**Soundplanes**



Arquitectura e Integración de Sistemas Software

Grado de Ingeniería del Software

Curso 2º

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Group number: 1

Application link: <http://soundplanes.appspot.com/>

Project link in projETSII, GitHub or similar: <https://github.com/GuilleX7/Soundplanes>

VERSION HISTORY

|  |  |  |  |
| --- | --- | --- | --- |
| DAte | Version | Details | Participants |
| 14/03/2014 | 1.0 | - Includes introduction, prototypes of the user interfaces and UML diagrams of components and deployment | George Laurentiu Bogdan  Guillermo Diz Gil  Carmen Mª Muñoz Pérez  Francisco Rodríguez Pérez |
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# Introduction

Today, people are increasingly interested in learning more about other cultures. Thanks to technologies that are continuously growing, it is becoming easier to establish this communication. On the other hand, music is a key element in our society and unites people from all over the world. Even so, with the exception of very international artists; we are not aware of the musical culture of countries other than our own. Since music is such an important cultural element in each country and in people, we intend to carry out a project that consists of offering an innovative and educational service in the form of an international online radio.

Thus, Soundplanes wants to offer an interactive online radio service with the possibility of chatting with people from anywhere in the world. It will give its users the opportunity to listen to the most listened songs from each country, as well as to offer their own playlist. In this way, users will have the opportunity to learn new songs, as well as meet many people from around the world.

## Integrated applications

We will be using the following applications:

* **Youtube:** Youtube web player will be our music player. We will also use its REST API for fetching some metadata.
* **Spotify:** we will be using Spotify as a music search site. The user will be able to search for any existing song in Spotify and play it.
* **Genius**: will be used to fetch song’s lyrics.
* **Leaflet:** will be used for displaying interactive maps in the web browser. Used in combination with *OpenStreetMap*
* **OpenStreetMap:** will provide us map tiles through its public tile servers.
* **Facebook:** we will allow the user to log in with his Facebook social account and post what music are they listening to at any time.

|  |  |
| --- | --- |
| Application name | URL API documentation |
| Youtube | <https://developers.google.com/youtube/iframe_api_reference?hl=es>  <https://developers.google.com/youtube/v3/docs> |
| Spotify | <https://developer.spotify.com/documentation/web-api/> |
| Genius | <https://docs.genius.com/> |
| Leaflet | <https://leafletjs.com/reference-1.6.0.html> |
| OpenStreetMap API | <https://wiki.openstreetmap.org/wiki/Tile_servers> |
| Facebook | <https://developers.facebook.com/docs/javascript> |

## Project development

We are thinking about all the different applications that we could integrate in our final application. Some of these may not work as expected and be removed, or we could change our visions about what do we want our application to be.

# User Interface Prototypes

Our application will work as a single-page application. This means we will display all our views dynamically, without the loading of additional pages. We expect this to improve the user experience.

