The project will include

* The ability for a student to create an account using their Matric ID and login using the credentials.
* The accounts will be authorize when logging in for security purposes.
* A web-based application that gives the ability to an administrator to create and delete account and also create and delete course.
* The functionality for student to submit tasks in a given link made by a lecturer which can then be view and graded by the lecturer.
* The functionality for a lecturer to post the meeting link for an online class room which will direct to an external website or application.
* Student and lecturers will be able to interact with each other in a page called “chatroom”.
* Student and lecturer can both view the courses they are enrolled or assigned to.

The project will exclude:

* A help menu that contain the Frequently Asked Question (FAQ).
* The functionality of a lecturer to self registered an account when using UTMOne system.
* The functionality for students to take their attendance.
* The functionality for students to attend the online class in the application itself. UTMOne will be using an external website such as Webex for the online class.
* The training for end-users to use the application.
* The ability for a student to create more than one account.
* The ability for a student to delete or insert a course that they wish to take.

| **Milestones** | | **Description** | **Milestone Criteria** | **Planned Date** |
| --- | --- | --- | --- | --- |
| M0 |  | Proposal |  | <2020-10-26> |
|  |  | Project identification and objectives defined | -Stakeholder identified  -Problem is analysed  -Task-breaking between team members  -Proposed application is explained  -Proposal reviewed | <2020-10-26> |
| M1 |  | Software Project Plan |  | <2002-11-07> |
|  |  | Project planning | -Scope and concept described  -Resource planning and milestone described  -Backlogs and sprint is decided | <2020-11-07> |
| M2 |  | Sprint 1 |  | <2020-11-11> |
|  |  | 1st iteration  First deliverable and report | For the following modules:   1. Module Login 2. Module Assign Task 3. Module Create Course   -Requirement analysed  -Front-end and back-end is developed  -Received feedback  -Documentation for 1st version of the application is formed | <2020-11-11> |
| M3 |  | Sprint 2 |  | <2020-11-29> |
|  |  | 2nd iteration  Second deliverable and report | For the following modules:   1. Module Create Account 2. Module Delete Account 3. Module Submit Task 4. Module Delete Course 5. Module View Course   -Requirement analysed  -Front-end and back-end is developed  -Received feedback  -Documentation for 2nd version of the application is formed | <2020-11-29> |
| M4 |  | Sprint 3 |  | <2020-12-13> |
|  |  | 3rd iteration  Third deliverable and report | For the following modules:   1. Module Chatroom 2. Module Meeting Links 3. Module View Task 4. Module Grade Task 5. Module Update Course   -Requirement analysed  -Front-end and back-end is developed  -Received feedback  -Documentation for 3rd version of the application is formed | <2020-12-13> |
| M5 |  | Sprint 4 |  | <2020-12-27> |
|  |  | 4th iteration  Fourth deliverable and report | -Final completion of all the modules and code  -Received feedback  -Documentation for the 4th version of the application is formed | <2020-12-27> |
| M6 |  | Project Integration and Completion |  | <2020-01-10> |
|  |  | Validation and verification of product | Product system tested, documentation reviewed | <2020-01-10> |
| M7 |  | Release Product |  | <2020-01-24> |

| **Item** | **Applied for** | **Availability by**  **<Milestones>** |
| --- | --- | --- |
| **Methods** |  |  |
| Use Case | Requirements capturing | <M2><M3><M4><M5> |
| Activity Diagram | Requirements capturing | <M2><M3><M4><M5> |
| Sequence Diagram | Requirements capturing | <M2><M3><M4><M5> |
| Domain Model | Requirements capturing | <M2><M3><M4><M5> |
| Component Diagram | Requirements capturing | <M2><M3><M4><M5> |
| Package Diagram | Requirements capturing | <M2><M3><M4><M5> |
| **Tools** |  |  |
| Flutter | Front-end development | <M2><M3><M4><M5> |
| Laravel | Back-end development acting as framework | <M2><M3><M4><M5> |
| Enterprise Architecture | Design for diagrams | <M2><M3><M4><M5> |
| Visual Studio Editor | Coding | <M2><M3><M4><M5> |
| Laragon | Building and managing web application | <M2><M3><M4><M5> |
| Trello | Schedule tracking | <M0><M1><M2><M3><M4><M5><M6> |
| **Languages** |  |  |
| UML | Design for diagrams | <M2><M3><M4><M5> |
| Java | Coding for the functionality of the application | <M2><M3><M4><M5> |
| Dart | Front-end mobile development using flutter | <M2><M3><M4><M5> |
| JavaScript | Front-end web development | <M2><M3><M4><M5> |
| CSS | Web interface design | <M2><M3><M4><M5> |
| PHP | Back-end development using laravel | <M2><M3><M4><M5> |
| MySql | Database | <M2><M3><M4><M5> |