Phase2End Project-Cred Verify Specification Document

Developer: Melvin Wu, Junior Developer for HCL America

GitHub Repository Link: https://github.com/MelvinWuHCL/Phase2EndProject-CredVerify

Project Details:

Cred Verify is a simple user login and registration project. Existing users can login and new users can register with their email, name, and password of choice.

When the user starts the application, a page will pop up with two links that redirect the user to a login page or a registration page.

The login page will ask for the name and password. Users will input their name and password. If users successfully login then they will be redirected to a home page. If unsuccessful in logging in a message will pop up stating that the login was unsuccessful.

The registration page will ask for the user to input a name, email, and password to be put into the database. Once user provides the information then an entry is created. If successful, then the user will receive a message stating that the registration was successful. If unsuccessful, then a message will pop up stating that registration was unsuccessful.

Sprints:

Sprint#	Task	Duration	Status	Date & Time
1	Set up basic functionality	4 hours	Completed	3/10/2021 10:00AM – 2:00PM
2	Set up basic functionality	4 hours	Completed	3/10/2021 5:45PM – 9:45PM
3	Debugging	2 hours	Completed	3/11/2021 6:00PM – 8:00PM
4	Debugging	3.25 hours	Completed	3/12/2021 10:15AM – 1:30PM
5	Debugging	1.25 hours	Completed	3/12/2021 5:45PM – 7:00PM

Technologies Used:

- Eclipse Enterprise IDE
- Apache Tomcat 9.0
- MySQL WorkBench
- Maven
- Java
- Java Servlets
- Hibernate
- Xml
- Javascript

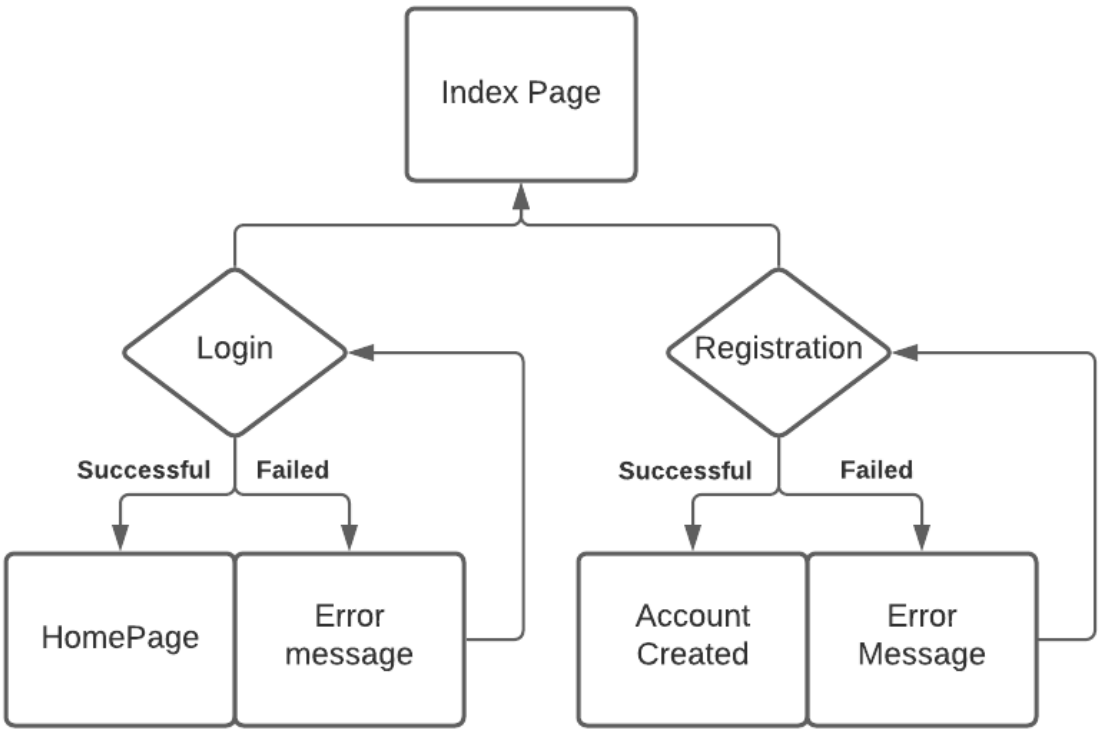
Algorithms:

- doGet() – gets information from server
- doPost() – posts information into server
- sessionFactory() – interface that contains database property details
- entities – represent table components

Core Concepts:

- Servlets
- MySQL statements
- MySQL database
- DAO
- XML
- Connecting to server
- Dynamic Web Programming
- Classes
- Interfaces
- Lists

Flowchart:



Data Layers:

DDL: Project does not create, alter, drop truncate, comment, or rename anything in database

DML: Project does select from table (login, check if user exists) and insert into table (register)

DCL: Project does not grant or revoke

TCL: Project does not commit, rollback, savepoint, or transaction

Only used one table to store user information

User Table:

id	name	email	password
1	sample	sample@sample.com	sample
2	user	user@sample.com	user
3	hi	hi@sample.com	hi
4	helloworld	helloworld@sample.com	helloworld

```
`id` INT NOT NULL AUTO_INCREMENT,
 `name` VARCHAR(255) NULL,
 `email` VARCHAR(255) NULL,
 `password` VARCHAR(255) NULL,
 PRIMARY KEY (`id`));
```

Conclusion:

The current version of the Cred Verify project is a functioning prototype with bare minimal styling. This simple program allows client users to perform logging in to a landing page and registering into a database. The current prototype meets the criteria listed.