## Lab Six

DDL and DML

CS1103, 2021F

## **Learning Outcomes**

At the conclusion of the lab, students should be able to

- Create tables in MySQL, including primary key, foreign key and check constraints
- Insert data into the tables.

## **Exercise**

- Use your personal database for this: use <username>;
- Create Students and Enrollments tables as per the Lab Notes document
- Create a Courses table
  - o Primary key is Courseld an integer which is to be generated
  - Other attributes include: course Number (e.g. CS1103), courseName, courseDescription, and creditHours
  - o make sure that credit hours is within the range of 0 to 6 and has a default value of 3
- Use Insert (or Delete) statements to test your constraints.
- Add an approvedDate attribute to the Course table
- Use Insert (or Update) statements to add (or update) data to the table with the extra attribute
- Write and run an SQL statement that for each student lists the information for courses they've taken and their letter grade.

Note: While CHECK constraints are implemented in MySQL in the current version (8.0), it isn't in our version (5.5). Live in hope and do the tests anyways.

## **Submission**

Before the due date for this this lab, students should submit online to the Ims

- The word-processor report as a pdf file, containing
  - 1. the SQL/DDL necessary to create the 3 tables as well as
  - 2. a transcript of the exercise activities and evidence of testing results.