

Puzzles with Polie

Story:

The game follows a group of characters known simply as the “friends”, who live in a region known as “Mainland”. The group is made up of four cartoon animals – a cat named Millie, a polar bear named Polie, and two dogs named Buck Buck and Kensie. Our friends are out on the ocean for a day of ice fishing when a storm rolls in and hits their boat, leaving them stranded in the water. As the storm intensifies it grows dark and the screen fades to black – when it fades back in, we see our friends stranded on a beach of an unknown island. Coming to their senses, they walk through the woods until they come across a small town with a busy main street. The town is called Bear Harbor, and is filled with pedestrians, which are also animals just like our friends. Across Main Street is a café that serves coffee, and one of our friends suggests they grab a coffee after the stress of the ordeal and ask the owner of the café (a raccoon) where they are and how they can get home.



Concept art of the café on Main Street in Bear Harbor.

The owner, who is also the sole barista at the café, is polite to our friends but lets them know he doesn't have any time to help them right now, as there are too many customers in line and people

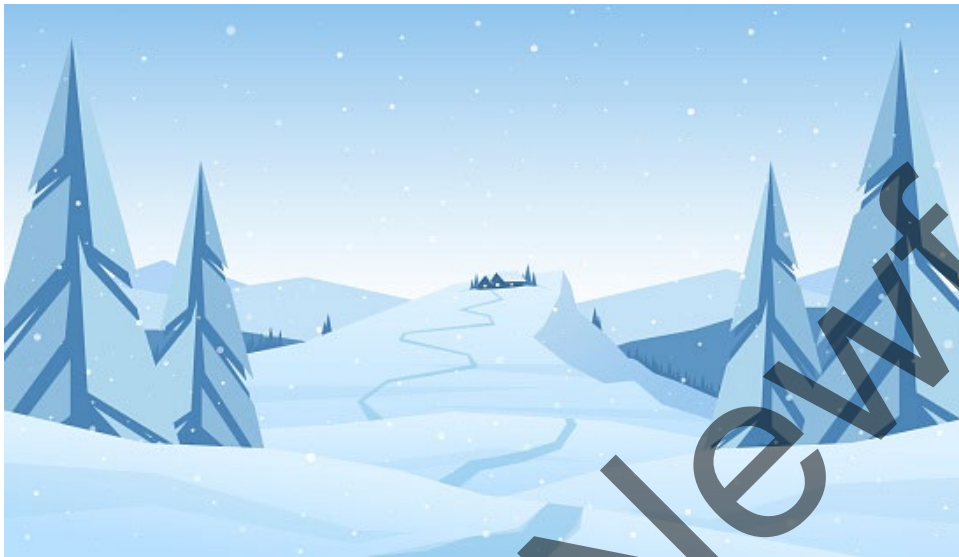
are already starting to get angry. The owner quickly comes up with an idea – if the friends can help fulfill the customer orders by manning the coffee grinder and grinding the coffee according to each order, he would be able to help them with their quest. Our friends handle the coffee grinder with Millie at the helm, and start to help with the orders, which increase in speed until they are finally completed. With the customers now happy and served, the owner turns his attention to the friends. He tells them that they are on an island called “Bare Bear Island”, and that if they want to reach “Mainland” they need to head to the northern tip of the island, which requires a hike over Grizzly Mountain.



Concept art of the woods that lead to Grizzly Mountain.

The friends set out immediately into the woods, with Buck Buck and Kensie at the lead. The group follows the trail until they reach the base of Grizzly Mountain. They begin their hike, and as they near the summit a snowstorm breaks out, bringing visibility down to near zero. They finally reach the peak and find a ski lodge, which happens to be closed. The snow is starting to quickly pile up, which makes moving through it very slow. Luckily, there are two toboggans leaning up

against one side of the lodge that they can share! The friends must sled their way down to the other side of the mountain while avoiding moose, bears, trees, and rocks that obstruct their path. As they begin down the side of the mountain, they start to gain speed, until they finally reach the north side of Bare Bear Island.



Concept art of the summit of Grizzly Mountain, and the ski lodge.

