EAP: Architecture Specification and Prototype

AltArt aims to provide an aesthetically pleasing collaborative news website, without information explosion, that allows people who have the same interests in music, literature and the arts to come together to connect and share opinions.

A7: High-level architecture. Privileges. Web resources specification

This artifact aims to describe the architecture of our web application. It includes the modules and their description, the existing permission types and the OpenAPI standard specification using YAML.

1. Overview

Identification and description of the modules.

Modules	Description
M01: Authentication and Individual Profile	Web resources associated with user authentication and individual profile management, includes features such as: login/logout, register, password recovery, view and edit personal profile information, eliminate account, edit account, remove followed tags and preferences.
M02: Post	Web resources associated with posts. Includes the following features: create post, edit post, delete post, report post, view post, like/dislike post as well as removing like/dislike, add/delete bookmark.
M03: Comment	Web resources associated with comments. Includes features such as adding comment, editing a comment, deleting a comment, comment a comment, like/dislike a comment as well as removing like/dislike, report a comment
M04: Notification	Web resources associated with notifications. Includes features as viewing and mark as viewed.
M05: Search	Web resource associated with the search of the websites' content.
M06: Static pages	Web resources associated with static content. This includes features such as submitting a support request and viewing the About us and FAQ pages.
M07: Administration	Web resources associated with managing user roles, reports, and support requests. This includes features such as: view role, edit role, delete the post/comment, or ignoring the report and view support requests.

2. Permissions

Definition of the existing permissions necessary to access data and features.

	Permission	Description
PUB	Public	Unauthenticated user (visitors), can register itself, sign-in in the system and consult information
USR	User	Authenticated user, can sign out, delete and edit account, consult information and interact with it by voting on it or leaving comments
OWN	Owner	Users that are owners of information (e.g. own profile, own post, own comment, ...)
MOD	Moderator	Authenticated user with moderator privileges, can manage reports
ADMIN	Administrator	System Manager, can change other users' roles

3. Modules

OpenAPI specification in YAML format to describe the web application's web resources.

See the .yaml file here.

