COMP229 – Web Application Development

Assignment 3

Portfolio Application – Integrating the Frontend to the Backend APIs, CRUD Operations, React Forms, React State Management.

Due Week #11.   **Maximum Mark: 100**

Overview: Integrating the Backend APIs to the Frontend ensuring state management, connecting the Frontend and backend, performing CRUD Operation at the Frontend for all models of the backend. Students should at this stage have a working Full Stack Portfolio Application.

Note: This assignment assumes your backend meets all the requirements of Assignment 02. If your backend is incomplete or requires fixes, you must address those issues to ensure full frontend functionality.

Instructions:

Your **Portfolio Frontend Application** must include the following:

1. **Forms and Pages:**
   o Create forms to add and edit users, projects, services, and contacts.
   o Create pages to list and delete users, projects, services, and contacts.
2. **React and State Management:**
   o Use React forms with appropriate state management (e.g., useState, or useReducer).
3. **API Integration:**
   o Consume backend APIs to perform all CRUD operations above.
   o Ensure all frontend entries are stored in the database, through the backend.
   o Ensure all frontend data are retrieved from the database, through the backend.
4. **Quality Assurance:**
   o Ensure your application is error-free and functions as expected. Apps that crash will be graded with zero.
5. **Version Control:**
   o Push your code to GitHub. The code in the Zip file must match the code in the repository.

SUBMITTING YOUR WORK

Your submission should include:
1. A zip archive of your Frontend Portfolio Project files.
2. A zip archive of your Backend Portfolio Project files.
3. A link to GitHub of your Frontend Portfolio Project.
4. A link to GitHub of your Backend Portfolio Project.
5. A link to your Live Frontend Portfolio Project hosted on a Cloud Provider. (Penalty 10%)
6. A link to your Live Backend Portfolio Project hosted on a Cloud Provider. (Penalty 10%)

This assignment weighs **5%** of your total mark for this course. Late

submissions:20% deducted for each day late.