SE306: Project 2 FINALChecklists

INSTRUCTIONS
Fill in the two checklists as per instructions below and the optional 'additional comments' section as required.

1. Game Features Checklist

> **Planned:** Indicate with a Y/N whether this feature was part of your initial project plan to completed by the final deadline.
> **Coverage by Prototype:** Indicate as a percentage (0-100% in increments of 5) the extent to which this feature had been completed by the prototype (e.g. 0% for not achieved, 50% for half-way, 100% for fully completed) compared to your initial plan.
> **Coverage by Final:** Indicate as a percentage (0-100% in increments of 5) the extent to which this feature has been completed by the final submission.
> **Rationale:** Briefly describe your rationale behind the indicated percentage achieved value by the final deadline (e.g. how can you say it is 75% achieved?) including any relevant examples/evidence.

2. Project ComponentsChecklist
Fill in the coverage (0-100% in increments of 5) the extent to which this project component has been completed along with the rationale.

3. Any additional features or comments(optional, as required.)

Team Name: TEAM UGSOFT **Game Name: SILENT NIGHT**

1. GAME FEATURES CHECKLIST

Features	Planned? (Y/N)	Prototype Coverage	Final Coverage	Rationale
BASIC FEATURES				
Central character/avatar design and functionality	Y	80%	100%	Changed the asset model for final to Santa helper girl (Query Chan) from prototype where it's just a default model (It was planned to be Santa himself, but we thought a helper would better suit our target audience)
Characters design and functionality (e.g. central character and/or enemies etc.)	Y	50%	100%	Added in rays to show character's sight and more characters with different behaviour such as sleep walking
Game world layout (e.g. with obstacles and path options)	Y	75%	100%	Added in breakable vases and the world for level 2 including secret and optional paths for more cookies. More keys added.
A scoring system (point/time)	Y	80%	100%	Reworked the scoring system to make it more time essential. Also added in different star calculation for level 2. Score for each level is calculated at end of level based on time, suspicion meter, and number of cookies collected
A player life system where lives can be lost/gained/maxed out (e.g. 3 lives max)	Y	100%	100%	Based on suspicion meter where the character moving will increase suspicion. Traps will increase

				suspicion more. Game is over if meter gets to full, acting as the player's life, and they have to restart
An achievement system (e.g. rewards unlocked based on player performance.)	Y	75%	100%	Add in more achievements such as complete level 2 and play a game of multiplayer. Achievements have colour when unlocked
A welcome screen (e.g. select a game, return to welcome screen and ability to start again.)	Y	100%	100%	Tweaked title to look better, including fonts and sizes. Also added a screen for player to enter their name when they first install the game
An exit screen (e.g. to congratulate player if finished all designed levels or to alert player to indicate game over.)	Y	100%	100%	Fail and success screens for end of level which allow players to replay or return to level select. If player succeeds, a score will be displayed and the player has an option to upload their score
Pre-designed, different levels of complexity	Y	30%	100%	Added level 2. Levels increase with difficulty. It contains more rooms, random movement and key spawns, and mechanics such as breakable vases and crouching behind sofa to avoid being seen
A clear game objective and level objectives (e.g. to get to the end of the level or get 100 points etc.)	Y	100%	100%	Deliver present for single player and collect most cookies for multiplayer. Tutorial hints in level 1 will tell the player the goal.
Some aspects of RNG (e.g. random item generation, enemy attacks, level generation.)	Y	75%	100%	Random movement of enemy characters, random choice of certain keys and cookie locations. Some people movement are random such as sleep walker.
Playtesting of all features within team.	Y	100%	100%	Tested all parts. Add more unit test, integration test, and acceptance tests.
Playtesting of all features by at least one other team.	Y	100%	100%	Test again with Team RGB at leech on Monday
DESIGN FEATURES				
Major UI redesign (e.g. customizable theme options) up to 10%	N	N/A	N/A	Not planned
A high score screen (and a mechanism for storing those high scores) allowing users to enter their name for the high score function. Up to 5%	Y	50%	100%	The player has their own high score per level. (Not including multiplayer level as game slightly different). On first install, game asks for their name. This is also used on the online leaderboard (mentioned later)
Adding sound/audio and triggering on appropriate events. Up to 10%	Y	100%	100%	Sound (for cookie, key, creaky floorboard and vase breaking) added after prototype and we have background music for the game.
Local Multiplayer +Leaderboard. 10%	N	N/A	N/A	Not planned
Online Multiplayer +Leaderboard. 10%	N	N/A	N/A	Online multiplayer is advanced