Buck Buck and Kensie are the first to reach the bottom of Grizzly Mountain, followed by Polie and Millie. The friends get off their toboggans and walk to the end of the tree line, where they see a beautiful glacier-filled bay, with chunks of floating ice. In the distance is the silhouette of “Mainland”, where our friends live. Realizing their journey is almost over, they quickly make their way to the water’s edge, led by Polie.

The group realizes that to reach Mainland they need to jump from ice block to ice block, which are constantly moving and start to sink when any weight is put upon them. Carefully, the friends are able to move one by one from block to block. As the group nears the middle of the bay that separates Bare Bear Island from Mainland the blocks move around quicker and more erratically. Eventually the friends are able to make it to the opposite coast, where they are met by their

friend Mikey, who is Fire Chief of Mainland and had been worried about them. He takes them home to their neighborhood, and our main story ends with their arrival to their shared home on Benny Way.

Setting:

The island introduced to the player at the beginning is named “Bare Bear Island”, and is filled with tall pines, moose, and other northern New England flora and fauna. The island is inspired by Mount Desert Island in Bar Harbor, Maine, where Acadia National Park is located. It also includes elements reminiscent of Canada and the North Pole, seen when the group encounters Grizzly Mountain and the northern side of Bare Bear Island, which is a frozen wasteland. Further updates to the game will include narrative and setting features for Mainland and Benny Way, where the playable characters are from.

Objectives:

The objective of the game is to solve each challenge to help the friends get home to Mainland. For each interaction listed in the narrative, there is a level that must be solved to progress the story.

Flow:

The flow of the game is comprised of different levels. Cut scenes are used at the beginning of the game to introduce the narrative as well as in between puzzle challenges, there is also a “game board” used to represent Bare Bear Island and the group’s overall progress. The player must click the next spot on the board to progress the story and begin a cut scene.

The game is offered initially with three levels, and the player controls different characters for each level (Millie for the first, Buck Buck and Kensie for the second, and Polie for the third).

The three levels serve to complete the initial narrative (getting from Bare Bear Island to

Mainland), but a paid upgrade is offered which continues the narrative with our friends and includes new characters and missions for the player to complete.

Level Design:

Three levels are offered in the free version of the game, after which a fourth character and level is offered for a \$0.99 upgrade. Upgrading also includes any future added characters and levels.

The three levels and associated puzzle challenges are as follows:

Challenge 1:

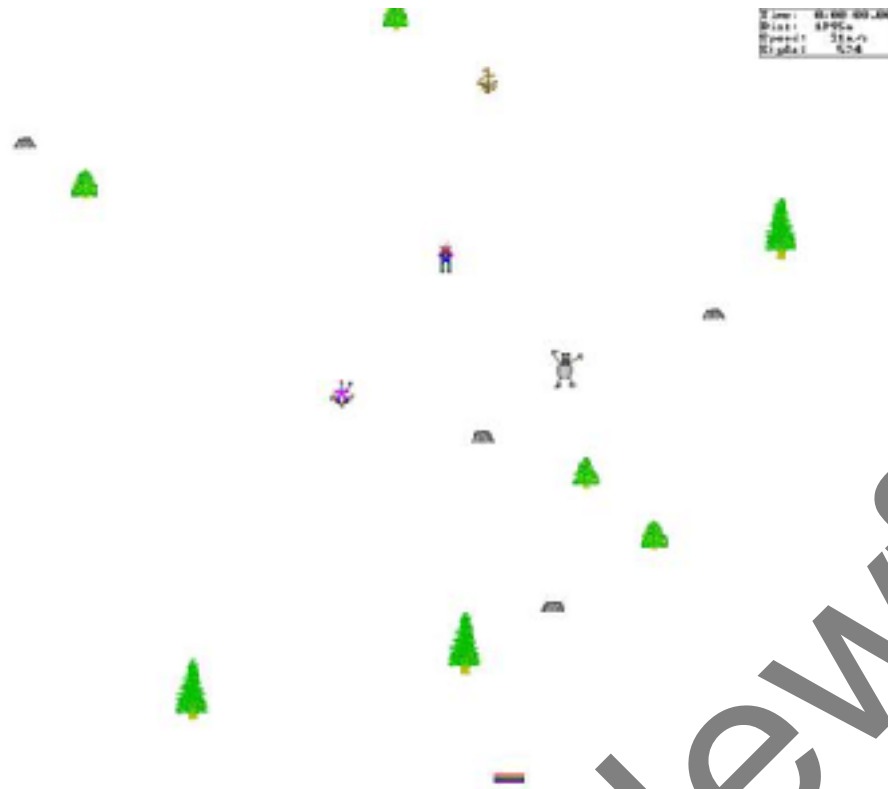
The first challenge involves a coffee grinder, which has a dial that needs to be turned to set the coarseness level of the grind. Each type of drink (coffee press, espresso, drip coffee) requires a specific type of grind. The drink orders move on a conveyor belt at the bottom of the screen and get progressively faster as the challenge continues. There is a meter on the left-hand side of the screen that lets the player know when a coffee has achieved the right amount of ground coffee for the drink. The drinks continue to stack in a queue; the player uses their finger to swipe to the next drink. They also use their fingers to manipulate the dial at the center of the coffee grinder, which sets the coarseness level. If a player does not complete the drinks fast enough or with the correct grind option, the customers get angry and they fail the level.



