Mortal Kombat – UI/UX Document

Title Screen

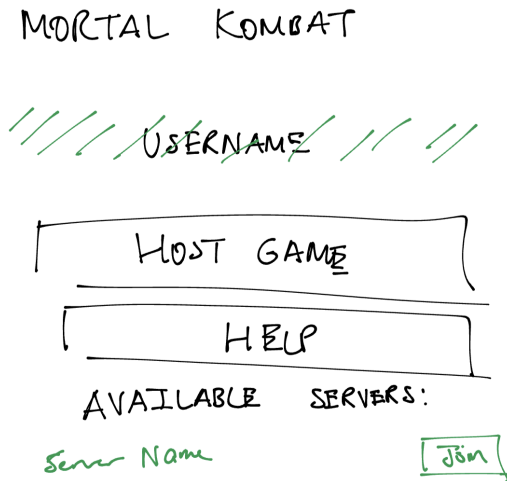MORTAL KOMBAT

/// USERNAME // //

HOST GAME

HELP

AVAILABLE SERVERS:
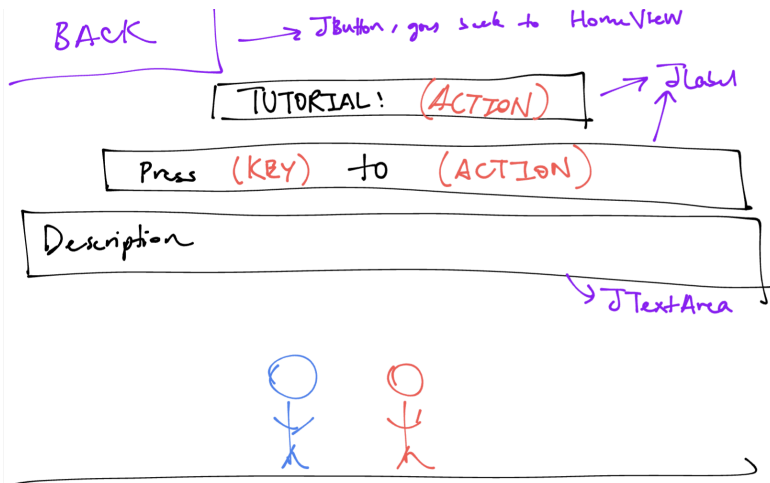
Server Name   Join

- JLabel used with a font and sized to be a large TITLE for the Main/Title Screen
- Below the Title is a JTextField, asking for the username input. Allows for chat messaging and keeping track who the users are
- Three JButtons for three functions: "Host Game", "Help", and a dynamically added "Join" button
  - "Host Game" will allow a player to host a server for a game.
  - "Help" will navigate the player to the Help Screen where interactive demos are used and helps the user navigate around the game
  - Because of Multicast Server feature, the game has the ability to scan new servers as more people start hosting the game, and dynamically added "Join" buttons, made through an ArrayList will pop up allowing clients to join under the *Available Servers* JLabel
- In addition, the title screen background will be an image of the classic MK background, made with reduced opacity (which allows text and buttons to show more clearly, but gives the title screen more colour).

Help Screen

- Interactive help screen shows players how to move, attack, block, and use their special move by telling them which button to press

- This interactive screen has 9 frames to display the 8 moves that players have plus an additional frame that tells players how to chat
- The TUTORIAL: JLabel tells the player which (Action) they are currently practicing
- The Instruction JLabel below will then tell the player which key to press for that Action
- Below that is a JTextArea that will display additional information on that action. For example, for attacks, it will display how much damage the attack will do
- A back button is displayed at the top left corner of the Help Screen
  - It allows for users to go back to the Home Screen to play the game and exit out of the tutorial any time. If they rejoin the help screen later, they can continue where they left off in the tutorial.

BACK → JButton, goes back to HomeView

TUTORIAL: (ACTION) → JLabel

Press (KEY) to (ACTION)

Description → JTextArea

Character Selection Screen (CSS) - Stage 1
- Character Selection Screen Stage 1 shows the image of what the CSS will look like BEFORE fighters are chosen

Player 1's Username

↑

JLabel of Player
name's

Player's can either choose
Scorpion / Sub-Zero to
play as, JButtons.

↓   ↓

Player 2's Username

SCORPION   SUB-ZERO

Player 1 -
Select your
Character

Player 2 -
Select your
character

↑

JTextField showing
"select your character"
if player hasn't
selected yet.

Inside JButtons are
small images of fighters
that can be selected.

