

Game Name: Taxi Station Management

Rise Time:

Game Genres: Simulation

Game Description: There will be passengers at random locations in the city. Passengers will call a taxi (maybe a special choice). The player will match passengers and cars. (With Tap mechanics) The taxi navigates to the passenger, takes the passenger to the destination and returns to the station. The player earns money for each taxi ride. The player can buy new taxis, upgrade speed or income. The player can unlock new cities after winning enough Money.

References:

1. Car Lot Management
2. Air Traffic Management

ASSETS

Art Style: Realistic,

Notes:

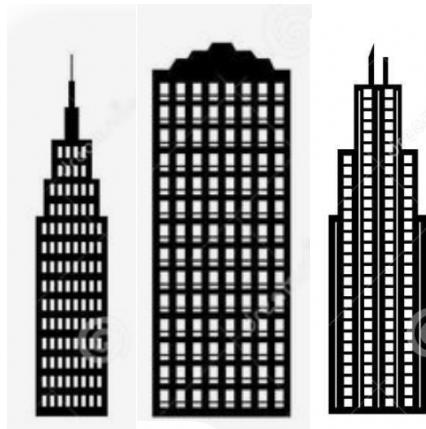
1. The building (house, skyscraper, park, etc.) models to be used in the game will be in white (and its shades).
2. Below is an example scene reference.
3. The structures will not be as detailed and long as in the reference image. Buildings will be shorter and simpler.
4. Details will not be visible as there will be an isometric camera angle.
5. The tree models to be used for the park must be in a separate structure. Trees will also be used in random areas on the stage.
6. Cars will be colorful.



Environment:

1. Buildings

- a. Skyscrapers(The draft pictures given below can be referenced. There will be 3 types of skyscrapers.)



- b. Houses (The pictures given below can be referenced. There will be 2 types of houses.)



c. Shop

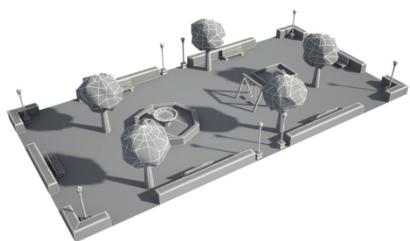


d. Cafe



2. Green Field

a. Parks



Vehicles:

1. Standard taxi (The object with the "taxi" text will be at the top of the vehicle. The color of the taxi will be yellow)



2. UberXI



3. Van



4. Green (There will be "Green" text and a lightning bolt icon on the vehicle. Text and icon colors will be green. The Car color will be White. Since the color of the vehicle will be white, it should be prominent among city structures.)



MECHANICS

Main Type: Tap

Type: Organizing

Mechanic Features:

1. Gameplay
 - a. The player will match passengers with cars. (with Tap mechanics)
 - b. The player can't select more than one passenger at the same time.
 - c. The passenger will be selected first, and then the car will be selected.
 - d. The selected passenger will have a green outline.
 - e. If the match is wrong, it will be a red outline.
 - f. If the match is correct, the parking area of the selected car will be green transparent and red if incorrect.
2. Cars
 - a. Types
 - i. There are four types of cars in the game.
 1. Standard
 2. XI
 3. Vip
 4. Green
 - b. Speed
 - i. Standard taxi speed value = x
 - ii. XI speed value = y
 - iii. Vip speed value = z
 - iv. Green speed value = p
 - v. Condition
 1. $x < y < z < p$
 - c. Route
 - i. All cars will start driving in the same position.
 - ii. The cars will go to the location of the matching passenger first.
 - iii. A green line will appear on the route between the station location and the passenger location. (It will appear with animation / It will not appear directly.)
 - iv. The cars will go to the destination location after picking up the passenger.
 - v. A blue line will appear on the route between the pickup location and the destination location. (It will appear with animation / It will not appear directly.)
 - vi. Then the cars will return to the station location. (A colored line will not appear..)
 - vii. Cars will go to all destinations by choosing the shortest route.
 - d. Movement
 - i. The progress, turn and stop of the cars should look natural.
 - ii. Cars should not be in each other and should not collide.
3. Passengers
 - a. Spawn
 - i. Passengers will spawn at random positions.
 - ii. Passengers must appear above buildings (not a road)
 - iii. Spawning time is 4-5 seconds for each passenger.
 - b. Timer
 - i. A new passenger spawns every 4-6 seconds.
 - ii. The timer will be in the shape of a circle.
 - iii. The timer color will change from green to red for passengers waiting. (counterclockwise)
 - iv. The timer will start running 3-5 seconds after the passengers spawn.
 - v. If the player doesn't take any action, the passenger will disappear after 15 seconds.
 - c. Car Selection
 - i. Passengers can choose one car type at a time.
 - ii. Passengers will be able to choose from 4 car types.
 - d. Destination Location