Rough artwork envisioning the mobile layout for the coffee grinder game.

Challenge 2:

The second challenge in the game is a traditional skiing-style game, reminiscent of *SkiFree*, a single-player skiing computer game released in 1991. The player must control a toboggan that is accelerating down a mountain, using their fingers to guide its progress. Obstacles of increasing difficulty are put in the path of the player, including moose, bears, trees, and rocks. The difficulty and speed of the toboggan is progressively increased until the player reaches the bottom of the mountain.



A screenshot from the game "SkiFree", released in 1991.

Challenge 3:

The third challenge in the game involves the player moving the characters onto moving ice blocks. Each block can only hold a specific weight ranging from 8-80, it varies depending on the difficulty level chosen. Each character's weight is equal to 1. The weight that each block holds diminishes the longer the character is on the block. At the beginning, all the blocks are moving at a steady but easily manageable pace. Once the player steps on a block it stops moving, but the other blocks begin to move slightly faster, increasing the difficulty. This happens each time the player steps to a new block. Once the player has moved from the first block to the second, another NPC character follows behind onto the last block. As the player moves forward to a new block, each NPC follows behind the character in front of them. The key is that the player must choose blocks that they know will continue hold the weight of those behind them, considering

that the weight limit will continue to diminish as the player charts a path forward. Time is of the essence!



Concept art for challenge three, the ice blocks challenge. (Source: Shutterstock)

Cut Scenes:

The game is comprised of many cut scenes which keep the narrative moving forward. As this game is primarily a puzzle game, the narrative serves to setup each level.

When the player loads the app and begins a new game, a 60-second backstory video is played, featuring our friends. It shows them on a boat enjoying a day of fishing. Each one is doing something that is related to their personality traits: Millie is sitting on the deck and sipping a warm drink, she rolls her eyes at the others who have fishing rods. Polie is barking orders at the others, he needs more bait for his line and Millie is right next to the worms:

Polie: "Come on, Millie – hand over the worms, you're right there!"

Millie: "Can't you see I'm relaxing? Get up off your butt and come get it yourself!"

Buck Buck is trying desperately to ease tensions, while Kensie can be seen in the background, holding a book.

All of a sudden, the scene gets dark as clouds roll in, a wave crashes in – the next thing we see are the four “friends” on a beach, laying in the sand, having visibly just washed ashore. Daylight has returned, and we hear Polie say “where are we?”. Millie replies “I have no clue, but there’s a café – I’m getting myself a coffee!”

After this, the cut scene ends, and we are introduced to the game board. Each level consists of a 30 second cut scene to continue the narrative and introduce the new puzzle as well as a 30 second cut scene after solving the puzzle, before the player is brought back to the gameboard.

Characters:

Each character has unique personality traits which exhibit themselves during the story.

Millie:



Millie is a feisty, female calico cat who loves coffee more than anything in the world. She grew up on the streets as an alley cat (which explains her salty personality), but she now has a loving home and is sassy, yet sweet.

