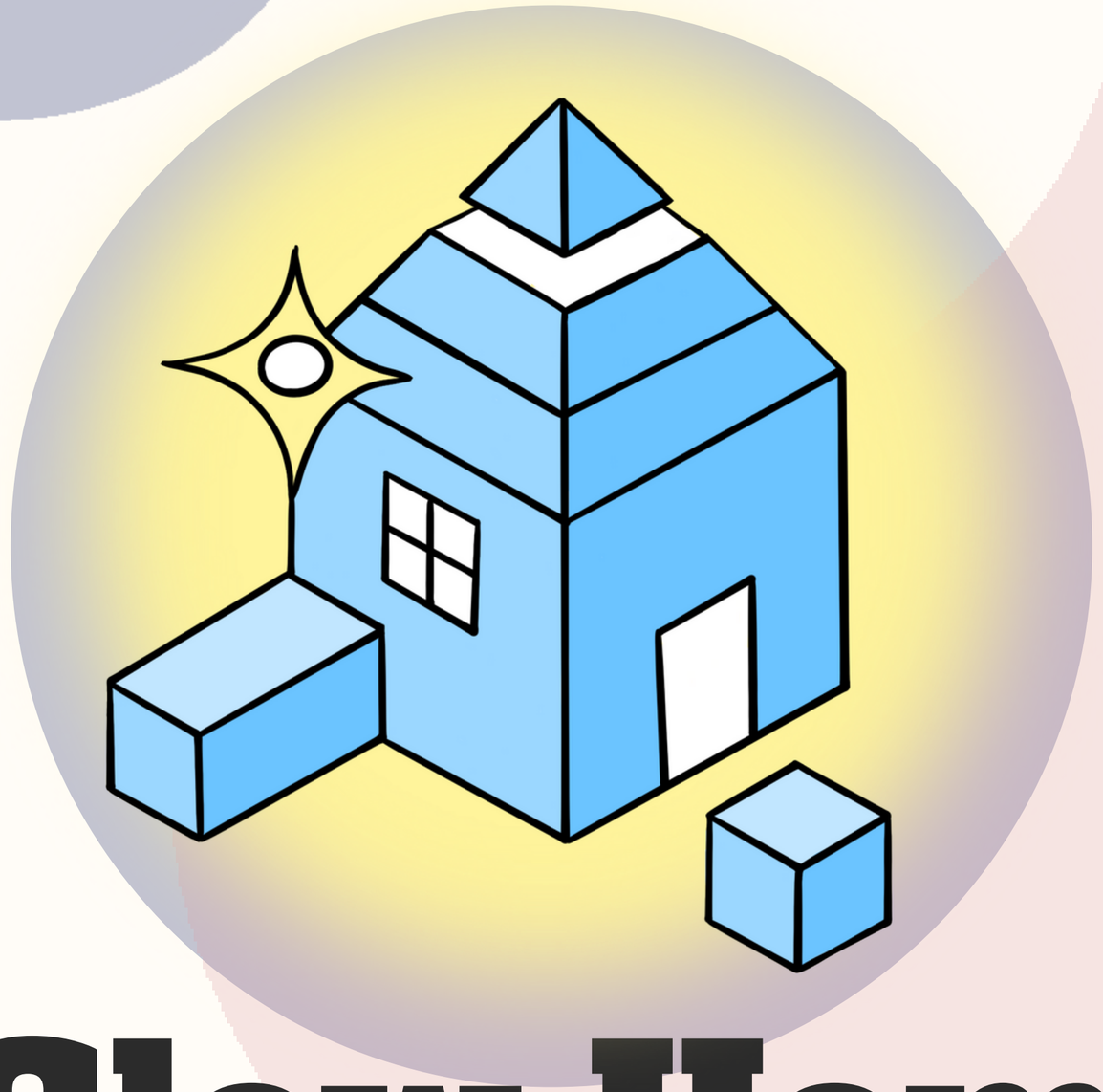


Glow Home

The Concept - Overview

Glow Home is a resource management game where the player acts as a home AI system attending to the needs of the homeowner by interacting with electronics and appliances.

They are limited to a select few electrical appliances they can interact with and must utilise to complete the daily tasks of their owner to be given greater access to devices and appliances.

Electronics can function in a variety of ways and must be learned to properly manage the specific needs of the homeowner.

Although there is great potential for further development of the prototype, the scope is limited to one room (kitchen), three interactable electronics (lights, toaster, kettle) each with a unique functionality/trigger, and one scripted homeowner.

The game has an orthographic viewpoint with a 3D low-poly art style.

The Concept - Audience

The audience for Glow Home is vast and relatively non-specific as the game is designed to be a casual play experience. But in that essence, casual players who enjoy simple control schemes, alternative concepts, and relatively relaxed gameplay environments would be a primary audience.

