Authentication service

We are building a university management system where we have three types of roles such as Admin , Student , Faculty.

Functional Requirements:

- **Student**

  - Student can login and log out
  - Student can manage and update their profile.
  - Student can update certain fields
  - Student can enroll in a semester.
  - Student can enroll in offered courses for a specific semester.
  - Student can pay their tuition fees through offline or online.(Partial / Full Payment)
  - Student can see their transaction histories.
  - Student can see their class routines.
  - Student can see their otice board and events
  - Student can see their result (Full / Semester Wise).
  - Student can evaluate their teachers.

- **Admin:**

  - Admin can log in and log out
  - Admin can manage and update their profile.
  - Admin can only update certain fields.
  - Admin can manage user accounts
    - Block/Unblock
    - Change Password
    - Forcefully Log out
  - Admin can manage multiple process:
    - Semester
    - Offered Courses
    - Section
    - Faculty
    - Student
    - Building

- ■ Room
- ■ Payment
- ■ Permissions
- ■ Activity

- **<u>Faculty:</u>**

  - ○ Faculty can log in and log out
  - ○ Faculty can manage and update their profile.
  - ○ Faculty can only update certain fields.
  - ○ Faculty can manage user accounts
  - ○ Faculty can manage student grades
  - ○ Access to Academic and Personal Information.
  - ○ Faculty can manage their lecture resources

<u>Models</u>

<u>Permission:</u>
- title

<u>UserPermission:</u>
- permissionId
- userId

<u>User:</u>
- Id
- **role**
- Password
- createdAt
- updatedAt
- studentId || adminId || facultyId

<u>Student:</u>
- id

- name
  - fisrtName
  - middleName
  - lastName
- gender
- dateOfBirth
- guardian
- contactNo
- emergencyContactNo
- email
- presentAddress
- permanentAddress
- department
- Subject

Admin:
- Id
- name
  - fisrtName
  - middleName
  - lastName
- gender
- dateOfbirth
- email
- contactNo
- emergencyContactNo
- department
- designation

Faculty:

- Id
- name
  - firstName
  - midleName
  - lastName
- gender
- dateOfBirth
- Email
- contactNo

- emergencyContactNo
- department
- faculty
- designation

API END POINTS:

- **User**:
    - users/create-student (POST)
    - users/create-faculty (POST)
    - users/create-admin (POST)
    - users/my-profile (GET)
    - users/:id (GET)
    - users/:id (PATCH)
    - user/:id (DELETE)
    - users/:id/force-logged-out
    - users?page=1&limit=10 (GET)
    - users/:id/available-permissions?page=1&limit=10 (GET)
    - users/:id/assigned-permissions?page=1&limit=10 (GET)
    - users/:id/assign-permissions (POST)
    - users/:id/remove-permissions (POST)

- **Student:**
    - students?page=1&limit=10 (GET)
    - students/:id (GET)
    - students/:id   (PATCH)

- **Faculty**:
    - faculties?page=1&limit=10 (GET)
    - faculties/:id (GET)
    - faculties/:id   (PATCH)

- **Admin**:
    - admins?page=1&limit=10 (GET)
    - admins/:id (GET)
    - admin/:id   (PATCH)

- **Permission**
  - permissions?page=1&limit=10 (GET)
  - permissions (POST)
  - permissions/:id (GET)
  - permissions/:id (PATCH)
  - permissions/:id (DELETE)

- **Auth**
  - auth/login (POST)
  - auth/refresh-token (POST)
  - auth/change-password (POST)
  - auth/forgot-password(POST)
  - auth/reset-password (POST)