See the Swagger generated documentation here.

```yaml
openapi: 3.0.0

info:
  version: 1.0.0
  title: 'LBAW AltArt Web API'
  description: 'Web Resources Specification (A7) for AltArt'

servers:
- url: http://lbaw2123.lbaw-prod.fe.up.pt/
  description: Production server

externalDocs:
  description: Find more info here.
  url: https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/eap

tags:
  - name: 'M01: Authentication and Individual Profile'
  - name: 'M02: Post'
  - name: 'M03: Comment'
  - name: 'M04: Notification'
  - name: 'M05: Search'
  - name: 'M06: Static pages'
  - name: 'M07: Administration'


paths:
  /login:
      get:
```

```yaml
      operationId: R101
      summary: 'R101: Login Form'
      description: 'Provide login form. Access: PUB'
      tags:
        - 'M01: Authentication and Individual Profile'
      responses:
        '200':
          description: 'Ok. Show [UI09]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui09-login)'

    post:
      operationId: R102
      summary: 'R102: Login Action'
      description : 'Processes the login form submission. Access: PUB'
      tags:
        - 'M01: Authentication and Individual Profile'

      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                username:
                  type: string
                password:
                  type: string
                required:
                  - username
                  - password

      responses:
        '302':
          description: 'Redirect after processing the login credentials.'
          headers:
            Location:
              schema:
                type: string
              examples:
                302Error:
                  description: 'Failed authentication. Redirect to login
form.'
                  value: '/login'

  /logout:
    post:
      operationId: R103
      summary: 'R103: Logout Action'
      description: 'Logout the current authenticated used. Access: USR'
      tags:
        - 'M01: Authentication and Individual Profile'
      responses:
        '302':
          description: 'Redirect after processing logout.'
          headers:
            Location:
              schema:
```

```yaml
              type: string
            examples:
              302Success:
                description: 'Successful logout. Redirect to homepage.'
                value: '/'

  /register:
    get:
      operationId: R104
      summary: 'R104: Register Form'
      description: 'Provide new user registration form. Access: PUB'
      tags:
        - 'M01: Authentication and Individual Profile'
      responses:
        '200':
          description: 'Ok. Show [UI10]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui10-register)'

    post:
      operationId: R105
      summary: 'R105: Register Action'
      description: 'Processes the new user registration form submission. Access:
PUB'
      tags:
        - 'M01: Authentication and Individual Profile'

      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                email:
                  type: string
                username:
                  type: string
                name:
                  type: string
                birthdate:
                  type: string
                password:
                  type: string

              required:
                - email
                - username
                - name
                - birthdate
                - password

      responses:
        '302':
          description: 'Redirect after processing the new user information.'
          headers:
            Location:
              schema:
                type: string
```

```yaml
              examples:
                302Success:
                  description: 'Successful authentication. Redirect to user
profile.'
                  value: '/users/{id}'
                302Failure:
                  description: 'Failed authentication. Redirect to register
form.'
                  value: '/register'

  /user/{id}:
    get:
      operationId: R106
      summary: 'R106: View User Profile'
      description: 'Provide user profile. Access: USR'
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true

      responses:
        '200':
          description: 'Ok. Show [UI06]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui06-users-profile)'
          content:
            application/json:
              schema:
                type: array
                items:
                  type: object
                  properties:
                    name:
                      type: string
                    username:
                      type: string
                    bio:
                      type: string
                    instagram:
                      type: string
                    twitter:
                      type: string
                    linkedin:
                      type: string
                    facebook:
                      type: string
                    profile_photo:
                      type: string
                    number_followers:
                      type: integer
                    number_following:
                      type: integer
                    number_likes:
                      type: integer
                    posts:
```

```
                        type: array
                        items:
                          type: string
                        nullable: true
                   example:
                     - name: "Ana Sousa"
                       username: "anasousa"
                       bio: "Hi!"
                       instagram: https://www.instagram.com/
                       twitter: https://www.twitter.com/
                       linkedin: https://www.linkedin.com/
                       facebook: https://www.facebook.com/
                       profile_photo: null
                       number_followers: 0
                       number_following: 20
                       number_likes: 0
                       posts: null

         '404':
           description: 'Page not found: Show page not found UI'

    delete:
      operationId: R107
      summary: "R107: Delete account action"
      description: "Delete account. Access: OWN"
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true

      responses:
        '302':
          description: 'Redirect after deleting user.'
          headers:
            Location:
              schema:
                type: string
              examples:
                302Success:
                  description: 'Successful account deletion. Redirect to
homepage.'
                  value: '/'
        '403':
          description: 'Forbidden client: show no permission UI.'

  /api/user/{id}/follow:
    post:
      operationId: R108
      summary: "R108: Follow user action"
      description: "Follow user. Access: USR"
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
        - in: path
```

```yaml
          name: id
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                user_id:
                  type: integer
              required:
                - user_id
      responses:
        '200':
          description: 'Ok, followed user'
        '400':
          description: 'Error following user'
        '403':
          description: 'Forbidden client: show no permission UI.'

    delete:
      operationId: R109
      summary: 'R109: Unfollower user action'
      description: "Unfollow user. Access: OWN"
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true
        - in: query
          name: user_id
          schema:
            type: integer
          required: true
      responses:
        '200':
          description: 'Ok, unfollowed user '
        '400':
          description: 'Bad request: Error unfollowing user'
        '403':
          description: 'Forbidden client: show no permission UI.'

  /api/user/{id}/block:
    post:
      operationId: R110
      summary: "R110: Block user action"
      description: "Block user. Access: USR"
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
        - in: path
          name: id
```

```yaml
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                user_id:
                  type: integer
              required:
                - user_id
      responses:
        '200':
          description: 'Ok, blocked user '
        '400':
          description: 'Bad request: Error blocking user'
        '403':
          description: 'Forbidden client: show no permission UI.'

    delete:
      operationId: R111
      summary: 'R111: Unblock user action'
      description: "Unfollow user. Access: OWN"
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true
        - in: query
          name: user_id
          schema:
            type: integer
          required: true
      responses:
        '200':
          description: 'Ok, unblocked user'
        '400':
          description: 'Bad request: Error unblocking user'
        '403':
          description: 'Forbidden client: show no permission UI.'

  /api/user/{id}/edit_photo:
    put:
      operationId: R112
      summary: 'R112: Update user photo action'
      description: 'Update user photo action. Access: OWN'
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
        - in: path
          name: id
          schema:
```

```yaml
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                photo:
                  type: string
              required:
                - photo

      responses:
        '200':
          description: 'Ok, updated photo'
        '400':
          description: 'Bad request: Error updating photo'
        '403':
          description: 'Forbidden client: show no permission UI.'

  /api/user/{id}/edit_bio:
    get:
      operationId: R113
      summary: 'R113: Update user bio'
      description: 'Update user bio. Access: OWN'
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true

      responses:
        '200':
          description: 'Ok.'
          content:
            application/json:
              schema:
                type: array
                items:
                  type: object
                  properties:
                    bio:
                      type: string
                  example:
                    bio: "Hey!"
        '403':
          description: 'Forbidden client: show no permission UI.'
        '404':
