Title: Retro Game - Supplement

Start Date: Wednesday, 26 February 2014

Assessment Day: Wednesday, 11 June 2014

Assessable units of competency

ICAPRG527A - Apply intermediate object-oriented language skills
ICAPRG415A - Apply skills in object-oriented design

General description

You are to enhance your "Top-Down Shooter Retro style 2D game" from Retro Game Assessment.

You will create a range of documentation to represent the flow of your code and to help with development.

You will also get user feedback and add functionality with the addition of GUI to your game in the form of a menu and HUD.

The High scores will be saved into a database instead of a text file for better functionality. The high scores need to be sorted and represented in an appropriate manner.

You will need to conduct some testing of your game and your code – by getting others to play your game and record the feedback they give and determining improvements that could be made.

Test your code with break points and try / catch statements to find logic errors.

Knowledge and skills

Listed here is the knowledge and skills you'll be learning and on which you will be assessed.

- Interactive GUI
- Use of Databases
- Use of coding standards
- Testing code and finding logic errors
- Basic Play testing of games

Evidence specifications

This is the specific evidence you must prepare for and present on assessment day to demonstrate you have competency in the above knowledge and skills. The evidence must conform to all the specific requirements listed below.

1. Technical documentation
2. Debugging demonstration and testing report
3. High score database functionality
4. Implemented GUI
5. Implemented Object Oriented code

Your roles and responsibilities as a candidate

- Understand and feel comfortable with the assessment process
- Know what evidence you must provide during your assessment
- Take an active part in the assessment process
- Be ready for the assessment at the nominated time

Assessment instructions for candidate

METHOD OF ASSESSMENT

Assessment will be conducted by you personally presenting evidence that demonstrates your competence in a short interview with your assessor. The evidence you must prepare and present is described above in this assessment criteria document. Assessments will be conducted on a specific day recorded above in this assessment criteria document.

ASSESSMENT CONDITIONS

You will have approximately 10 mins to present your evidence that demonstrates your competence. It is your responsibility to be prepared. If you have forgotten something or made a small mistake you may correct it, however the assessor may choose to assess other candidates who are better prepared and return to you if time permits. Upon completion of the assessment you will be issued with feedback and a record of the assessment, which you will need to acknowledge that you have accepted the result. If you are absent on the nominated assessment day (without prior agreement or a sufficient documented excuse) you will be assessed as not yet competent.

GRADING

The assessment you are undertaking will be graded as either *competent* or not *yet competent*.

REASSESSMENT PROCESS

If you are assessed as being not yet competent you will receive clear, written and oral feedback on what you will need to do to achieve competence. You will have one (1) week to prepare your evidence for a reassessment. You will be given only one reassessment opportunity. If you are unsuccessful after your reassessment you will be required to attend an intervention meeting with your Head of School to discuss your progress.

REASONABLE ADJUSTMENTS

We recognise the need to make reasonable adjustments within our assessment and learning environments to meet your individual needs. If you need to speak confidentially to someone about your individual needs please contact your teacher.

Assessment rubric

This table defines exactly what is required to be successfully deemed competent.

Evidence	Definition of Competent for Practice production

1. Technical documentation	Technical documentation must consist of:
	• A Static class diagram
	• A Collaboration diagram or a sequence diagram
	• An activity diagram or state diagram
	• A UML document containing detailed:
	  ○ Class diagram
	  ○ Collaboration OR sequence diagram
	  ○ Activity OR state diagram
	• Code must be commented according to the AIE standards
	Technical documentation must be updated and refined as the project progresses, adapting to project specification and demands as they are met. This will be shown through Perforce version logs.

2. Debugging demonstration and testing report	You will demonstrate via your project code • Use of tracing code • Use of break points and step through • Exception handling (try - catch) – at least once Your testing report will show • User feedback – at least two comments from play testers with their names • Improvements – describe at least two improvements based on feedback
3. High score database functionality	Submitted project should demonstrate code that will • Extract, update and delete data stored in database – at least once • Manipulate database structure (Query, create and delete) – at least once • Maintain data integrity as the updates and deletes occur • Show high scores in a sorted manner
4. Implemented GUI	Submitted project should demonstrate code that • Displays text to the screen (score / etc.) – at least once • Responds to user input (menu / etc.) – at least once • Displays game play information (health / lives / etc.) – at least once
5. Implemented Object Oriented code	Submitted project should contain • A Release build executable • Multiple source code files • Use at least two collection of data (list / queue / set / stack / tree) • Read / write to a binary file – at least once • Overload a function –at least once • Overload an operator – at least once • Have a class use multiple inheritance – at least once