

CoSNU

Design and Planning

Members

Computer Science and Engineering

Jaebeom Lee, Jeehak Yoon, Jongbeom Kim, Seunghyeon Jo

System Architecture

MVC

View
Main
Sign Up
Sign In
Lecture Board
View Article
Write Article
Modify Article
Edit Profile

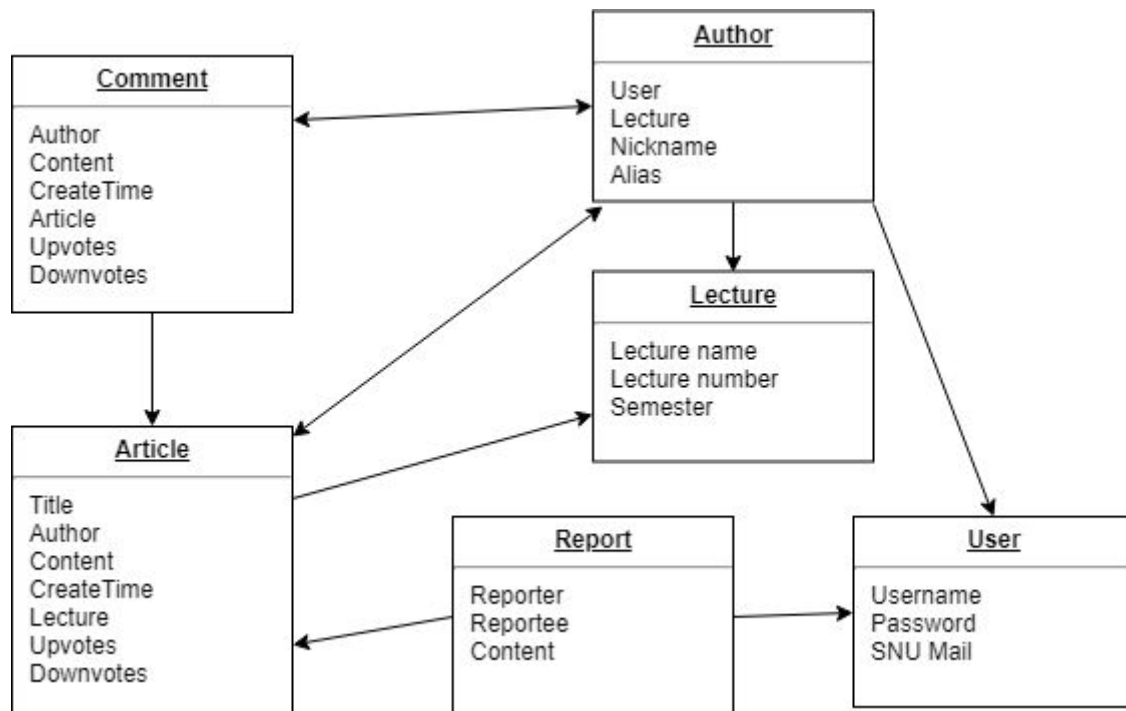
<- react-redux-saga->

<- django rest ->

<- django model->

Model
User
Participate
Lecture
Article
Comment
Report

Model



1. User
 - a. Username
 - b. Password(encrypted)
 - c. SNU Mail
2. Author
 - a. User (Foreign Key)
 - b. Lecture (Foreign Key)
 - c. Nickname
 - d. Alias
3. Lecture
 - a. Lecture name
 - b. Lecture number
 - c. Semester
4. Article
 - a. Title
 - b. Author (Foreign Key)
 - c. Content
 - d. Create Time
 - e. Lecture (Foreign Key)

- f. Upvotes (Many-to-Many field with Author)
- g. Downvotes (Many-to-Many field with Author)