## Landpage view

Description

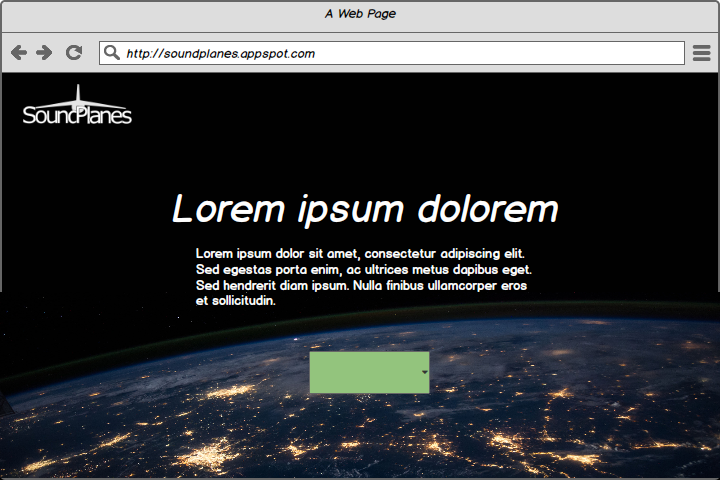


Figure 1. Landpage view’s user interface prototype

## Setup view

Description

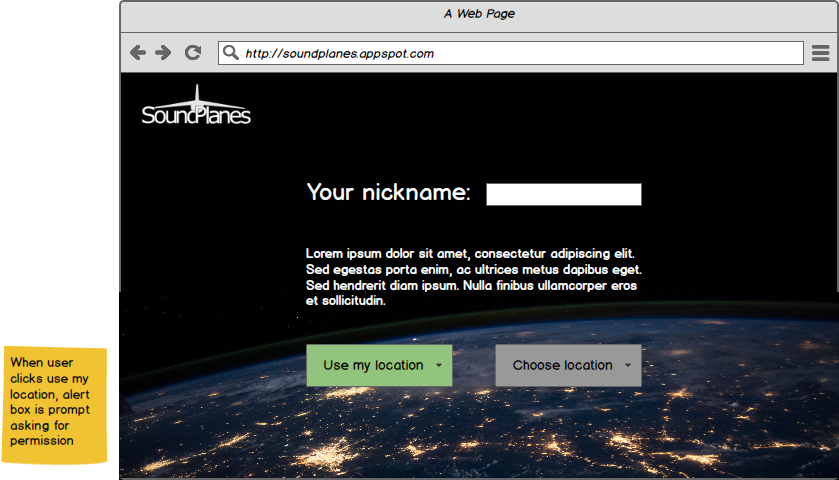


Figure 2. Setup view’s user interface prototype

## Location view

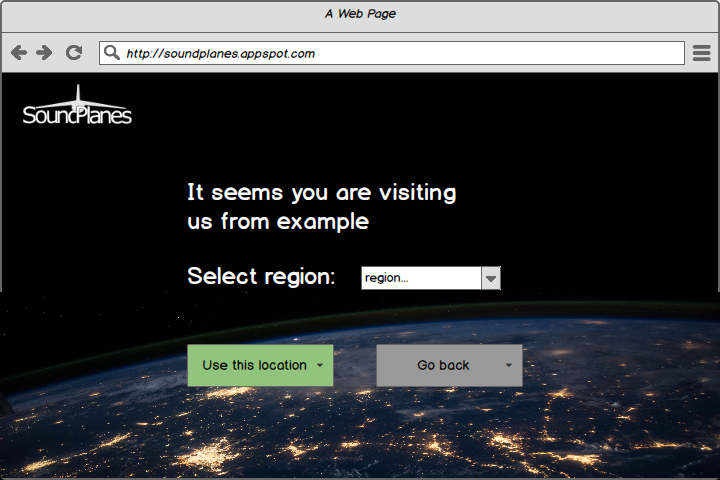
Description

Figure 3. Location view's user prototype interface

## Main view

Description

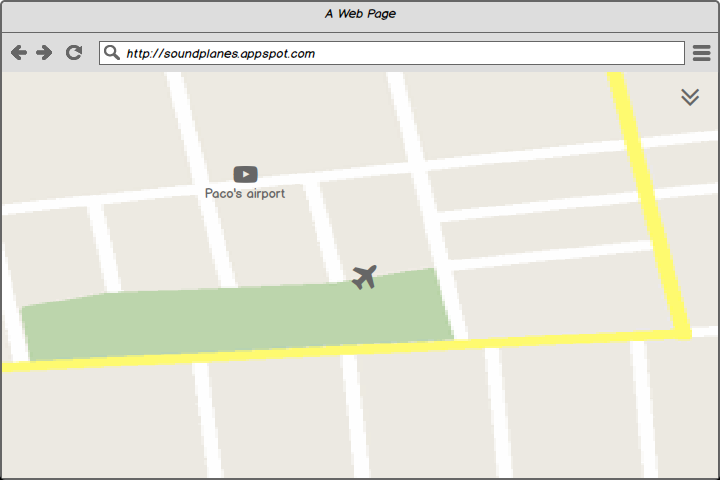


Figure 4. Main view's user prototype interface

## Profile menu view

Description

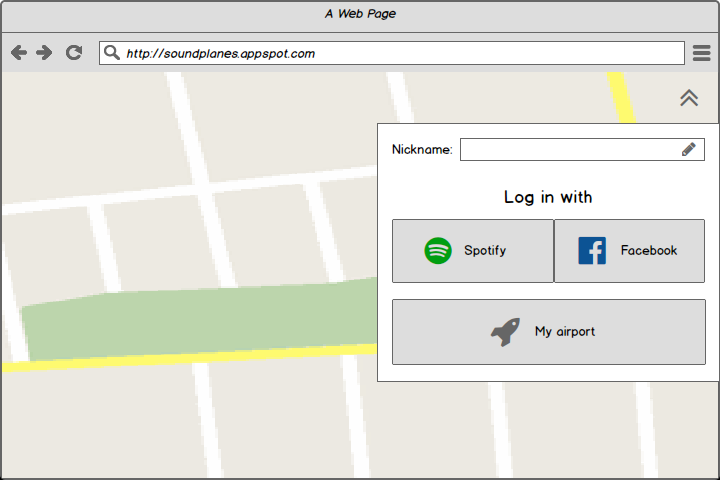


Figure 5. Profile menu view's user interface prototype

## Airport menu view

Description

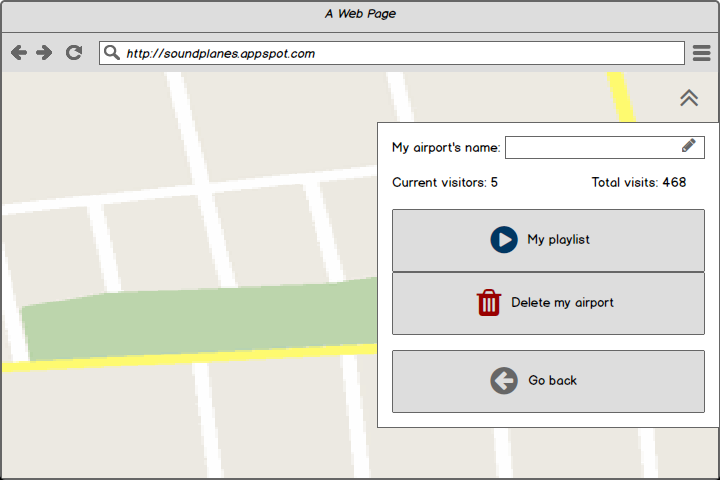


Figure 6. Base menu view's user interface prototype

## Airport chat view

Description

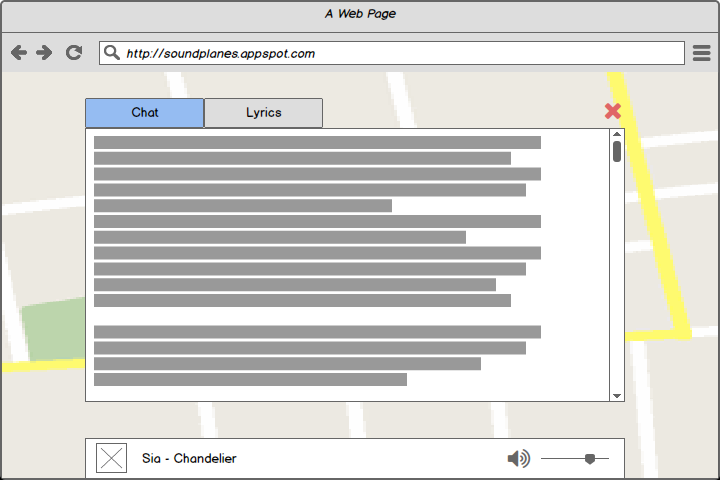


Figure 7. Airport chat view's user interface prototype

## Airport lyrics view

Description



Figure 8. Airport lyrics view's user interface prototype

# Architecture

## Component diagram

Diagrama UML de componentes de alto nivel. Debe incluir las aplicaciones integradas y nuestra propia aplicación como un componente independiente.

## Deployment diagram

Diagrama UML de despliegue de la aplicación.

## High-level sequence diagram

Diagrama UML de secuencia indicando el flujo de mensajes entre las distintas aplicaciones integradas.

## Class diagram

Diagrama UML de clases indicando la distribución de las clases entre las distintas capas, según el patrón MVC.

## Sequence diagram

Diagramas UML de secuencia ilustrando la comunicación entre vistas, controladores y clases del modelo.

# Implementation

It hasn't been done yet.

# Tests

It hasn't been done yet

|  |  |
| --- | --- |
| Summary |  |
| Total number of tests performed |  |
| Number of automated tests |  |

|  |  |
| --- | --- |
| ID | **Test 1** |
| Description |  |
| Input |  |
| Expected output |  |
| Result |  |
| Automated |  |

# User’s Manual

## Mashup

It hasn't been done yet.

## API REST

It hasn't been done yet.

# References

[1] *Balsamiq*. <http://balsamiq.com/>. Accessed January 2014.

[2] J. Webber, S. Parastatidis y I. Robinson. *REST in Practice: Hypermedia and Systems Architecture.* O'Reilly Media. 2010.