The title:

Developing a cross-platform application (epilemob: v 0.1) to register and monitor the dynamics of state for the epilepsy patient

Motivation: The strict monitoring of an epileptic patient's condition, particularly those who suffer from seizures on a regular basis, is crucial in formulating an effective treatment plan and adopting a healthy lifestyle to improve their health metrics. It is important to remember that epileptic seizures can differ substantially from one patient to the next, depending on the type of epilepsy, medication taken, and other external factors. As a result, the emphasis should be placed not only on quantifying the seizures, but also on characterizing their kind, duration, potential triggers, and current treatment regimen, as these aspects are crucial in optimizing the patient's treatment plan. A treatment that is effective for one sort of patient may be utterly inappropriate, or even detrimental, for another. A coordinated strategy is required for continuous monitoring of the epilepsy patient, which includes recording seizures and their characteristics.

Basic Capabilities:

User Management:

1. Log in
2. Register new user
3. Log out

Input Interfaces:

1. Patient Management: Register new patients
2. Doctor Management: Register doctors and associate them with patients (Note: A patient can have multiple doctors)
3. Seizure Information: Upload or import a seizure video for a specific patient, Record the time and date of the seizure, Select the anticipated type and cause of the seizure from a predefined list, and add comments if needed
4. Prescription Management: Store prescriptions, ensuring they are linked to the correct doctor and patient
5. Medication Management: Add medication information for a specific patient, including type, dose, and status (ongoing or stopped), along with date and time details. Note: For medications taken 1, 2, 3, or 4 times per day, users should be able to select, update, and reschedule times, as well as adjust dosages. Each medication entry should be linked to a specific prescription and doctor

Output Interfaces:

1. Seizure Statistics: Display statistics for a specific patient, including the number of seizures, time distribution throughout the day, and duration of seizures, either per day, week, month, year, or a user-defined period include information about any changes in medication during the reported period and analyze if the number and duration of seizures have altered over a predefined timescale
2. Seizure Videos: Provide the ability to view the video of each recorded seizure
3. Medication Statistics: Display information showing any changes in medication and its daily dosage
4. Data Export: Enable users to export specific statistics to Excel or PDF formats

The proposed developing platform:

Kivy: The Open-Source Python App Development Framework.

https://kivy.org/