CSS Stage 2:
- Character Selection Screen Stage 1 shows the image of what the CSS will look like AFTER fighters are chosen. Fighters can be chosen more than once (i.e. both players can choose Scorpion)
- Remove the JTextField and put a larger image of the character that they selected
- Start the game when both characters are selected

Player 1's Username   Player 2's Username

→ Larger Image of
Chosen character

SCORPION   SUB-ZERO
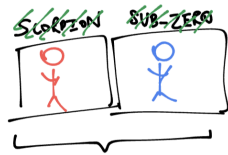
Disable buttons
once both select
a character

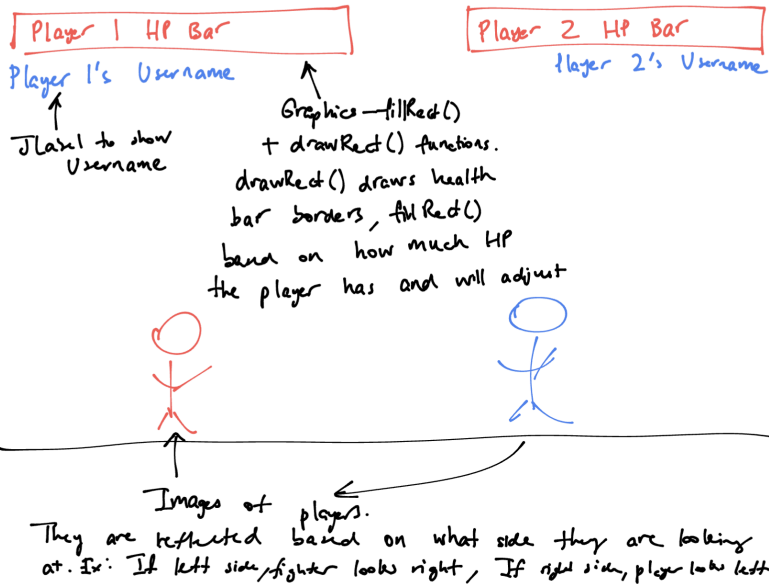Name of Character X   Name of Character Z
↓
Display chosen fighter name
with flash
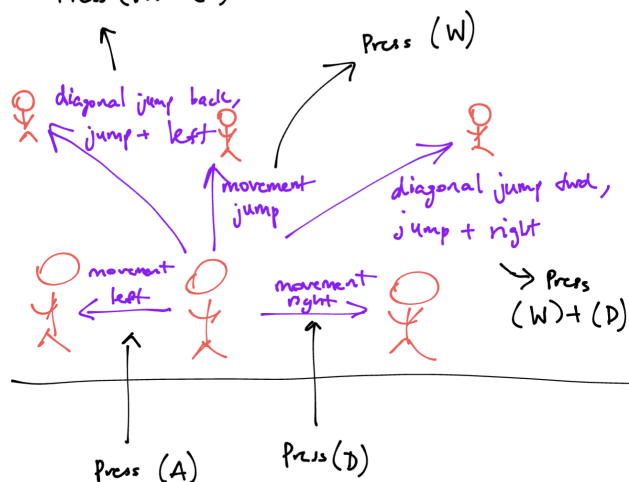

Actual Game Screen - Animations

Idle
- When the characters load into the game. Characters have default images for idle and movement: when they are just standing around doing nothing, and when they move, they will have these images animated.
- The background contains image of a classic MK background, again with reduced opacity so you can see the actual game and mechanics more clearly
- Health bar and username is displayed at all times throughout the game

Player 1 HP Bar

Player 1's Username

JLabel to show
Username

Player 2 HP Bar

Player 2's Username

Graphics — fillRect()
+ drawRect() functions.
drawRect() draws health
bar borders, fillRect()
based on how much HP
the player has and will adjust

Images of players.
They are reflected based on what side they are looking
at. Ex: If left side, fighter looks right, If right side, player looks left.

Movement

- Characters share same base movement, tracked using KeyEvent Actions
- The way that the character faces depends on which side of the opponent they are on
- Gravity logic will ensure that jumps will put the character back down on the ground

Press (W) + (A)

Press (W)

diagonal jump back,
jump + left

movement
jump

diagonal jump fwd,
jump + right

Press
(W) + (D)

movement
left

movement
right

Press (A)

Press (D)

Base Attacks
- All characters share the same base attacks, tracked using KeyEvent Actions
- The way that the character faces depends on which side of the opponent they are on
- If characters are hit, they have a stagger animation that will show them being hit/staggered backwards
  - An uppercut will additionally launch them in the air for a period of time before the opponent falls back down to the ground
- While attacking, players are unable to move

