Project Status Report

Project Name: G4RCE Racing
Team Members: Cassandra Companion, Brian Louis, Stephanie Petronella, Garrett Sullivan

Date: 4/26/2020   Cycle Number: 3

System Intent: To develop a car racing game that delivers a fun and unique experience to users through granting the users customization choices and creative powers.

Cycle Intent: To refine the main features of the game and deliver a version of it that can be easily installed and run by users.

Accomplishments since the last status report:
- Mud and grass now slow down a race car that passes over it.
- Starting point objects have been added to each track to be used in the initial placement of cars.
- Tracks chosen in the menu are now loaded when pressing play
- Cars chosen in the menu are now loaded when pressing play
- The submenus have been improved

Obstacles encountered since the last status report:
- VM car movement is not updating with the game properly
- Multiple mud objects in a row causes a problem where the slow effect goes off when it should not
  - The solution seems to be to go from multiple rectangle objects to one polygon object per mud spot, but these polygon objects are not closing properly, so they are not working as desired

Risks facing the project:
- Delivering a game that looks and functions the same on different computers. Our particular issue is that different screen resolutions impact how the game appears on different computers.

Objectives for the next week:
- Use the position objects on the tracks to set a race car in the correct starting position
- Create functioning polygon objects to act as mud and continue tests for the mud feature
- Fix VM car movement

- Try using JUnit for the automated testing of features, namely the improved car motion feature and the menu aspect of the multiple track selection feature
- Export the game as an executable JAR file

User Features:

#	User Feature <*Short Name: Short Description*>	Planned			Actual		
		Cycle planned for completion	Total planned hours	Planned hours this cycle	Status (completed, discarded, in progress, unstarted, etc.)	Actual hours this cycle	Total actual hours this project
1	Interactable Game Menu: The user will be able to click on buttons that lead into other menus or into a race.	3	25	7	Code completed. Needs to be tested.	0	18
2	Timer: The user will be able to see the time they took to complete three laps.	4 (theoretically)	25	0	Coding has been paused because of dependen-cy on VM.	0	4
3	Car Motion Code: The user will be able to type in code given a set of possible commands, and a virtual machine will read this code.	3	60	15	Coding in progress. An obstacle was encountered (see above). Test suite is unstarted.	7	52
4	Mud Obstacle: Whenever the race car passes over mud on the track it will slow down.	3	35	4	Code works in some cases. An obstacle was encountered (see above). More testing needs to be done.	7	38
5	Waypoints: The user will not be able to cheat races by going backwards because there will be waypoints in the track's code.	4	20	0	Unstarted	0	0
6	Multiple Track Selection: The user will be able to choose from multiple tracks already made.	3	45	15.5	Different tracks can be selected in the game. Some coding and	8.5	38

#	Feature						
					testing left for getting the car to start in the right place.		
7	Lap System: Each track will have a set number of laps for determining that a player has completed a race.	3	20	19.5	Design documentation created. Code and test suite are not yet started.	0	.5
8	Improved Car Movement: The car will move more realistically.	3	35	11	Code completed. Test suite not yet started.	0	24

Team Actions:

	User Feature <**# only**>			Planned	Actual								
				Planned hours this cycle	Process hours		Product hours		Customer hours		Total hours	
Name	Coder(s)	Tester(s)	Reviewer(s)		Week	Cycle	Week	Cycle	Week	Cycle	Week	Cycle
Cassandra Companion	2, 6	8	2, 6, 8	36	0	3	5	9	0	0	5	12
Brian Louis	3	1, 7	3, 1, 7	36	0	2	7	13	0	0	7	15
Stephanie Petronella	4, 7	6, 3	4, 7, 6, 3	36	2	12.5	10	11.5	0	0	12	24
Garrett Sullivan	1, 8	4	1, 8, 4	36	1	11	8	8	0	0	9	19