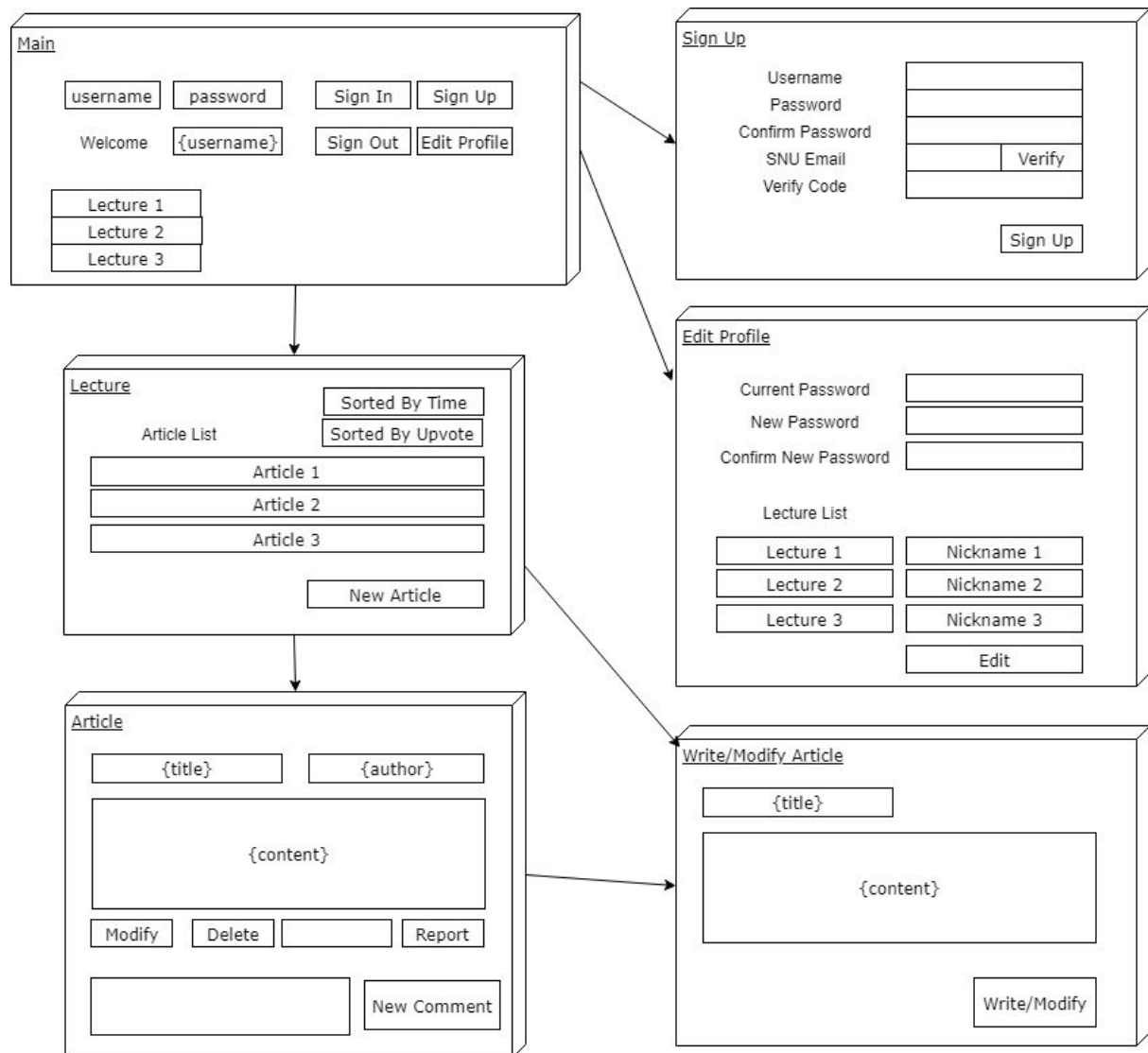
5. Comment

- a. Author (Foreign Key)
- b. Content
- c. Create Time
- d. Article (Article Foreign Key)
- e. Upvotes (Many-to-Many field with Author)
- f. Downvotes (Many-to-Many field with Author)