          description: 'Page not found: Show page not found UI'

    put:
      operationId: R114
      summary: 'R114: Update user bio action'
```

```yaml
          description: 'Update user bio action. Access: OWN'
          tags:
            - 'M01: Authentication and Individual Profile'
          parameters:
            - in: path
              name: id
              schema:
                type: integer
              required: true
          requestBody:
            required: true
            content:
              application/x-www-form-urlencoded:
                schema:
                  type: object
                  properties:
                    bio_content:
                      type: string
                  required:
                    - bio_content
          responses:
            '200':
              description: 'Ok.'
              content:
                application/json:
                  schema:
                    type: array
                    items:
                      type: object
                      properties:
                        bio_content:
                          type: string
                      example:
                        bio: "Hey, I'm Ana!"
            '403':
              description: 'Forbidden client: show no permission UI.'
            '404':
              description: 'Page not found: Show page not found UI'

  /user/{id}/settings:
    get:
      operationId: R115
      summary: 'R115: Settings forms'
      description: 'Edit user account form. Access: OWN'
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true
      responses:
        '200':
          description: 'Ok. Show [UI08]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui08-settings)'
          content:
            application/json:
```

```yaml
              schema:
                type: array
                items:
                  type: object
                  properties:
                    name:
                      type: string
                    username:
                      type: string
                    email:
                      type: string
                    instagram:
                      type: string
                      nullable: true
                    twitter:
                      type: string
                      nullable: true
                    linkedin:
                      type: string
                      nullable: true
                    facebook:
                      type: string
                      nullable: true
                    show_people_follow:
                      type: boolean
                    show_tags_follow:
                      type: integer
                    tags:
                      type: array
                      items:
                        type: string
                      nullable: true
                  example:
                    name: "Ana Sousa"
                    username: "anasousa"
                    email: "anasousa@gmail.com"
                    instagram: https://www.instagram.com/
                    twitter: null
                    linkedin: https://www.linkedin.com/
                    facebook: https://www.facebook.com/
                    show_people_follow: true
                    show_tags_follow: false
                    posts: ["art", "music"]

        '403':
          description: 'Forbidden client: show no permission UI.'
        '404':
          description: 'Page not found: Show page not found UI'


  /api/user/{id}/settings/edit_account:
    put:
      operationId: R116
      summary: 'R116: Edit user account action'
      description: 'Edit user account action. Access: OWN'
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
```

```yaml
          - in: path
            name: id
            schema:
              type: integer
            required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                name:
                  type: string
                username:
                  type: string
                email:
                  type: string

      responses:
        '200':
          description: 'Ok, account edited '
          content:
            application/x-www-form-urlencoded:
              schema:
                type: object
                properties:
                  name:
                    type: string
                  username:
                    type: string
                  email:
                    type: string
                example:
                  name: "Ana Sousa"
                  username: "anasousa"
                  email: "anasousa@gmail.com"
        '400':
          description: 'Bad request: Error editing account'
        '403':
          description: 'Forbidden client: show no permission UI.'

  /api/user/{id}/settings/edit_social_networks:
    put:
      operationId: R117
      summary: 'R117: Update social newtworks action'
      description: 'Update social newtworks. Access: OWN'
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
```

```yaml
              application/x-www-form-urlencoded:
                schema:
                  type: object
                  properties:
                    twitter:
                      type: string
                    instagram:
                      type: string
                    facebook:
                      type: string
                    linkedin:
                      type: string
      responses:
        '200':
          description: 'Ok, social networks edited '
          content:
            application/x-www-form-urlencoded:
              schema:
                type: object
                properties:
                  twitter:
                    type: string
                  instagram:
                    type: string
                  facebook:
                    type: string
                  linkedin:
                    type: string
                example:
                  instagram: https://www.instagram.com/
                  twitter: https://www.twitter.com/
                  linkedin: https://www.linkedin.com/
                  facebook: https://www.facebook.com/
        '400':
          description: 'Bad request: Error editing social networks'
        '403':
          description: 'Forbidden client: show no permission UI.'

  /user/{id}/settings/change_password:
    put:
      operationId: R118
      summary: 'R118: Change password action'
      description: 'Change password action. Access: OWN'
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
```

```yaml
                password:
                  type: string
                new_password:
                  type: string
                confirm_password:
                  type: string
              required:
                - password
                - new_password
                - confirm_password
      responses:
        '200':
          description: 'Ok, password changed '
        '400':
          description: 'Error changing password'
        '403':
          description: 'Forbidden client: show no permission UI.'

  /api/user/{id}/settings/edit_preferences:
    put:
      operationId: R119
      summary: 'R119: Edit preferences action'
      description: 'Edit preferences action. Access: OWN'
      tags:
        - 'M01: Authentication and Individual Profile'
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                show_people_follow:
                  type: boolean
                show_tags_follow:
                  type: boolean
                tags:
                  type: array
                  items:
                    type: string
      responses:
        '200':
          description: 'Ok, preferences edited '
          content:
            application/x-www-form-urlencoded:
              schema:
                type: object
                properties:
                  show_people_follow:
                    type: boolean
                  show_tags_follow:
                    type: boolean
```

```yaml
                  tags:
                    type: array
                    items:
                      type: string
                example:
                  show_people_follow: false
                  show_tags_follow: true
                  posts: ["art", "music"]
        '400':
          description: 'Bad request: Error editing preferences'
        '403':
          description: 'Forbidden client: show no permission UI.'
  /addpost:
    get:
      operationId: R201
      summary: 'R201: Add Post Form'
      description: 'Provide add post form. Access: USR'
      tags:
        - 'M02: Post'
      responses:
        '200':
          description: 'Ok. Show [UI15]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui15-create-post)'
        '403':
          description: 'Forbidden client: show no permission UI.'
    post:
      operationId: R202
      summary: 'R202: Add Post Action'
      description: 'Processes the new post form submission. Access: USR'
      tags:
        - 'M02: Post'
      parameters:
        - in: query
          name: user_id
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                title:
                  type: string
                thumbnail:
                  type: string
                content:
                  type: string
                is_spoiler:
                  type: boolean
                type:
                  type: string
                category:
                  type: string
                photos:
                  type: array
```

```yaml
                items:
                  type: string

              tags:
                type: array
                items:
                  type: string
          required:
            - title
            - thumbnail
            - is_spoiler
            - content
            - type
            - category
            - user_id
            - photos
            - tags

    responses:
      '302':
        description: 'Redirect after processing the new post information.'
        headers:
          Location:
            schema:
              type: string
            examples:
              302Success:
                description: 'Successful post creation. Redirect to post
page.'
                value: '/post/{id}'
              302Failure:
                description: 'Failed post creation. Redirect to add post form
page.'
                value: '/addpost'
      '403':
        description: 'Forbidden client: show no permission UI.'