Polie:



Polie is an inquisitive and confident little polar bear. He is quite smaller than the other polar bears and was picked on growing up, because of that he has a bit of a “Napoleon Complex”. He’s the leader of the pack and likes to be heard, he’s known to talk over others if he

has something to say. They don’t call him “King Polie” for no reason.

Buck Buck & Kensie:

Buck Buck and Kensie are two English bulldogs who are twin brothers, and practically attached at the hip.



Buck Buck's proper and full first name is Buckingham Winston, but his friends call him "Buck Buck". He is a very astute and proper pup, and very protective of his friends, whom he is very loyal to.



Kensie's proper first name is Kensington Windsor, known to most as "Kensie". He is very shy, the polar opposite of his twin brother Buck Buck and friends. He tends to be quite introverted and prefers to hang behind the others. He does like to cuddle up for a good nap.

Mikey (purchasable):



Mikey is an older Dalmatian dog, and is Police Chief on Mainland. He is quite grey (probably from fighting all those fires), instead of being white with black spots like most dalmatians he is grey with black spots. He is friendly and revered by the other friends, being the oldest in the group. He has a very notable red collar around his grey and black body, it is old and weathered just like him. He is always smiling but is quiet, just like Kensie. Mikey can be unlocked upon completion of the original 3 levels.

Target Audience:

The game is targeted towards children, capturing the 6-13 age range. Due to the ability to change difficulties, and the time taken to create likable characters, there is crossover into the young adult and even adult demographic as well, especially through parents connecting to the story via their children.

Difficulty:

The game will have three difficulty settings: Easy, normal, and hard. Easy difficulty maintains the same “difficulty” throughout and is more of a fun playthrough that is centered around the cut-scenes and narrative. “Normal” has a progressively increasing difficulty, as you work through each level things become more challenging. Hard difficulty is intended for teens, young adults, and adults, and can take hours to complete all three challenges.

Ending:

The narrative provided in this assignment is completed in the first three levels, at which point you have completed the free version of the game. Purchasing the game unlocks an additional character and level as well as access to all future updates.

Map & Aesthetics:

Since the game is aimed at children the map will include bright and playful colors. The characters are cartoony and friendly looking, and the general feel for the game has the same charm, it evokes a warm and inviting feeling. The characters make their way through many biomes in the game: From the beach to a busy town, up a snow-capped mountain and through a frozen tundra, then back to their neighborhood.



Concept art for the gameboard. The initial game will have only three spots centered on an island, but purchasing the game and future updates will include more spots, similar to what is shown above.

Mechanics:

The game is centered around these mechanics: puzzle solving, dexterity, and logic. There is also an element of traditional board gaming brought in with the progression map through different levels. The game is heavily centered around the narrative.

Rules & Controls:

This game will be a mobile-only game, meaning it will require a touch screen. All actions can be performed by tapping, pinching, and dragging your fingers on the screen. For the first level, the coffee grinder is controlled via the dial by holding and turning your fingers on the phone screen. The conveyor belt can be swiped back and forth. The second level requires the player to control the toboggan by dragging their finger around the screen to avoid the obstacles. The player is unable to control their speed in this level. For the third level, the player taps their finger on a

block to jump onto it. The map itself, where you can select the next level, is controlled by tapping that spot on the board.

A menu with full settings control and the ability to change difficulty are included at the top of the screen. There is also the ability to ask for “tips and tricks” or hints for certain challenges.

Sounds & Music:

The music will be bright and cheery, a main title theme greets the player as they enter the main menu. Ambient sounds will also play a crucial role, for example, the coffee grinder in the cafe, snow and wind sound effects on the mountain, as well as cracking ice in the bay will help make the player aware of their surroundings. Cut scenes will include character dialogue, as well as closed captioning for those playing at low volume or on mute. As with many mobile games, while sound may be helpful it will not be absolutely crucial to successful completion, as many users may play the game on mute depending on their real-life location.

Genre:

The game will in the children’s genre of mobile games, classified as a puzzle and logic game. It would be a “freemium” game, available for free on various app stores with the ability to upgrade to a paid version where the player gains access to new players and levels.

Possible Alternate Titles:

The Furry Friends

Escape from Bare Bear Island