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CSC 354

11/29/2015

Use Case Scenarios

14.) The system will be able to compute what courses the student needs to retake

The student and/or advisor will click on the link to show what courses the student/advisee needs to take again if any. The system will first retrieve the student's grade information from the student database. Then the system will go through all the courses the student has completed and received a grade for. The system will retrieve the course information from the course database for each course that has been completed. In the course database, the system will first verify whether the course is a graduate course or undergraduate course. Graduate courses and undergraduate courses have different grading procedures and will need separate testing. If the course is an undergraduate course, the system will need to address the student's major check sheet to see which category the course falls under. If the course is an ungraduated required course, major elective or concomitant course, the student can have a grade no lower than a D. If the student fails the said course, the system will inform the student/advisor that the class needs to be taken again. If the course is an elective, the system will only show a suggestion to the student/advisor that the course needs to be taken again if the student has failed the course. If the course is a graduate course, the student can have a grade no lower than a C. If the student has a grade lower than a C, the system will inform the student/advisor that the class needs to be taken again. If the student has yet to take any classes, the system will not compute anything and inform the student/advisor that they do not have any classes to retake. If all of the student's grade are above or at the minimum, the system will inform the student/advisor that they do not have to retake any classes. All classes that the student withdraws from is counted as failed and the system will inform the student that the class needs to be taken again.

15.) The system will be able to compute a course sequence from any particular term to the end of the program

      The student will click on the link to compute a course sequence. The student can choose a start term from the drop down menu that shows the list of available terms. Once the student has selected a term, they must click the 'compute sequence' button to continue and generate a course sequence. Once the 'compute sequence' button is pressed, the system will retrieve the student's grade information from the student database and course information from the course database. The system will follow the guidelines of the student's chosen major's check sheet. First the system will calculate the requirements of the major that have already been completed by the student if any at the desired start term. The system will then populate the course sequence for each term up to a combined (3) major required or major elective courses. The major courses will be the lowest major courses available that were not already completed and the prerequisites are met. Major required or elective courses that the student has failed do not count as completed and will be scheduled again as soon as possible. The remaining spots available in the sequence will be filled with general education and concomitant courses that are the lowest course available that the student has met the prerequisites for and meet the requirements for the distribution sections that have yet to be filled. The competencies across the curriculum will have priority over the other distribution sections and will first be populated by major courses and then filled by general education classes. This will repeat until all the classes needed are a part of the course sequence. Once the course sequence computation is completed, the system will present the course sequence in a tabular manner to the student. From there the student may modify the course sequence, save the course sequence or start again. If the student tries to leave or close the page, the system will ask the student if they want to save the course sequence. Pressing yes will save the course sequence. Pressing no will discard the course sequence.

16.) The system will allow an adoption of the course sequence

Once a student has gone through the steps to create, compute and modify a course sequence, the system will allow the student to adopt this course sequence. Once everything is to the student's liking, the student can press the 'adopt course sequence' button to progress further. The system will first check if the course sequence matches the student's major before the adoption. An adoption of a course sequence can only be in the student's major. If the course sequence is not in the student's major, the system will inform the student that the course sequence is not in their major and cannot be adopted. If the course sequence passed the major check, it will first be saved to the student's data file. There can only be one adopted course sequence at one time per student. Adopting a new course sequence overrides the previous one. If the student tries to adopt a new course sequence and they already have an existing course sequence, the system will inform the student that they already have a course sequence and will ask them how to proceed. The options available to the student are continue and override the previous course sequence or do nothing and go back to viewing the prototype course sequence. When adopting a course sequence, the system will automatically register the student for courses according to their course sequence. This will continue until the student has completed their program and graduates or chooses to delete their adopted course sequence and register manually. If the student chooses to delete their adopted course sequence, the system will ask if the student really wishes to do that and doing so will mean that they have to manually register for courses or adopt a new course sequence. If the student clicks 'yes' the system will delete the adopted course sequence from the students file. If the student click 'no' the system will do nothing and go back to what the student was doing before.

17. The system will allow modification of the course sequence

Once the student has successfully created a course sequence in their preferred major, the system will give the student the option to modify the course sequence to his/her liking. The student can modify all courses in a particular term/semester to any other official university credit course that is in the course database and the student has met the prerequisites for. The course sequence in later terms will be updated accordingly if the student/advisor picked a course that was scheduled for a later time, fills the same distribution of the check sheet, or if competencies across the curriculum would no longer be complete. The update will replace courses in later terms by the means in use case scenario #15 starting from the updated term. Future terms will also be updated accordingly for the prerequisites met/not met because of the new course the student has chosen. Courses that the student has not met the perquisites for in a particular semester of the sequence will not be able to be selected and will not be available/shown for that semester. Courses that student has already took will be able to be taken again regardless of the grade up to a maximum of 3 times, however the system will adjust the course sequence for the course that is being taken again. If the course the student wishes to take has already been taken 3 times, the course will not be available to be chosen again in later terms. If the student wishes to take more or less than 15 credits in a semester, the system can accommodate a change in the number of credits for that particular semester. The system has an 'x' button along each course and a 'add course' button at the bottom of the semester. The student may have a maximum of 18 credits per semester. After 18 credits have been selected, the 'add course' button will disappear. The course sequence will be updated according to any change made in the number of credits in a semester, however future and previous unmodified semesters will remain at the default 5 classes in the semester. The student can save the course sequence at any time during the modification period. If the student

tries to leave or close the page, the system will ask the student if they want to save the course

sequence. Pressing yes will save the course sequence. Pressing no will discard the course sequence.