				feature and we also have an online leaderboard per level (claimed late as other/advanced)
Touch/Swipe/Tap functionality for those aiming to deploy to a smartphone: Make use of one sensor [worth 5%] or maximum two sensors [worth 10%]	N	75%	100%	Our game allows player to drag joystick andtap the run/crouch buttons. It also uses the phone vibration when the player fails. Swipe is implemented for level select screen and achievement screen. (We planned to have it for android so this was needed)
Fixed level generation. Up to 5%	Y	25%	100%	Focus on designing level 1 for prototype. For final we designed level 2 and multiplayer.
Random level generation. Up to 10%	N	N/A	N/A	Not planned
Monetisation options	N	0%	100%	We did this as we had some extra time and was persuaded by tutor and lecturer.
2.5D version of game. Up to 10%	Y	75%	100%	Designed game in 2.5D as planned (ie. 3D models but restricted camera angle)
3D version of game. Up to 20%	N	50%	50%	We planned for it to be 2.5D, although effectively all the models and animations are 3D. Not fully 3D due to 3rd person locked isometric camera view
Others – Settings allowing user to change sound and music volume. Brightness of game. Toggle snow and vibrate. Player name. Claiming 5%	N	0%	100%	We implemented settings to allow the user for customise the game to their preferences and to their environment (eg. vibrate, snow, lightning, sound). We decided to implement this as it makes our game more user friendly and user focus and is expected for any game. Player can also reset their data if they want to start over.
Others – Online leader board. Claiming 5%	Y	50%	100%	Online leader board implemented in addition to the local high score feature. There are separate leader boards for each level. User can choose to submit their score upon completing the level. Stored using Azure database and web service.
ADVANCED FEATURES				
Query Chan Online multiplayer PVP. Up to 8 players can join lobby. Claiming 10%	Y	0%	100%	Online real time multiplayer where Santa helper girls (Query Chan) fight for each other to collect the most cookies! We have a lobby at which players can join. When the suspicion meter overloads, the player respawns and loses 3 cookies. Please note, originally we were doing ghost mode in multiplayer so it is not real time but we changed to real time as it is more fun and

				competitive to play.
Describe here. Claiming X%	N	N/A	N/A	None Planned.

2. PROJECT COMPONENTS CHECKLIST

For the following component, rate overall coverage as follows: 0-25% poor; 25-50% somewhat adequate; 50-75% mostly good; 75-100% excellent

Project Components	Overall Coverage (0-100%)	Rationale
CODE QUALITY		
Coding Standards (e.g. naming conventions, formatting)	100%	On github we have the coding standards we follow. We also all use visual studio so it format the same way.
In-code documentation/commenting	90%	For non-trivial part of our code we have commented to allow other developers to know what been implemented and the logic of the implementation.
Commits and commit comments	100%	We have committed with good comments to help us know what changes were made.
DESIGN CONSIDERATIONS		
Levels are completable	100%	Levels are all completable within at most 5mins
UI and scoring system clear/intuitive and uses reasonable art/graphics quality	100%	UI is very easy to use and intuitive obvious as we use familiar icons. Scoring system based on stars and is comparable to similar android games
Not highly repetitive	100%	All three levels have different mechanics
Efficient resource consumption/performance	90%	We spend a lot of time make the 3D game run well on android devices so the performance is good
Adapts to different screen sizes (mention which ones.)	80%	We have tested out game in various devices. -Vodafone smart ultra 6, size: 5.5" -HTC ONE X, size: 4.7" -Sony Xperia z1 compact , 1280x720 pixels, 4.3" -Samsung galaxy s5, 5.1" -Samsung galaxy s3, 4.8" -Samsung Note 3, 5.7"
Design fits identified user-group (if used)	100%	Our game is targeted at high school student 12-18. Our main character is favoured by this age group and the game mechanics is appropriate for this age group.
TEAMWORK		
Balanced work break down	100%	We have break work down to task each week to everyone with equal proportion. Everyone does coding, design and documentation. Work breakdown is on Github Wiki
Team cohesion and spirit	100%	Everyone had good spirit and contributed a lot each to the project. We have only constructive discussion and no arguments. Everyone is happy.