As the game takes many inspirations from *Unpacking*, a similar player base is the expected audience. The click-based controls with a basic concept and simple art style make the game very accessible for all players.

Glow Home is designed for the PC to allow a wide audience to play. It could realistically operate as a mobile game due to its simplistic control scheme, however the team is most familiar with the Unity system for 2D/3D games using the keyboard and mouse.

The Team

Roles & Responsibilities

Bi Wan Low (101814341)
Programmer

Jessica Harmer (103060612)
Audio Designer/Producer

Nicolette Zorbas (102614665)
Character Designer/Animator

Syed Faiyaz (102614665)
Environment Designer/Object Animator

The Mechanics

The primary mechanic that we are focused on is time-based object interaction.

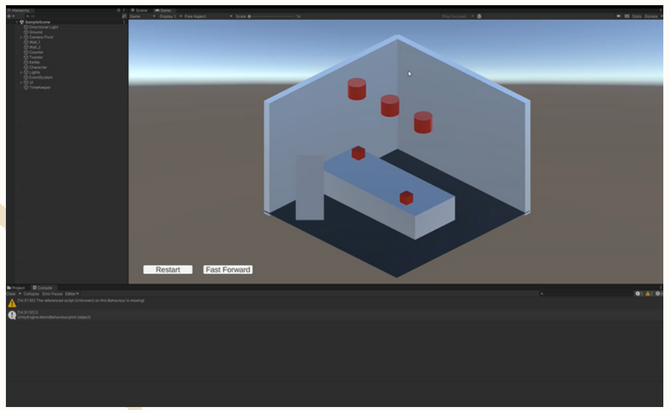
The three primary electronics that we are starting with are the lights, toaster, and kettle. Each object has a unique interaction and time-based sequence that needs to line up with the homeowner's schedule.

The lights are the most simple, being an on/off switch with an instant trigger.
These will be used the most frequently throughout the day and will be required each time the homeowner enters the room.

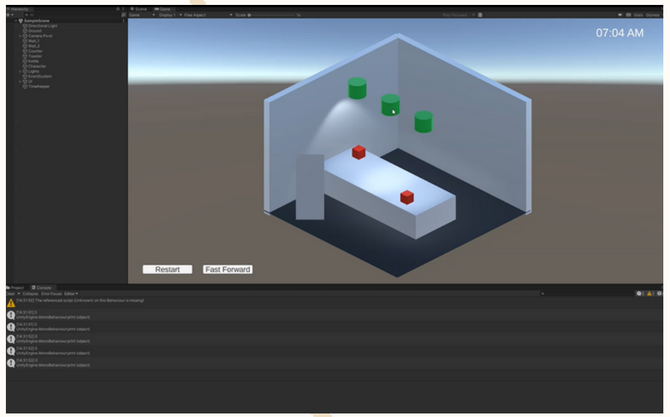
The kettle will also use an on/off switch, however there is a maximum value for the kettle (to indicate the water temperature) that will slowly decrease over time, and eventually hit zero, where it will need to be used again. However anywhere within that cycle the kettle can be switched on to begin it boiling again.

The toaster will act on a cooldown, and can only be switched on once and will complete its cycle after a number of seconds. The toaster may require multiple uses to achieve more toasted bread depending on the needs of the homeowner.

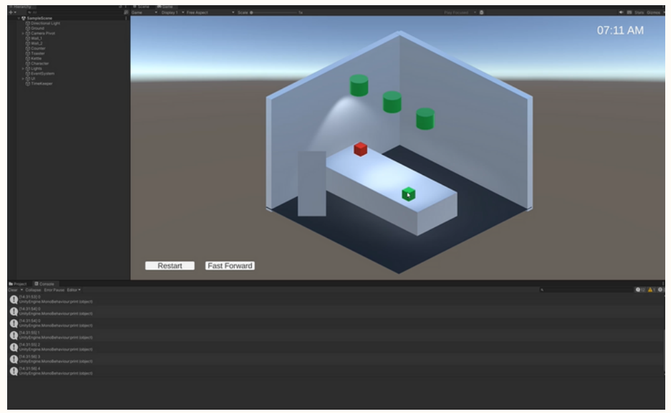
Mechanics - Appliances



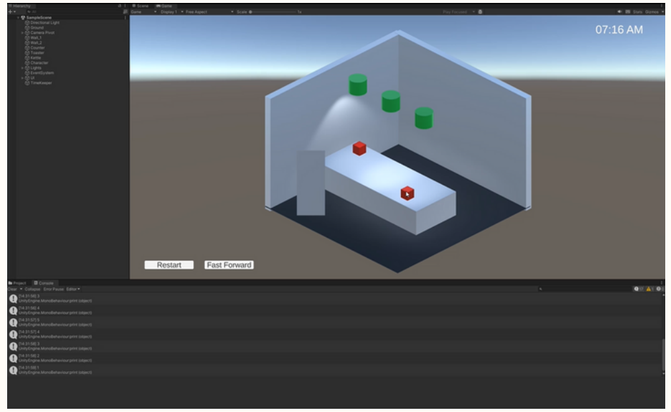
1. Blank starting stage



2. Lights switched on (click)



3. Kettle switched on (counter ticking upwards)



4. Kettle switched off (counter ticking downwards)

The Mechanics

The game will operate with task lists to indicate the levels of success of the day.

