttpSecurity http) throws Exception {  
  
    http.authorizeRequests()  
        .anyRequest().authenticate()  
        .and()  
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            .loginPage("/showMyLoginPage")  
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            .permitAll();  
  
}
```

We are customizing the form login process

# Step 1: Modify Spring Security Configuration

```
@Override  
protected void configure(HttpSecurity http) throws Exception {  
    http.authorizeRequests()  
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        .and()  
        .formLogin()  
        .loginPage("/showMyLoginPage")  
        .loginProcessingUrl("/authenticateTheUser")  
        .permitAll();  
}
```

Show our custom form at the  
request mapping  
“/showMyLoginPage”

# Step 1: Modify Spring Security Configuration

```
@Override  
protected void configure(HttpSecurity http) {  
    http.authorizeRequests()  
        .anyRequest().authenticated()  
        .and()  
        .formLogin()  
        .loginPage("/showMyLoginPage")  
        .loginProcessingUrl("/authenticateTheUser")  
        .permitAll();  
}
```

Login form should POST data to  
this URL for processing  
(check user id and password)

# Step 1: Modify Spring Security Configuration

```
@Override  
protected void configure(HttpSecurity http) {  
  
    http.authorizeRequests()  
        .anyRequest().authenticated()  
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        .formLogin()  
            .loginPage("/showMyLoginPage")  
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        .permitAll();  
  
}
```

You can give ANY values  
for this configuration.

Just stay consistent in your app

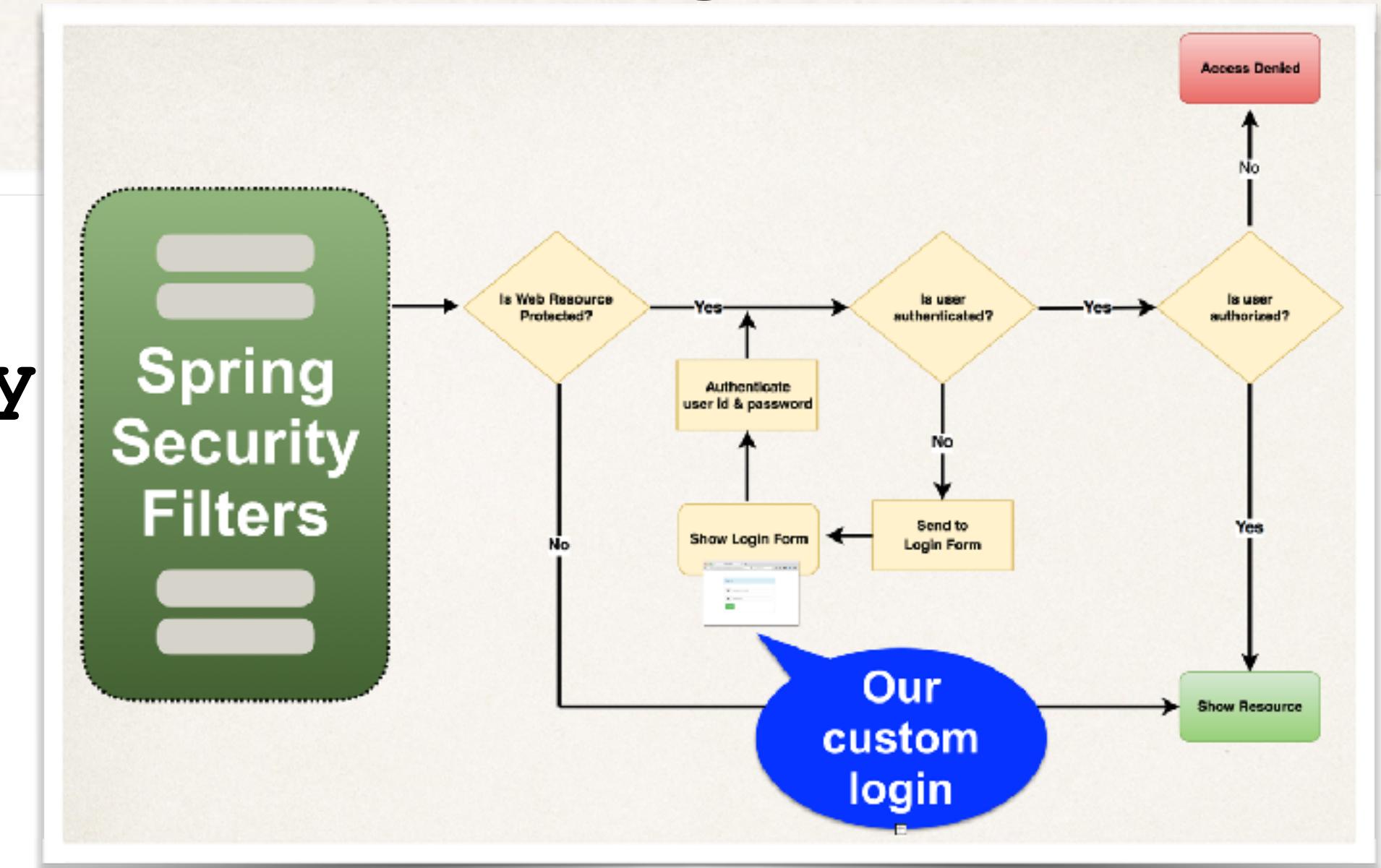
# Step 1: Modify Spring Security Configuration

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@Override  
protected void configure(HttpSecurity http) throws Exception {  
  
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        .anyRequest().authenticated()  
        .and()  
        .formLogin()  
            .loginPage("/showMyLoginPage")  
            .loginProcessingUrl("/authenticateTheUser")  
        .permitAll();  
  
}
```

Allow everyone to see login page.  
No need to be logged in.