  /post/{id}:
    get:
      operationId: R203
      summary: 'R203: View post'
      description: 'Show the post. Access: PUB'
      tags:
        - 'M02: Post'

      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true

      responses:
        '200':
          description: 'Ok. Show [UI14]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui14-post-page)'
          content:
            application/json:
```

```yaml
            schema:
              type: array
              items:
                type: object
                properties:
                  title:
                    type: string
                  thumbnail:
                    type: string
                  content:
                    type: string
                  is_spoiler:
                    type: boolean
                  created_at:
                    type: string
                    format: date
                  n_views:
                    type: integer
                  category:
                    type: string
                  author_name:
                    type: string
                  up_votes:
                    type: integer
                  down_votes:
                    type: integer
                  photos:
                    type: array
                    items:
                      type: string
                  tags:
                    type: array
                    items:
                      type: string
                  comments:
                    type: array
                    items:
                      type: object

    '404':
      description: 'Page not found: Show page not found UI'


delete:
  operationId: R204
  summary: 'R204: Delete post action'
  description: 'Delete the post. Access: OWN'
  tags:
    - 'M02: Post'
  parameters:
    - in: path
      name: id
      schema:
        type: integer
      required: true
  responses:
    '302':
```

```yaml
              description: 'Redirect after processing the deleting post.'
            headers:
              Location:
                schema:
                  type: string
                examples:
                  302Success:
                    description: 'Successful post deletion. Redirect to post
page.'
                    value: '/post/{id}'
                  302Failure:
                    description: 'Failed post deletion. Redirect to post page.'
                    value: '/post/{id}'
        '403':
          description: 'Forbidden client: show no permission UI.'


  /editpost/{id}:
    get:
      operationId: R205
      summary: 'R205: Edit Post Form'
      description: 'Provide edit post form. Access: OWN'
      tags:
        - 'M02: Post'
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true
      responses:
        '200':
          description: 'Ok. Show [UI16]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui16-edit-post)'
          content:
            application/json:
              schema:
                type: array
                items:
                  type: object
                  properties:
                    title:
                      type: string
                    thumbnail:
                      type: string
                    content:
                      type: string
                    is_spoiler:
                      type: boolean
                    type:
                      type: string
                    category:
                      type: string
                    photos:
                      type: array
                      items:
                        type: string
                    tags:
```

```yaml
                type: array
                items:
                  type: string

      '403':
        description: 'Forbidden client: show no permission UI.'
      '404':
        description: 'Page not found: Show page not found UI'
  put:
    operationId: R206
    summary: 'R206: Edit Action'
    description: 'Processes the new post content form submission. Access: OWN'
    tags:
      - 'M02: Post'
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        required: true
    requestBody:
      required: true
      content:
        application/x-www-form-urlencoded:
          schema:
            type: object
            properties:
              title:
                type: string
              thumbnail:
                type: string
              content:
                type: string
              is_spoiler:
                type: boolean
              type:
                type: string
              category:
                type: string
              photos:
                type: array
                items:
                  type: string
              tags:
                type: array
                items:
                  type: string
            required:
              - title
              - thumbnail
              - is_spoiler
              - content
              - type
              - category
              - user_id
              - upvotes
              - downvotes
              - photos
```

```
          - tags

      responses:
        '302':
          description: 'Redirect after processing the editing post information.'
          headers:
            Location:
              schema:
                type: string
              examples:
                302Success:
                  description: 'Successful post edition. Redirect to post page.'
                  value: '/post/{id}'
                302Failure:
                  description: 'Failed post edition. Redirect to edit post
form.'
                  value: '/editpost/{id}'
        '403':
          description: 'Forbidden client: show no permission UI.'

  /api/post/{id}/save:
    post:
      operationId: R207
      summary: 'R207: Save Post API'
      description: 'Saves Post. Access: USR'
      tags:
        - 'M02: Post'
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true
        - in: query
          name: user_id
          schema:
            type: integer
          required: true

      responses:
        '200':
          description: 'Ok, post saved '
        '400':
          description: 'Error saving post'
        '403':
          description: 'Forbidden client: show no permission UI.'

    delete:
      operationId: R208
      summary: 'R208: Delete saved post API'
      description: 'Delete saved post. Access: OWN'
      tags:
        - 'M02: Post'

      parameters:
        - in: path
          name: id
          schema:
```

```yaml
        type: integer
        required: true
    - in: query
      name: user_id
      schema:
        type: integer
      required: true
  responses:
    '200':
      description: 'Ok, deleting saved post '
    '400':
      description: 'Bad request: Error deleting save post'
    '403':
      description: 'Forbidden client: show no permission UI.'

/api/post/{id}/vote:
  post:
    operationId: R209
    summary: 'R209: Add Post Like/Dislike API'
    description: 'Adds vote. Access: USR'
    tags:
      - 'M02: Post'
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        required: true
      - in: query
        name: user_id
        schema:
          type: integer
        required: true
    requestBody:
      required: true
      content:
        application/x-www-form-urlencoded:
          schema:
            type: object
            properties:
              vote:
                type: boolean
            required:
              - vote
    responses:
      '200':
        description: 'Ok, vote added '
      '400':
        description: 'Error adding vote'
      '403':
        description: 'Forbidden client: show no permission UI.'

  put:
    operationId: R210
    summary: 'R210: Edit vote API'
    description: 'Edit the vote. Access: OWN'
    tags:
      - 'M02: Post'
```

```yaml
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true
        - in: query
          name: user_id
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                vote:
                  type: boolean
              required:
                - vote
      responses:
        '200':
          description: 'Ok, vote edited '
        '400':
          description: 'Error editing vote'
        '403':
          description: 'Forbidden client: show no permission UI.'


  delete:
    operationId: R211
    summary: 'R211: Delete vote API'
    description: 'Delete the vote. Access: OWN'
    tags:
      - 'M02: Post'
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        required: true
      - in: query
        name: user_id
        schema:
          type: integer
        required: true
    responses:
      '200':
        description: 'Ok, vote deleted '
      '400':
        description: 'Bad request: Error deleting vote'
      '403':
        description: 'Forbidden client: show no permission UI.'


/post/{id}/report:
```

```yaml
    post:
      operationId: R212
      summary: 'R212: Report Post Action'
      description: 'Processes the new post report submission. Access: USR'
      tags:
        - 'M02: Post'
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          required: true
        - in: query
          name: user_id
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                motive:
                  type: string
              required:
                - motive

      responses:
        '302':
          description: 'Redirect after processing the new report information.'
          headers:
            Location:
              schema:
                type: string
              examples:
                302Success:
                  description: 'Successful report addition. Redirect to post
page.'
                  value: '/post/{id}'
                302Failure:
                  description: 'Failed report addition. Redirect to post page.'
                  value: '/post/{id}'
        '403':
          description: 'Forbidden client: show no permission UI.'


  /home:
    get:
      operationId: R213
      summary: 'R213: Homepage'
      description: 'Show the homepage filtered. Access: PUB'
      tags:
        - 'M02: Post'
      responses:
        '200':
```

```yaml
          description: 'Ok. Show [UI01]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui01-homepage)'
          content:
            application/x-www-form-urlencoded:
              schema:
                type: object
                properties:
                  posts:
                    type: array
                    items:
                      type: object



  /api/home/{homepageFilters}:
    get:
      operationId: R214
      summary: 'R214: Filter Homepage posts API'
      description: 'Fitlers posts and returns result as JSON. Access: PUB.'
      tags:
        - 'M02: Post'
      parameters:
        - in: path
          name: homepageFilters
          description: 'Specifies the filter parameter for Homepage posts'
          schema:
            type: string
            enum: [hot, top, new]
          required: true
      responses:
        '200':
          description: Success
          content:
            application/json:
              schema:
                type: array
                items:
                  type: object
                  properties:
                    id:
                      type: integer
                    title:
                      type: string
                    thumbnail:
                      type: string
                    content:
                      type: string
                    is_spoiler:
                      type: boolean
                    created_at:
                        type: string
                    n_views:
                        type: integer
                    category:
                        type: string
                    user_id:
                        type: integer
                    n_likes:
```

```yaml
                                type: integer
                        photos:
                                type: array
                                items:
                                    type: string
                        tags:
                                type: array
                                items:
                                    type: string
                        comments:
                                type: array
                                items:
                                    type: object
        '404':
          description: 'Page not found: Show page not found UI'

/api/post/{post_id}/add_comment:
  post:
    operationId: R301
    summary: 'R301: Add Comment Action API'
    description: 'Add a new comment. Access: USR'
    tags:
      - 'M03: Comment'
    parameters:
      - in: path
        name: post_id
        schema:
          type: integer
        required: true
    requestBody:
      required: true
      content:
        application/x-www-form-urlencoded:
          schema:
            type: object
            properties:
              content:
                type: string
              user_id:
                type: integer
            required:
              - content
              - user_id
    responses:
      '200':
        description: 'Success'
        content:
          application/json:
            schema:
              type: object
              properties:
                id:
                  type: integer
                content:
                  type: string
                user_id:
                  type: integer
                comment_date:
```

```yaml
                  type: string
                  format: date-time
                post_id:
                  type: string
            example:
              - id: 1
                content: Agreed!
                user_id: 44
                comment_date: 2020-05-12t18:15:43z
                post_id: 19
    '400':
      description: 'Error adding comment'
    '403':
      description: 'Forbidden client: show no permission UI'
    '404':
      description: 'Post not found'

/api/comment/{comment_id}/edit:
  get:
    operationId: R302
    summary: 'R302: Edit Comment Form API'
    description: 'Gets the edit form. Access: OWN'
    tags:
      - 'M03: Comment'
    parameters:
      - in: path
        name: comment_id
        schema:
          type: integer
        required: true
    responses:
      '200':
        description: 'Success'
        content:
          application/json:
            schema:
              type: object
              properties:
                id:
                  type: integer
                content:
                  type: string
                user_id:
                  type: integer
                comment_date:
                  type: string
                  format: date-time
                post_id:
                  type: integer
                  nullable: true
                comment_id:
                  type: integer
                  nullable: true
                number_likes:
                  type: integer
                number_dislikes:
                  type: integer
              example:
```

```yaml
            - id: 1
              content: 'I really liked this article!'
              user_id: 24
              comment_date: 2020-05-12t18:10:43z
              post_id: 19
              comment_id: null
              number_likes: 10
              number_dislikes: 0
        '400':
          description: 'Error getting edit comment form'
        '403':
          description: 'Forbidden client: show no permission UI'
        '404':
          description: 'Comment not found'

  patch:
    operationId: R303
    summary: "R303: Edit Comment Action API"
    description: 'Provides the resource to edit a comment. Access: OWN'
    tags:
      - 'M03: Comment'
    parameters:
      - in: path
        name: comment_id
        schema:
          type: integer
        required: true
    requestBody:
      required: true
      content:
        application/x-www-form-urlencoded:
          schema:
            type: object
            properties:
              content:
                type: string
            required:
              - content
    responses:
      '200':
        description: 'Success'
        content:
          application/json:
            schema:
              type: object
              properties:
                id:
                  type: integer
                content:
                  type: string
              example:
              - id: 1
                content: 'I really liked this article!'
      '400':
        description: 'Error editing comment'
      '403':
        description: 'Forbidden client: show no permission UI'
      '404':
```

```yaml
            description: 'Comment not found'

  /api/comment/{comment_id}:
    delete:
      operationId: R304
      summary: "R304: Delete comment API"
      description: 'Provides the resource to delete a comment. Access: OWN'
      tags:
        - 'M03: Comment'
      parameters:
        - in: path
          name: comment_id
          schema:
            type: integer
          required: true
      responses:
        '200':
          description: 'Success'
        '400':
          description: 'Error deleting comment'
        '403':
          description: 'Forbidden client: show no permission UI'
        '404':
          description: 'Comment not found'

  /api/comment/{comment_id}/vote:
    post:
      operationId: R305
      summary: 'R305: Add comment vote API'
      description: 'Provides the resource to vote on a comment. Access: USR'
      tags:
        - 'M03: Comment'
      parameters:
        - in: path
          name: comment_id
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                user_id:
                  type: integer
                like:
                  type: boolean
              required:
                - user_id
                - like
      responses:
        '200':
          description: 'Success'
        '400':
          description: 'Error adding vote'
        '403':
```

```yaml
              description: 'Forbidden client: show no permission UI'
            '404':
              description: 'Comment not found.'

      delete:
        operationId: R306
        summary: "R306: Delete comment vote API"
        description: 'Provides the resource to remove a comment vote. Access: OWN'
        tags:
          - 'M03: Comment'
        parameters:
          - in: path
            name: comment_id
            schema:
              type: integer
            required: true
          - in: query
            name: user_id
            schema:
              type: integer
            required: true
        responses:
          '200':
            description: 'Success'
          '400':
            description: 'Error adding vote'
          '403':
            description: 'Forbidden client: show no permission UI'
          '404':
            description: 'Comment not found'

      put:
        operationId: R307
        summary: "R307: Edit comment vote API"
        description: 'Provides the resource to edit a comment vote. Access: OWN'
        tags:
          - 'M03: Comment'
        parameters:
          - in: path
            name: comment_id
            schema:
              type: integer
            required: true
        requestBody:
          required: true
          content:
            application/x-www-form-urlencoded:
              schema:
                type: object
                properties:
                  user_id:
                    type: integer
                  like:
                    type: boolean
                required:
                  - user_id
                  - like
        responses:
```

```yaml
        '200':
          description: 'Success'
        '400':
          description: 'Error editing comment'
        '403':
          description: 'Forbidden client: show no permission UI'
        '404':
          description: 'Comment not found'

  /comment/{comment_id}/report:
    post:
      operationId: R308
      summary: 'R308: Report comment vote Action'
      description: 'Provides the resource to report a comment. Access: USR'
      tags:
        - 'M03: Comment'
      parameters:
      - in: path
        name: comment_id
        schema:
          type: integer
        required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                motive:
                  type: string
                user_reporting:
                  type: integer
                comment_reported:
                  type: integer
              required:
                - motive
                - user_reporting
                - comment_reported
      responses:
        '200':
          description: 'Success'
        '400':
          description: 'Error reporting comment'
        '403':
          description: 'Forbidden client: show no permission UI'