6. Report

- a. User (Foreign Key)
- b. Article (Foreign Key)
- c. Content
- d. Create Time

View



1. Main
 - a. Sign Up : Button
 - b. Edit Profile : Button
 - c. My lecture list
 - d. Username : Input(text)
 - e. Password : Input(password)
 - f. Sign In : Button
2. Sign Up
 - a. Username : Input
 - b. Password : Input(password)
 - c. PasswordCheck : Input(password)
 - d. Email : Input(email)
 - e. Verify code : Input
 - f. Sign Up : Button
3. Boards in Lecture

- a. Lecture
- b. Article List
- c. Write article : Button
- d. Sort by (Most Upvoted / Latest)
- 4. Article
 - a. Title
 - b. Content
 - c. Upvote & Downvote
 - d. Report : Button
 - e. Delete : Button
 - f. Comments
 - g. Write Comment : Input(text)
 - h. Post Comment : Button
- 5. Edit Profile
 - a. current password : Input(text)
 - b. new password : Input(text)
 - c. confirm new password : Input(text)
 - d. nickname of each lecture : Input(text)
 - e. Update Profile : Button
- 6. Write Article
 - a. Title : Input(text)
 - b. Content
 - c. Post Article : Button

Frontend Design

- 1. Main
 - a. Sign Up (Button) : Redirect to Sign Up page
 - b. Edit Profile (Button) : Redirect to Edit Profile page
 - c. My lecture with link : Show Lecture List and Redirect to each Lecture page.
 - d. Username (Input)
 - e. Password (Input)
 - f. Sign In(Button) : Use Django's default feature
- 2. Sign Up
 - a. Username (Input)
 - b. Password (Input)
 - c. PasswordCheck (Input)
 - d. Email (Input)
 - e. Verify code (Input)
 - f. Sign Up (Button) : Call Backend API(/user/ POST)
- 3. Boards in Lecture

- a. Lecture
 - b. Article List
 - c. Write article (Button) : Redirect to Write Article page
 - d. Sort by (Most Upvoted / Latest) : Show Article list with selected order.
4. Article
- a. Title
 - b. Content
 - c. Upvote & Downvote (Button) : Call Backend API(/article/:id/vote POST)
 - d. Report (Button) : Call Backend API(/article/:id/report POST)
 - e. Delete (Button) : Call Backend API(/article/:id DELETE)
 - f. Comments
 - g. Write Comment : Input
 - h. Post Comment (Button) : Call Backend API(/article/:id/comment POST)
5. Edit Profile
- a. current password : Input(text)
 - b. new password : Input(text)
 - c. confirm new password : Input(text)
 - d. nickname of each lecture : Input(text)
 - e. Update Profile (Button) : Call Backend API(/user/ PUT)
6. Write Article
- a. Title : Input(text)
 - b. Content
 - c. Post Article (Button) : Call Backend API(/article/:id PUT)

Backend Design

RESTful API

Name	API	GET	POST	PUT	DELETE
User	/user/	Get Info with Lecture List	Sign Up	Modify Info	X
Lecture	/lecture/:id	Get Info with Article List	Write Article	X	X
Article	/article/:id	Get Article Contents with Comments	X	Edit Article	Remove Article
Article Vote	/article/:id/vote	X	upvote or downvote	X	X
Article Report	/article/:id/report	X	Report Article	X	X

Add Comment	/article/:id/com ment	Get Comment List	Write Comment	X	X
Comment	/comment/:id	X	X	X	Delete

Implementation Plan

In 2nd iteration, We will implement login, main page(lecture list), article lists, write article feature.

In 3rd iteration, We will implement signup, up&down votes and comments.

In 4th iteration, We will implement remaining features and extensions.

Testing Plan

We will test our frontend with jtest library.

No test planned for backend now.