

# Django Mandatory Assignment – Library System

2<sup>nd</sup> semester Web development 2020 – Lars ALBERT

## Project Introduction

The project is divided in two applications, the **library\_app** and the **user\_app**.

The **library\_app** contains the **Item** model, which is used for both the books and magazines using the **item\_type** field to identify one or another.

To have a history of previously loaned items, **library\_app** also has the **ItemLoan** model, which is used for creating a relation (using foreign keys) between the Django native **User** model and our custom **Item** model. Additionally, there are two fields, **returned\_timestamp** and **loaned\_timestamp** to know when the item was loaned and returned.

The **views.py** and **urls.py** inside **library\_app** only function is to return a full list of all items, regardless of the type. Everything else, loaning, returning, managing is done within the **user\_app** application.

The **user\_app** application then handles:

- loaning an item
- returning an item
- profile, where the logged in user can see all his/her loaned and returned items
- sign up
- log in
- reset password
- administrator, where logged in user with "staff" privileges can access an Administrator page to view not yet returned books and days left.

Notes: In order to use the system, you need to be logged in. The items are added via Django's Admin Area. "Staff" users need to be created inside the CLI. Normal users are created using the sign up page.

## E-R Diagram