- i. There will be random locations.
 - ii. It will be the minimum distance value.
 - iii. The distance of the destinations to the passengers shall not be below the minimum distance value.
4. Upgrades
- a. Upgrades will be specific to each car type.
 - b. Speed
 - i. Current speed value = $h1$
 - ii. New speed after upgrade $h2 = (h1 + h1 * 0.1)$
 - iii. The process will be repeated with each upgrade.
 - c. Income
 - i. Earnings from each passenger = $m1$
 - ii. New earn after upgrade $m2 = (m1 + m1 * 0.1)$
 - iii. This process will be repeated with each upgrade.
 - iv. For example;
 - 1. The player earns 30 dollars from the passenger who calls a standard taxi.
 - 2. After the upgrade, the new earnings will be 33\$ from $30 + 30 * 0.1$.
 - 3. The player earns 50 dollars from the passenger who calls a Vip car.
 - 4. After the upgrade, the new earnings will be 55\$ from $50 + 50 * 0.1$.

5. Gameplay UI

a. Station

- i. The maximum height of the station panel will be up to the middle of the screen.
- ii. It will be used grid system
 - 1. (1,1) standard taxi
 - 2. (1,2) XL
 - 3. (2,1) Vip
 - 4. (2,2) Green
- iii. Information on the top of the cars;
 - 1. Title of vehicle type
 - 2. The number of cars owned by the player
 - 3. The number of full cars
 - 4. For example; "Taxi 3/5"
- iv. There will be an unlock/buy button at the bottom of the cars.
 - 1. If the car type is not open, there will be an unlock button. After the car type is unlocked, it will be replaced by a buy button. "Text + price + money icon"
 - v. If all cars of the selected car type are full, the car will not be displayed in that parking lot and it will say "all cars are running".

b. Passengers

- i. It will be a 2d art.
- ii. The selection and earn will appear in the speech bubble.
- iii. The speech bubble will be at the top of the passengers.
- iv. The timer will be on the passenger's body.

c. Upgrade

- i. The upgrade button will be on the left in the middle of the screen.
- ii. The upgrade panel will pop up.
- iii. The reference image given below will be taken as a basis.
- iv. There will be a "text+money icon" in the buttons in the Upgrade panel.



UPGRADES



- d. City
 - i. The part from the station to the top of the screen will be the gameplay area.
 - e. The scene work in the image given on the right will be based on.
 - f. The unlock new city button will be on the right in the middle of the screen. ("New City + Price + Money icon")
6. Default Settings
- a. The player will start with a taxi in each new city.
 - b. Other car types will be disabled.
 - c. When the player has enough money, he/she can buy new car types and cars.
 - d. When the player has enough money, the new city button will appear and the player will be able to unlock the new city.
 - e. There will be a limit to the number of vehicles the player can buy. This will vary by city. (It will be explained in the level design section.)

7. Economy Model:

Car Type	Price (Unlock)
Standard Taxi	Free
XI	500\$
Vip	1000\$
Green	1500\$

New Car	Buying Price
Standard taxi	100\$
XI	200\$
Vip	350\$
Green	500\$

City	Price
1	Free
2	5000\$
3	8000\$
4	12000\$
5	15000\$

Car Type	Gain
Standard Taxi	25\$ - 40\$
XI	45\$ - 70\$
Vip	75\$ - 100\$
Green	80\$ - 120\$

Car type	Upgrade Type	Price
Standard Taxi	Speed	120\$
	Income	120\$
XI	Speed	200\$
	Income	200\$

Vip	Speed	320\$
	Income	320\$
Green	Speed	400\$
	Income	400\$

- a. The cost of opening a car type in each new city will increase by +\$150. (For all types)
- b. The cost of buying a new car in each new city will increase by +\$25.
- c. Earnings from cars will increase by +\$15 in each new city. (To be added to the minimum and maximum values.)
- d. Each time upgrades are made, their fee will increase by +100\$.

