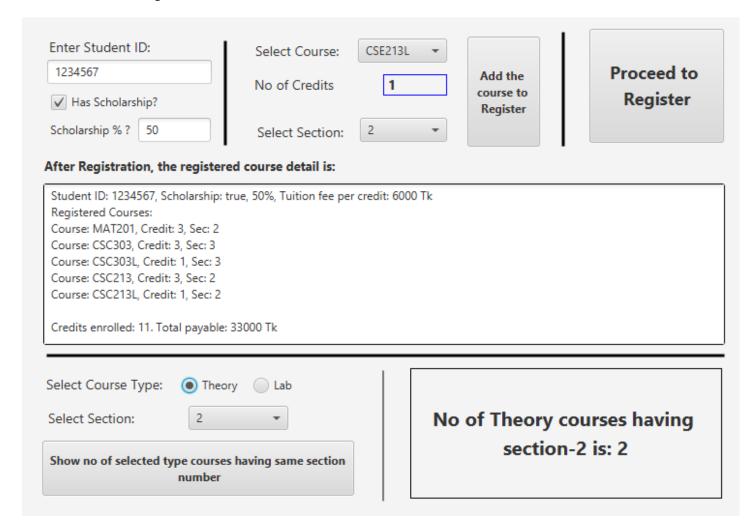
Mid Term Exam, Spring 2023 SET-A

## Total Marks: 100; Duration: 90 minutes

Create a NetBeans project with the name: "Midterm\_yourld\_secNo". Ex: "Midterm\_1234567\_sec1" Now, consider the following MidExamScene.FXML scene:



## Note:

- You need to add 10 courses in course ComboBox
- When a course is selected from ComboBox, its predefined credit hour is automatically shown below in a label
- If scholarship CheckBox is unchecked, then the Scholarship % is by default zero. If scholarship CheckBox is checked, then the Scholarship % Can't be zero
- Section nos can be 1 to 30 only
- Student class private fields: int studentId; boolean hasScholarship; int scholarshipRate;
- RegisteredCourse class private fields: String courseId; int courseCredit, section;
- ArrayList<RegisteredCourse> registeredCourseList is a private field of the controller class. A Student instance tempStud is also a private field of the controller class

Now, using above description, implement a NetBeans FXML project meeting following criterion:

Requirements  1) Fully implemented model class: Student  Mark for declaring fields with scope & qualifier  Mark for defining constructors, getters, setters, toString		Marks 5 5
3) Fully designed MidExamScene.FXML file with required fx:id s and event handler methods  Mark for Design  Mark for specifying required fx:id s and event handler methods		10 5
4) Fully imple	emented MidExamSceneController class as follows:	
4.1) Appropriate initialize method		10
•	ng "Add" button will trigger RegisteredCourseButtonOnClick() handler method to do the following:	
0	It will create a new <b>RegisteredCourse</b> instance using user input/selection and add the instance to <b>registeredCourseList</b> . User can click this button and add as many courses as needed.	10
0	While adding the first course (If registeredCourseList is empty), instantiate <b>tempStud</b> with student id, scholarship status & scholarship percentage. Make sure that if scholarship is true, then % can't be zero.	5
	ng "Proceed to Register" button will trigger redToRegisterAndShowRegInfoButtonOnClick() handler method to do the following:	
0	It will show the registration details using <b>tempStud</b> and <b>registeredCourseList</b> into <b>regInfoTextArea</b> , as per the format shown in the screenshot.	15
0	You MUST check that the no of credits enrolled is between 6 and 18 credits. However, if the student is enjoying scholarship, then the range must be between 12 and 18 credits.	10
•	ng "Show No of" button will initiate  TotalNoOfCoursesButtonOnClick() handler method to do the following:	
0	It will browse the <b>registeredCourseList</b> to find the total no of courses of selected course-type having selected section-no, and show it in the label as shown in the screenshoot	15