        '404':
          description: 'Comment not found'

  /api/comment/{comment_id}/thread:
    get:
      operationId: R309
      summary: 'R309: Get all thread comments of a comment API'
      description: 'Gets all the thread comments associated with a comment.
Access: PUB'
      tags:
        - 'M03: Comment'
      parameters:
```

```yaml
      - in: path
        name: comment_id
        schema:
          type: integer
        required: true
    responses:
      '200':
        description: Success
        content:
          application/json:
            schema:
              type: array
              items:
                type: object
                properties:
                  id:
                    type: integer
                  content:
                    type: string
                  user_id:
                    type: integer
                  comment_date:
                    type: string
                    format: date-time
                  post_id:
                    type: integer
                    nullable: true
                  comment_id:
                    type: integer
                  number_likes:
                    type: integer
                  number_dislikes:
                    type: integer
              example:
              - id: 2
                content: 'I agree with you!'
                user_id: 35
                comment_date: 2020-05-12t18:15:43z
                post_id: null
                comment_id: 1
                number_likes: 2
                number_dislikes: 0
              - id: 3
                content: 'I agree too!'
                user_id: 63
                comment_date: 2020-05-12t18:15:52z
                post_id: null
                comment_id: 1
                number_likes: 0
                number_dislikes: 0
      '400':
        description: 'Error getting thread comments'
      '404':
        description: 'Comment not found'

/api/comment/{comment_id}/add_comment:
  post:
    operationId: R310
```

```yaml
summary: 'R310: Add Thread Comment API'
description: 'Add a new thread comment. Access: USR'
tags:
  - 'M03: Comment'
parameters:
  - in: path
    name: comment_id
    schema:
      type: integer
    required: true
requestBody:
  required: true
  content:
    application/x-www-form-urlencoded:
      schema:
        type: object
        properties:
          content:
            type: string
          user_id:
            type: string
        required:
          - content
          - user_id
responses:
  '200':
    description: 'Ok, thread comment added'
    content:
      application/json:
        schema:
          type: object
          properties:
            id:
              type: integer
            content:
              type: string
            user_id:
              type: integer
            comment_date:
              type: string
              format: date-time
            comment_id:
              type: string
            number_likes:
              type: integer
            number_dislikes:
              type: integer
        example:
          - id: 8
            content: This made me laugh!
            user_id: 82
            comment_date: 2020-09-20t10:12:19z
            comment_id: 1
            number_likes: 0
            number_dislikes: 0
  '400':
    description: 'Error adding thread comment'
  '403':
```

```yaml
                    description: 'Forbidden client: show no permission UI'
            '404':
                    description: 'Comment not found'

  /api/post/{post_id}/comments:
    get:
      operationId: R311
      summary: 'R311: Get more comments of post API'
      description: 'Gets more comments related to a post. Access: PUB'
      tags:
        - 'M03: Comment'
      parameters:
        - in: path
          name: post_id
          schema:
            type: integer
          required: true
        - in: query
          name: page
          schema:
            type: integer
          required: true
      responses:
        '200':
          description: Success
          content:
            application/json:
              schema:
                type: array
                items:
                  type: object
                  properties:
                    id:
                      type: integer
                    content:
                      type: string
                    user_id:
                      type: integer
                    comment_date:
                      type: string
                      format: date-time
                    post_id:
                      type: integer
                    comment_id:
                      type: integer
                      nullable: true
                    number_likes:
                      type: integer
                    number_dislikes:
                      type: integer
                  example:
                  - id: 4
                    content: 'I didnt like this movie too!'
                    user_id: 35
                    comment_date: 2020-05-12t18:15:43z
                    post_id: 1
                    comment_id: null
                    number_likes: 2
```

```yaml
                    number_dislikes: 0
                  - id: 5
                    content: 'I disagree with you'
                    user_id: 63
                    comment_date: 2020-05-12t18:15:52z
                    post_id: 1
                    comment_id: null
                    number_likes: 0
                    number_dislikes: 0
        '400':
          description: 'Error getting comments'
        '404':
          description: 'Post not found'

  /api/notification/{notification_id}/read:
    post:
      operationId: R401
      summary: 'R401: Mark notification as read API'
      description: 'Provides the resource to mark a notification as read. Access:
OWN'
      tags:
        - 'M04: Notification'
      parameters:
        - in: path
          name: notification_id
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                read:
                  type: boolean
              required:
                - read
      responses:
        '200':
          description: 'Ok. Notification added as read successfully.'
        '400':
          description: 'Bad request. Error message is specified via an HTTP
header.'
        '403':
          description: 'Forbidden client: show no permission UI'
        '404':
          description: 'Notification not found.'

  /api/user/{user_id}/read:
    post:
      operationId: R402
      summary: 'R402: Mark all user notification as read API'
      description: 'Provides the resource to mark all notifications of a user as
read. Access: OWN'
      tags:
        - 'M04: Notification'
```

```yaml
      parameters:
        - in: path
          name: user_id
          schema:
            type: integer
          required: true
      responses:
        '200':
          description: 'Success'
        '400':
          description: 'Error marking all notifications as read.'
        '403':
          description: 'Forbidden client: show no permission UI'
        '404':
          description: 'User not found.'

  /api/user/{user_id}/notifications:
    get:
      operationId: R403
      summary: 'R403: Get more notifications API'
      description: 'Gets more notifications of a user. Access: USR'
      tags:
        - 'M04: Notification'
      parameters:
        - in: path
          name: user_id
          schema:
            type: integer
          required: true
        - in: query
          name: page
          schema:
            type: integer
          required: true
      responses:
        '200':
          description: 'Success'
          content:
            application/json:
              schema:
                type: array
                items:
                  type: object
                  properties:
                    id:
                      type: integer
                    created_date:
                      type: string
                      format: date-time
                    notificated_user:
                      type: integer
                    read:
                      type: boolean
                    type:
                      type: string
                    post_id:
                      type: integer
                      nullable: true
```

```yaml
                  follower_id:
                    type: integer
                    nullable: true
                  comment_id:
                    type: integer
                    nullable: true
                  voted_comment:
                    type: integer
                    nullable: true
                  voted_post:
                    type: integer
                    nullable: true
                  voted_user:
                    type: integer
                    nullable: true
                example:
                - id: 1
                  created_date: 2020-05-12t18:15:43z
                  notificated_user: 1
                  read: false
                  type: publish
                  post_id: 1
                  follower_id: null
                  comment_id: null
                  voted_comment: null
                  voted_post: null
                  voted_user: null
                - id: 2
                  created_date: 2020-05-22t18:15:43z
                  notificated_user: 1
                  read: false
                  type: vote
                  post_id: null
                  follower_id: null
                  comment_id: null
                  voted_comment: 3
                  voted_post: null
                  voted_user: null
        '400':
          description: 'Error getting notifications'
        '404':
          description: 'Post not found'

  /api/post_filter/{filters}:
    get:
      operationId: R501
      summary: 'R501: Post filter'
      description: 'Post filter and return results as JSON.  Access: PUB'
      tags:
        - 'M05: Search'
      parameters:
        - in: path
          name: filters
          description: Post filters
          schema:
            type: string
          required: true
      responses:
```

```yaml
      '200':
        description: 'Success.'
        content:
          application/json:
            schema:
              type: array
              items:
                type: object
                properties:
                  id:
                    type: integer
                  title:
                    type: string
                  author_id:
                    type: integer
                  date:
                    type: string
                    format: date
                  views:
                    type: integer
                  reports:
                    type: integer
                  type:
                    type: string
                  content:
                    type: string
                  likes:
                    type: integer

      '400':
        description: 'Bad request. Error message retrieving data. Show [UI05]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui05-moderator-
dashboard)'


  /api/report_filter:
    get:
      operationId: R502
      summary: 'R502: Report filter'
      description: 'Report filter and return results as JSON.  Access: MOD'
      tags:
        - 'M05: Search'
      parameters:
        - in: query
          name: moderator_id
          description: Moderator ID
          schema:
            type: integer
          required: true
        - in: query
          name: text
          description: String to use for full-text search
          schema:
            type: string
          required: false
        - in: query
          name: type
          description: Type of content.(post or comment)
```

```yaml
              schema:
                type: string
              required: false
            - in: query
              name: category
              description: Category of content
              schema:
                type: string
              required: false
            - in: query
              name: date
              description: Date ordering
              schema:
                type: string
              required: false
            - in: query
              name: unassigned
              description: Unassigned reports flag
              schema:
                type: boolean
              required: false
            - in: query
              name: assigned
              description: assigned reports flag
              schema:
                type: boolean
              required: false
        responses:
          '200':
            description: 'Success.'
            content:
              application/json:
                schema:
                  type: array
                  items:
                    type: object
                    properties:
                      id:
                        type: integer
                      title:
                        type: string
                      author_id:
                        type: integer
                      date:
                        type: string
                        format: date
                      motive:
                        type: string
                      reports:
                        type: integer
                      content_type:
                        type: string

          '400':
            description: 'Bad request. Error message retrieving data.'

  /about:
    get:
```

```yaml
      operationId: R601
      summary: 'R601: Get About Page'
      description: 'Get About page content.  Access: PUB'
      tags:
        - 'M06: Static pages'
      responses:
        '202':
          description: 'Success. Show [UI11]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui11-about-us)'

  /faq:
    get:
      operationId: R602
      summary: 'R602: Get FAQ Page'
      description: 'Get FAQ page content.  Access: PUB'
      tags:
        - 'M06: Static pages'
      responses:
        '202':
          description: 'Success. Show [UI12]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui12-faq)'

  /support:
    get:
      operationId: R603
      summary: 'R603: Get Support Page'
      description: 'Get Support page content.  Access: PUB'
      tags:
        - 'M06: Static pages'
      responses:
        '202':
          description: 'Success. Show [UI13]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui13-support-page)'

    post:
      operationId: R604
      summary: 'R604: Send Support Request'
      description: 'Get Support page content.  Access: PUB'
      tags:
        - 'M06: Static pages'
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                content:
                  type: integer
                contact:
                  type: string
                frequency:
                  type: integer

              required:
                - moderator_id
                - action
                - frequency
```

```yaml
        responses:
          '202':
            description: 'Success. Show [UI13]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui13-support-page)'

  /supports:
    get:
      operationId: R605
      summary: 'R605: Get All Support requests'
      description: 'Get Support page content.  Access: MOD'
      tags:
        - 'M06: Static pages'
      responses:
        '202':
          description: 'Success. Show [UI13]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui13-support-page)'
          content:
            application/json:
              schema:
                type: array
                items:
                  type: object
                  properties:
                    content:
                      type: string
                    contact:
                      type: string
                    frequency:
                      type: integer

  /administration/roles:
    get:
      operationId: R701
      summary: 'R701: Get all user and roles'
      description: 'Get all user and roles and return results as JSON.  Access:
SM'
      tags:
        - 'M07: Administration'
      responses:
        '200':
          description: 'Success. Show [UI04]
(https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/-/wikis/er#ui04-manage-moderators)'
          content:
            application/json:
              schema:
                type: array
                items:
                  type: object
                  properties:
                    id:
                      type: integer
                    username:
                      type: string
                    role:
                      type: string
        '403':
          description: 'Unauthorized access!.'
```

```yaml
/api/administration/roles/{user_id}/edit_role:
  put:
    operationId: R702
    summary: 'R702: Edit a users role'
    description: 'Edit user role. Access: SM'
    tags:
      - 'M07: Administration'
    parameters:
      - in: path
        name: user_id
        description: User ID
        schema:
          type: integer
        required: true
    requestBody:
      required: true
      content:
        application/x-www-form-urlencoded:
          schema:
            type: object
            properties:
              new_role:
                type: string

              required:
                - comment_id

    responses:
      '302':
        description: 'Role updated successfully.Redirecting to role manager'
        headers:
          Location:
            schema:
              type: string
      '404':
        description: 'Error updating role! User ID not found-'
        headers:
          Location:
            schema:
              type: string
      '403':
        description: 'Unauthorized access!.'




/reports/{report_id}/close:
  put:
    operationId: R703
    summary: 'R703: Close a report'
    description: 'Close a report. Access: MOD'
    tags:
      - 'M07: Administration'
    parameters:
      - in: path
```

```yaml
          name: report_id
          description: Report ID
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                moderator_id:
                  type: integer

                required:
                  - moderator_id

      responses:
        '302':
          description: 'Report dismissed successfully.Redirecting to moderator
dashboard'
          headers:
            Location:
              schema:
                type: string
        '404':
          description: 'Report not found!.Redirecting to moderator dashboard'
          headers:
            Location:
              schema:
                type: string
        '403':
          description: 'Unauthorized access!.'


  /reports/{report_id}/assign_report:
    put:
      operationId: R704
      summary: 'R704: Assign a report'
      description: 'Assign a report. Access: MOD'
      tags:
        - 'M07: Administration'
      parameters:
        - in: path
          name: report_id
          description: Report ID
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                moderator_id:
```

```yaml
              type: integer
            required:
              - moderator_id
      responses:
        '302':
          description: 'Report assigned successfully.Redirecting to moderator
dashboard'
          headers:
            Location:
              schema:
                type: string
        '404':
          description: 'Report not found!.Redirecting to moderator dashboard'
          headers:
            Location:
              schema:
                type: string
        '403':
          description: 'Unauthorized access!.'


  /reports/{report_id}/process:
    put:
      operationId: R705
      summary: 'R705: Process a report'
      description: 'Process a report. Access: MOD'
      tags:
        - 'M07: Administration'
      parameters:
        - in: path
          name: report_id
          description: Report ID
          schema:
            type: integer
          required: true
      requestBody:
        required: true
        content:
          application/x-www-form-urlencoded:
            schema:
              type: object
              properties:
                moderator_id:
                  type: integer
                action:
                  type: string

                required:
                  - moderator_id
                  - action
      responses:
        '302':
          description: 'Report processed successfully.Redirecting to moderator
dashboard'
          headers:
            Location:
              schema:
                type: string
```

```yaml
        '404':
          description: 'Report not found.Redirecting to moderator dashboard'
          headers:
            Location:
              schema:
                type: string
        '403':
          description: 'Unauthorized access!.'
```