UI

Characters:

1. Business man/woman
2. Party boy /girl
3. Old man/woman
4. Basic boy/girl
5. Couple
6. Mother and her children
7. Passenger with a suitcase (man/woman)

Car Icons: Images will be added after the models of cars are finished.

Money Icon: The standard icon will be used.

Buttons:

1. Upgrade button (To open the Upgrade panel)
2. Upgrade panel buttons
3. New car types unlock button
4. Buy button

Upgrades Panel:

1. It should be a pop-up panel
2. The image of car models should be used.
3. There will be a "text+money icon" in the buttons in the Upgrade panel.

UPGRADES



ART

Art Style: Realistic

Camera:

1. The camera angle will be isometric.
2. The example camera angle in the image given on the right will be based on.
3. Roads and the progress of cars should be understandable.

Materials / Shader: Universal Render Pipeline

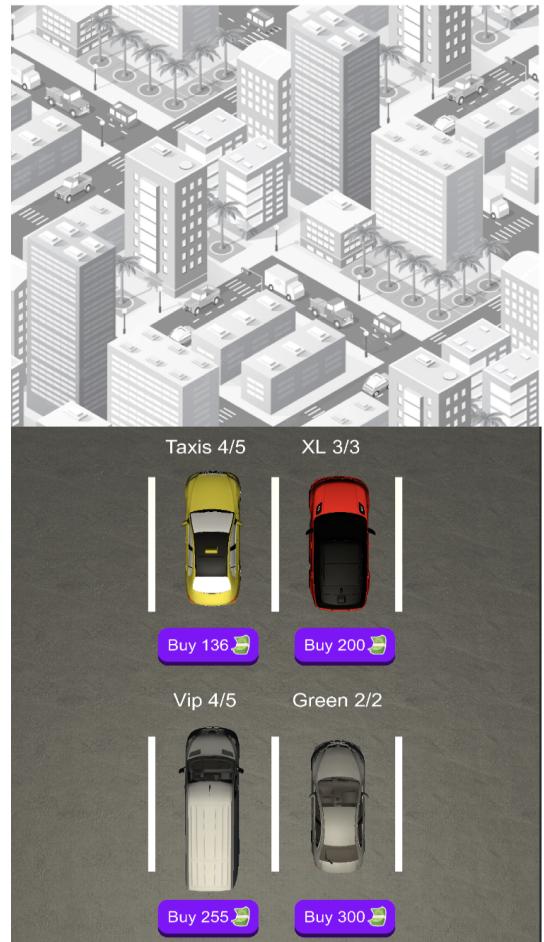
1. Cars, route lines and passengers will be colored in the game.
2. Environment will be in shades of white.

Lights:

1. Intensity: 1
2. Color; white
3. Strength: 0.1
4. Bias value is default
5. Shadow Type: Soft
6. Lightning source: Color

Particle System:

1. It will be a trail for car braking (maybe)



LEVEL DESIGN

City Count: 5

Cities and Max Car Number: Maximum number of cars the player can buy by cities.

Cities	Car Types	Max Car Number
1	Standard taxi	10
	XI	10
2	Standard taxi	10
	XI	10
3	Vip	8
	Standard taxi	10
4	XI	10
	Vip	8
5	Green	4
	Standard taxi	10
	XI	10
	Vip	10
	Green	8
	Standard taxi	12
	XI	12
	Vip	12
	Green	12

Cities and Car Types: Types of cars the player can unlock based on cities.

Cities	Car Types
1	Standard taxi-XI
2	Standard taxi-XI-Vip
3	Standard taxi-XI-Vip-Green
4	Standard taxi-XI-Vip-Green
5	Standard taxi-XI-Vip-Green

Cities and Passenger Types: Types of passengers the player can see by cities.

Cities	Passenger Types
1	Business Man-Couple-Old Woman
	Business Man-Couple-Old Woman-Business Woman-Old Man-Mother and children
3	All types
4	All types
5	All types