All tasks need to be done within a specific amount of time. Tasks will be listed at the start of the day, but remain reasonably generic (e.g. have the kettle boiled when I get coffee, have the lights on when I enter the kitchen).

The homeowner will enter a space near the appliances and wait for a short amount of time. If the task has not reached its completed state, the homeowner will complete the task themselves and the task will not be considered completed.

The player will need to complete a certain amount of these tasks to successfully complete the day. If the task needs are not met, the day will need to be repeated to progress.

The successful completion of a level would result in more appliances available and for the story to progress, however this build is limited to the one level.

The Mechanics

The homeowner will operate on a specific path for the day, dictated by the level and task list

The path will consist of a simple interaction with all objects in the kitchen, indicating breakfast. Throughout the day, the homeowner will return to the kitchen for various reasons, however not all require comprehensive player interference. The homeowner may enter the kitchen, look around, and leave. The player would only need to turn on the lights in that instance.

The amount of ‘random’ non-specified tasks given to the player will not have a quantity listed, so the player will need to continue to observe the homeowner throughout the day to achieve success.

The Task List

Environment Build

The kitchen environment (without interactive/animated elements).

- Base Kitchen Sketch
- Countertops & Cupboards
- Base Appliances (Inactive): Fridge, Bin, Door

IGame UI

The design & incorporation of the task-list & menus.

- Ui display
- Tasks listed
- Hidden success values/completion rates
- Options & Menu Screen

Interactive Appliance Incorporation

Adding the appliances for task completion.

- Create assets (toaster, kettle, lights)
- Scripting for various functions

Sound Design

The basic sounds required for the game.

- Background music
- Task done (partial and full)
- Appliance noises
- Homeowner: Footsteps, expression noise
- Basic click/select

Character Design

The tasks involved in the character design & animation.

- Character model
- Walk cycle
- Object interaction animation

Character Schedule

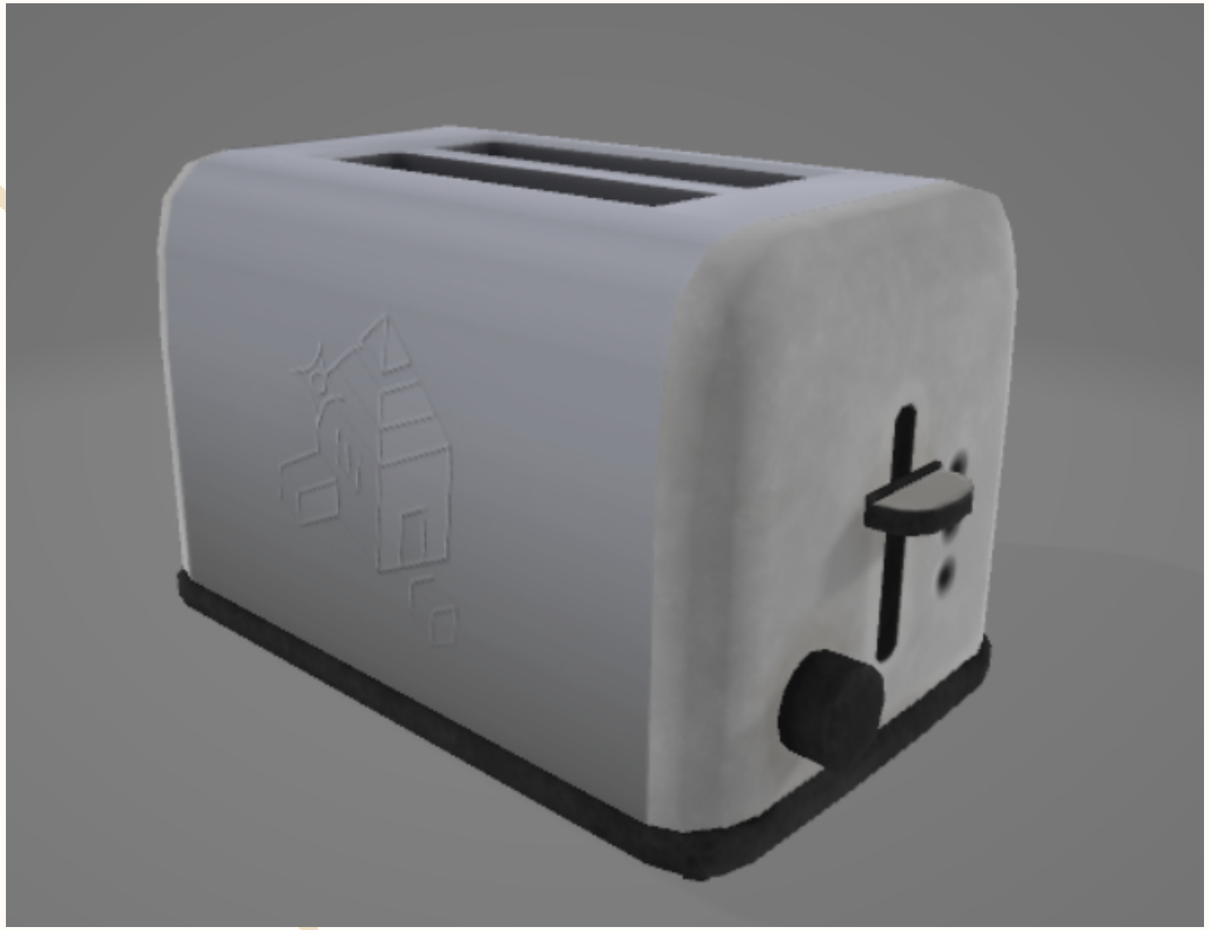
The level schedule of the character.

