Distributed Systems Programming
A.Y. 2023/24

Exam Assignment for Exam Call on 28/06/2024

Deadline for submission: 25/06/2024 EOD

Extend the REST APIs of Laboratory 1, by introducing a *like* mechanism that works according to the following specifications:

1. Authenticated users can assign *likes* to public films, where a *like* represents the fact that the user liked a specific film.
2. An authenticated user can assign at most one *like* to each public film.
3. An authenticated user can remove a *like* that they previously assigned to a public film. Afterwards, that authenticated user can re-assign a *like* to that film.
4. All users can view the total number of *likes* assigned to a public film and the list of users who liked it, even without authentication.

Extend the implementation of the service so that it implements the extended REST APIs. Of course, the database must also be extended accordingly. Note that it is not required to extend the REACT client. Test the extended REST APIs by using a client like Postman.

Submit the updated solution, including all the following items:

- All the json schemas
- The full Open API documentation of the REST APIs, including examples of JSON documents to be used when invoking the operations, and examples of invocations of the API operations, possibly as a Postman collection
- The REST APIs implementation code
- The database file, including some sample data
- README.md files that specify the contents of folders, the instructions on how to run the code from scratch and the main design choices made.

Important:

- Organize the project files as in the solution provided for Laboratory 1.
- The solution must work within the Labinf Ubuntu machines, with the software already installed in those machines.
- The solution will be tested by running it in the Labinf machines.
- The solution must be uploaded to a git repository for which you will soon get the credentials.