Punch
Press J

Kick
Press L

Uppercut
Press K
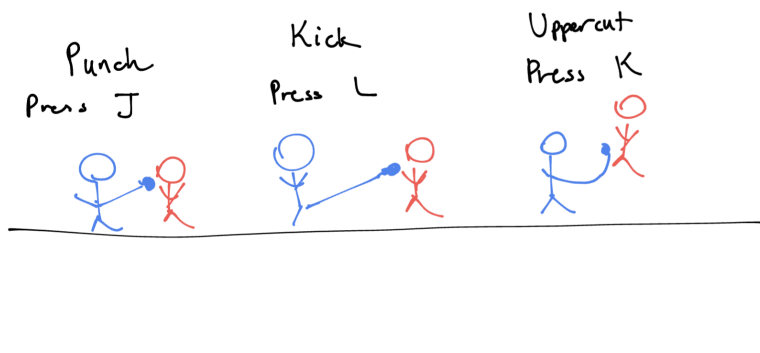
Block
- Both characters have the ability to block to nullify all damage from attacks, and not stagger backward
- Tracked using KeyEvent Actions
- While blocking, players cannot move

Block

↪ Press U to Block

Release U to go back to
normal position
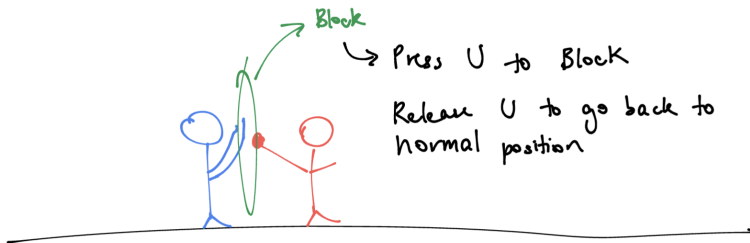
Ice Ball

- Sub-Zero's unique special move is an ice ball. If the opponent gets hit by it, they get frozen for a certain amount of time which allows the attacker to get in close and score a free hit
- The ice ball can be blocked or jumped over, allowing the freeze effect to be avoided
- To launch this special move, press I

SUB-ZERO SPECIAL MOVE — ICE BALL

①

If ball hits, player
cannot move for set
amount of time

②

movement
allowed

movement
disabled
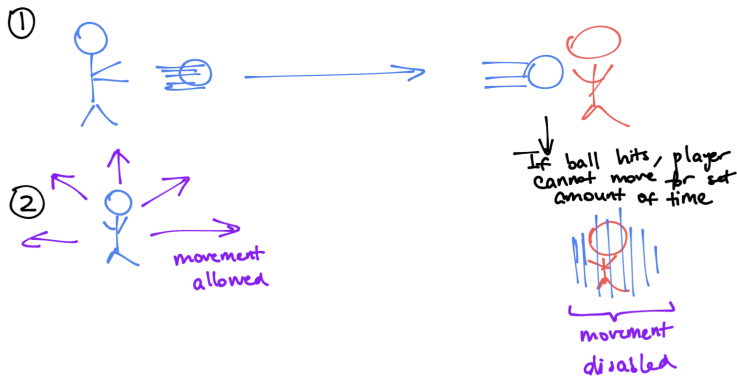
Spear
- Scorpion's special move is a kunai spear throw. He will throw a spear at the opponent, and if it hits, Scorpion will pull (teleport) the opponent back towards him with the spear
- This move will deal the most damage
- The spear can be blocked or jumped over to avoid damage
- To launch this special move, press I

SCORPION SPECIAL MOVE — SPEAK

↳ Press I

Movement of spear

①

② Player 2 gets pulled to Scorpion's position
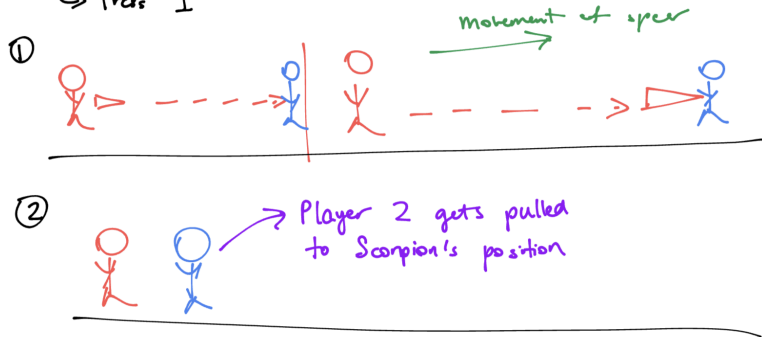
Chat Screen
- Simple Chat Screen pops up when the player press ALT+C on their keyboard
  - They can type messages during the game, switching into and out of the Chat Screen with this command

Chat Log + Field   JTextArea

Send Messays — JText Field