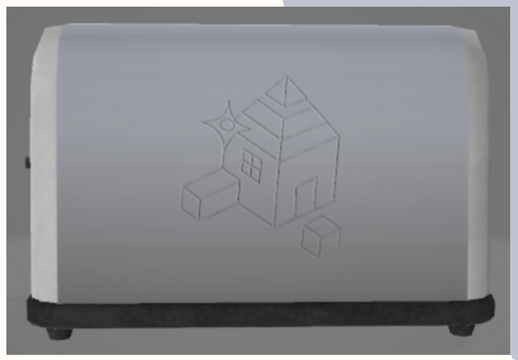
- Formulate schedule
- Test balancing of daily schedule & tasks
- Match to character animations

The Schedule - Timeline

Weeks	Bi Wan	Jess	Raad	Nic
Week 6	Begin Task List UI/Options Menu	Base Kitchen Sketch, SFX & Sound Research & Sourcing	Kettle & Lights Models, Toaster Animations	Source Character Model, Walk Cycle
Week 7	Implement Ui & Apply Scripts to Room (Week 7/8)	Collect SFX, begin implementing Unity Sound System	Environment Build (Room & Surfaces)	Basic character object interactions, character expressions
Week 8	Develop Character Schedule & Begin Playtest/Balancing	Implement Sounds & Music	Other Object Animations	Implement Character to Level Build
Week 9	Playtesting/Bug-Fixing	Continue Implementing Sounds/Finalising Music, Playtest	Expand Environment Design (Inactive Appliances, Door)	Add additional animations for smoothness/cohesiveness
Week 10	Playtesting/Bug-Fixing	Environment Build/2D asset support, Playtest	Input final environmental features/designs, Playtest	Continue animations, Playtest
Week 11	Playtesting/Bug-Fixing	Finalise asset implementation, Playtest/Bug-Fixing	Finalise asset implementation, Playtest	Finalise asset implementation, Playtest
Week 12	Playtesting/Bug-Fixing	Playtesting/Bug-Fixing	Playtesting/Bug-Fixing	Playtesting/Bug-Fixing
Week 13	Playtesting/Bug-Fixing	Playtesting/Bug-Fixing	Playtesting/Bug-Fixing	Playtesting/Bug-Fixing

Assets - Toaster





Areas For Further Development

These would only be implemented if all previous tasks are included and all parties involved in its development are able to implement these changes safely. This is also not an exhaustive list. These would occur in the final weeks of development.

- Light sliders (to have different dimming options)
  - Requires: Light Slider Option (Bi Wan), UI Support (Bi Wan), Schedule Balancing (Playtesting)
- Kettle particle animation
  - Requires: Particle System (Bi Wan/Jess), Coding for various stages (?) (Bi Wan)
- ‘Random’ character actions (e.g. opens fridge, opens cabinets etc.)
  - Additional Character Animations (Nic), Character Pathing adjustments (Bi Wan), Object Animations (Raad)
- Breaker Switch & Blowing a Fuse
  - Power Usage for appliances (Bi Wan), Power Off visual (Bi Wan/Jess), ‘Success points’ lost due to breakage (Bi Wan), Additional character animations (?) (Nic), Power Usage Ui interface (?) (Bi Wan)
- Fast-Forward Button
  - Script to allow time advancement & bug fixes to support that ability (Bi Wan), Character Animations that allow sped up time (Nic)