PROJECT MANAGEMENT		
Implementing the Rational Unified Process as iterative and incremental planning, work, and delivery	100%	Each week we start a new iteration, hold planning and review meetings each weeks. Described on Project Management page of Wiki
Risk identification and management	100%	Weekly top10 risks identified every week for the three iterations.
DOCUMENTATION on Wiki (AKA FINAL REPORT)		
Clear mapping of student names withGitHubids	100%	All mapped since prototype
Individual contributions per week (e.g. clear list of things each team member contributed to every iteration/weekly)	100%	All individual have done their contribution each week and recorded it.
Teamwork and project management Approach (e.g. team meetings, how work was co-ordinated, merge/integration of code, risk management, etc.	100%	Github wiki contains a set of rules we follow when merging. We have weekly risks and management as well. Also tasks for every iteration are recorded.
Meeting Minutes	100%	Every meeting recorded on Github wiki
Asset descriptions (hand-made, modified, reused.)	100%	We have documented our use of assets on Github wiki.
Design Decisions (SoftEng and Game Design)	100%	Game design discussed on Github wiki.
Team Reflections on project (concept, execution), process (rational unified process) and how it fit the game development process, teamwork (what worked, what didn't, areas of improvement), what would you have done differently, future work ideas.	100%	Our team reflection is documented on Github wiki. We have iteration every week for our game so that we have a set of complete feature each week and can iteratively add more the next iteration.
MISCELLANEOUS		
Extent of Development/Scripting in Unity (e.g. work done from scratch compared to tweaking or use of pre-built components) where 0% means using all pre-built components and 100% means writing everything from scratch (its likely to be somewhere in between!)	75%	Some code is built in by unity or other tutorials. Most game logic and mechanics is implemented by UGSOFT. All code has been modified to suit our game's usage.
Extent of Graphics, Art, and Audio Development (e.g. developed by team members versus used from online resources) where 0% means using all ready-made media and 100% means developing all original.	25%	Most assets used are free assets we find on asset store. However some tweaking is needed when imported into unity such as colour, particle effects. Also we made the walls, doors and floor ourselves.

3. Any additional features achieved or any comments:

We have made more features then we planned.
Some are already listed above such as:
-Touch, swipe
-Monetisation
-setting menu
-online leader board for each level
Not listed above:
We have made a pause screen.

We also have spent a lot of time doing performance as we are deployed as a 2.5D game (3D physics, models and interaction) on to Android platform so it will require a lot of optimisation, as compared to deploying on pc where performance isn't really an issue due to the good hardware.

For testing we have done the following:
-Acceptance test
-Integration test using Unity test tools
-Unit test using Unity test tools
These are all documented on our github wikia under Testing

We cross tested with Team RGB.
Our review from them
-We felt their paid Google service looks good for their achievements
-Good variety of characters in their game
-Stats aspect of the RPG is great, similar to most RPG games, simple enough for a phone game

Their review for us
- Multiplayer was really good, gave us 10/10
- Good stealth game
-They like the female protagonist character
-Like the puzzles and challenges in each level