A8: Vertical prototype

The Vertical Prototype includes the implementation of simple but important user stories. It includes the implementation of user stories for visualization, insertion, edition and deletion of information pages as well as the access control permissions for each one of them. The main goal of this artifact is to familiarize with the framework used in the project and support the presented architecture, putting together the user interface, business logic and data access.

1. Implemented Features

1.1. Implemented User Stories

The following table describes the user stories implemented in this prototype.

User Story reference	Name	Priority	Description
US001	Homepage	High	As a user, I want to access the home page, so that I can see the most popular posts.
US004	Read Post	High	As a user, I want to read a post, so I can see its detailed information.
US006	About Page	Low	As a user, I want to access an information page, so that I can see the description of the website.
US007	FAQ Page	Low	As a user, I want to access the FAQ, so that I can see Frequently Asked Questions.
US101	Sign In	High	As a visitor, I want to authenticate into the system, so that I can access privileged information.
US102	Sign Up	High	As a visitor, I want to register myself into the system, so that I can authenticate myself into the system.
US201	Sign out	High	As an authenticated user, I want to sign out of the system, so that I can disconnect my account.
US301	Publish Post	High	As an author, I want to publish a post indicating its category (news, opinion articles, reviews) and tag (for example, movie, book, album), so that I can share information with other people.
US302	Edit Post	High	As an author, I want to be able to edit a post of my own, so that I can add/remove information or correct errors.
US303	Remove Post	High	As an author, I want to remove a post of my own, so that it is no longer available.

1.2. Implemented Web Resources

This section describes the web resources implemented in this prototype.

Module M01: Authentication and Individual Profile

Web Resource Reference	URL
R101: Login Form	/login
R102: Login Action	POST /login
R103: Logout Action	POST /logout
R104: Register Form	/register
R105: Register Action	POST /register

Module M02: Post

Web Resource Reference	URL
R201: Add Post Form	/addpost
R202: Add Post Action	POST /addpost
R203: View Post	/post/{id}
R204: Delete Post Action	DELETE /post/{id}
R205: Edit Post Form	/editpost/{id}
R206: Edit Post Action	PUT /editpost/{id}
R213: Homepage	/home
R214: Filter Homepage posts API	GET /api/home/{homepageFilters}

Module M06: Static Pages

Web Resource Reference	URL
R601: Get About Page	/about
R602: Get FAQ Page	/faq
R603: Get Support Page	/support

2. Prototype

The prototype is available at http://lbaw2123.lbaw-prod.fe.up.pt/.

Credentials:

* Regular User: ssmoote1/12345

The source code can be found at https://git.fe.up.pt/lbaw/lbaw2021/lbaw2123/.

Revision history

Changes made to the first submission:

1. ...

GROUP2123, 03/05/2021

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