# Step 1: Modify Spring Security Configuration

```
@Override  
protected void configure (HttpSecurity http)  
  
    http.authorizeRequests()  
        .anyRequest().authenticated()  
        .and()  
        .formLogin()  
            .loginPage ("/showMyLoginPage")  
            .loginProcessingUrl ("/authenticateTheUser")  
        .permitAll () ;  
  
}
```



# Step 1: Modify Spring Security Configuration

```
@Override  
protected void configure(HttpSecurity http) {  
  
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```

**TO DO**  
*We need to create a controller  
for this request mapping*

*"/showMyLoginPage"*

# Step 1: Modify Spring Security Configuration

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protected void configure(HttpSecurity http) {  
  
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        .permitAll();  
  
}
```

**TO DO**  
*We need to create a controller  
for this request mapping*

*"/showMyLoginPage"*

No Controller Request Mapping  
required for this.  
We get this for free :-)

# Step 2: Develop a Controller to show the custom login form

File: LoginController.java

```
@Controller  
public class LoginController {  
  
}
```

# Step 2: Develop a Controller to show the custom login form

File: LoginController.java

```
@Controller  
public class LoginController {  
  
    @GetMapping("/showMyLoginPage")  
    public String showMyLoginPage() {  
  
        return "plain-login";  
  
    }  
}
```

# Step 2: Develop a Controller to show the custom login form

File: LoginController.java

```
@Controller  
public class LoginController {  
  
    @GetMapping("/showMyLoginPage")  
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```

View name

**/WEB-INF/view/plain-login.jsp**

# Step 2: Develop a Controller to show the custom login form

File: LoginController.java

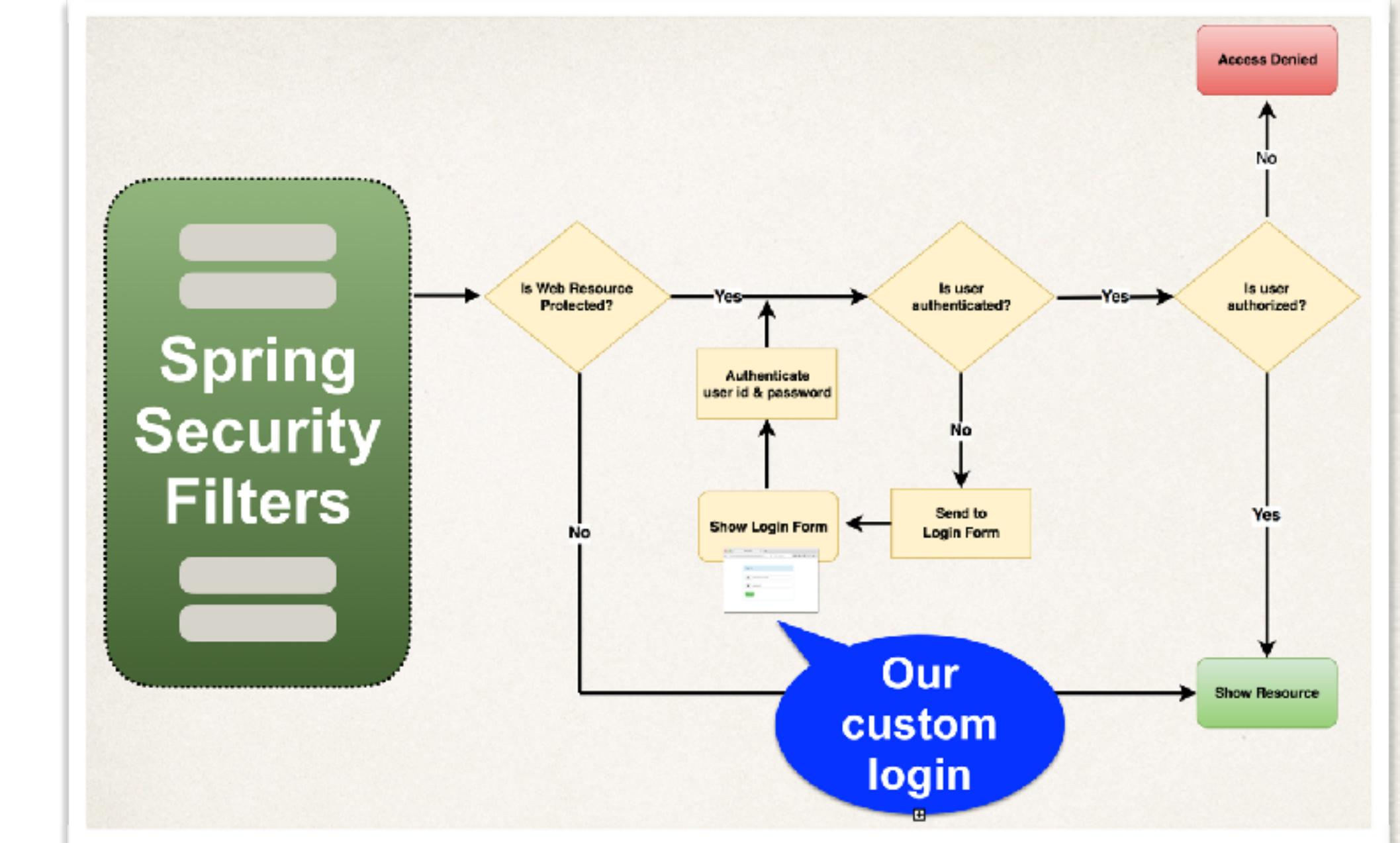
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**/WEB-INF/view/plain-login.jsp**

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**/WEB-INF/view/plain-login.jsp**

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```

**/WEB-INF/view/plain-login.jsp**

*TO DO*  
*We need to create this file*