

Concrete Dreams

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Abstract

What: A top-down 2D video game where players navigate homelessness, discovering real local resources and working toward housing stability.

Why: To humanize homelessness, educate communities on support systems, and inspire compassionate action, through gameplay, not judgment.

How: Players explore a city map, complete quests tied to real local organizations (shelters, soup kitchens, health centers), earn money, and find housing.

Impact: Players learn how to volunteer, donate, and engage with real community organizations that support individuals experiencing homelessness.



Figure 1: Final City Map Design

Development

Stack: Built over 7 months using Unity (C#) for core gameplay and Inky for branching dialogue. Runs on Windows, Mac, and Linux.

Architecture: Event-driven, loosely coupled systems using ScriptableObjects and Observer patterns. Player, dialogue, and inventory scripts are fully independent components.

Scalability: Data-driven design allows new quests, items, NPCs, and shop inventories to be added without code changes, supporting future content expansion.

7

Months of Development

3

Platforms (Windows/Mac/Linux)

4

Community Organizations



Figure 2: Fishing Gameplay with Active Quest Interface

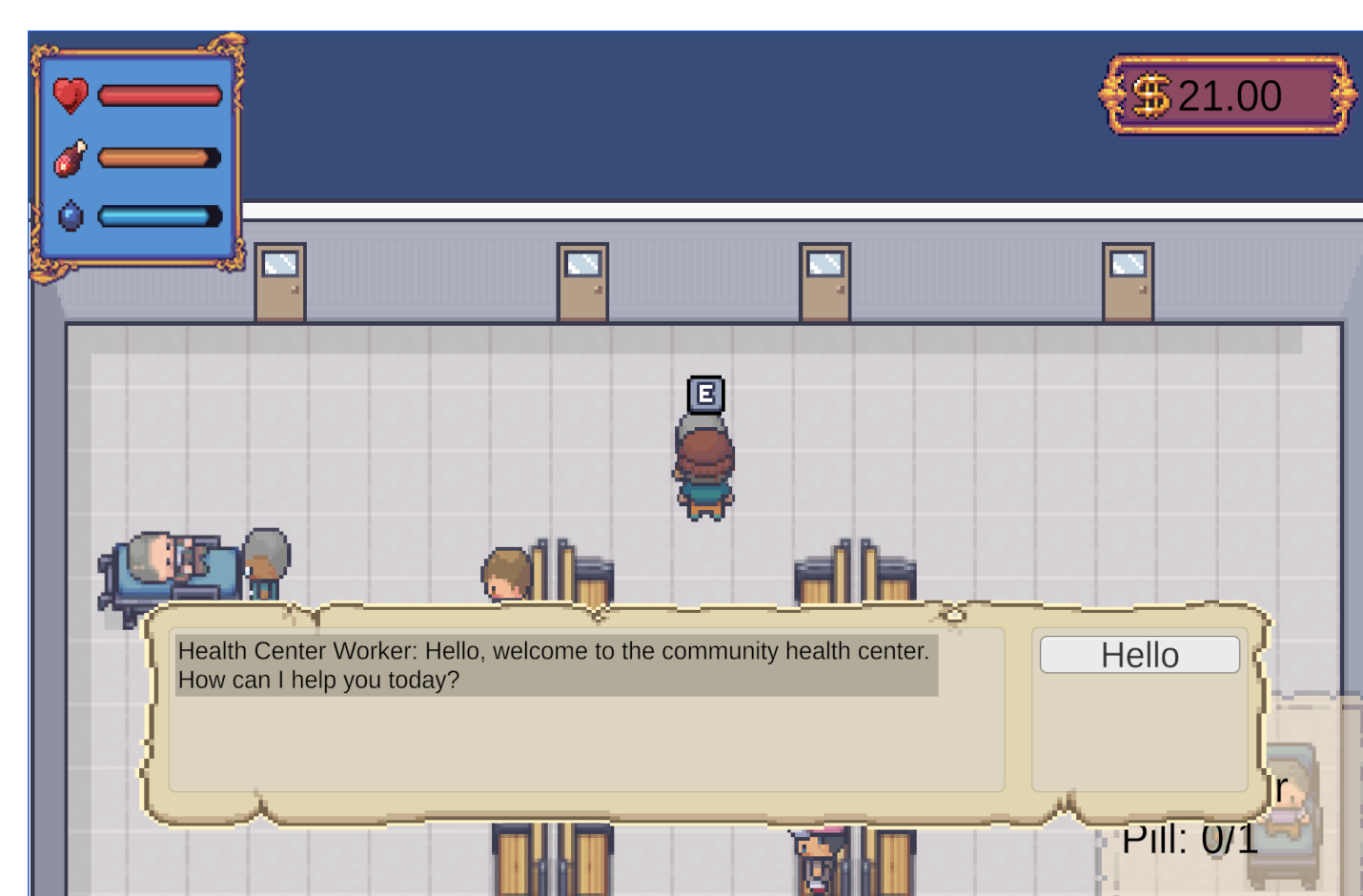


Figure 3: NPC Dialogue Interaction Interface



Figure 4: Opening Scene with Player Staus and Currency UI



Figure 5: Player Inventory UI with Item Description and Use Button

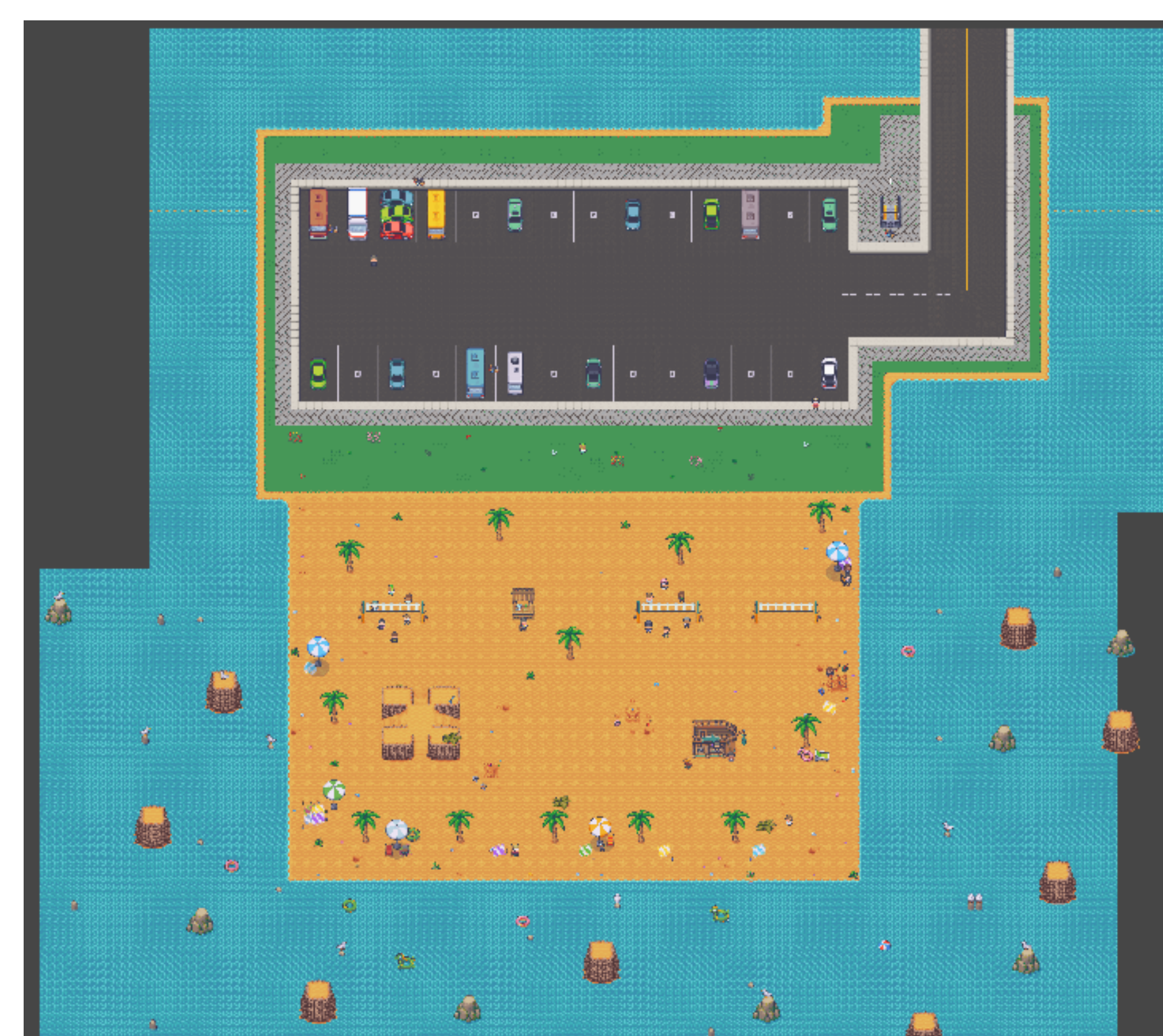


Figure 6: Final Beach Area Design

Highlighted Resources

Homeless Shelters

- Provide temporary housing for individuals experiencing homelessness. Many shelters require documentations, interviews, or a completion of eligibility steps before providing housing.
- In game, players must complete a series of requirements before being allowed to receive a room, illustrating the procedural intake process.
- Hope for Home Homeless Services Center

Soup Kitchens

- Offer prepared meals to individuals experiencing food insecurity, often free of charge.
- Players speak with a volunteer to learn more about the available services and volunteer opportunities.
- Isaiah's Rock

Health Centers

- Provide low-cost or free medical services, including preventative care, mental health support, and referrals.
- Players learn about available healthcare resources, emphasizing the importance of medical access in long-term stability.
- East Valley Community Health Center

Food Banks

- Distribute groceries and essential supplies to individuals and families facing food insecurity.
- Players learn about food distribution services and community service opportunities, reinforcing the importance of community involvement.
- Inland Valley Hope Partners

Features

Fishing Mechanic

State-driven minigame that tests player reaction time. Players cast, wait for a bite indicator, then reel in within a timed window. Success yields a fish from a weighted loot pool, failure yields nothing.

Quest & Dialogue System

Quests are ScriptableObjects with a single trackable objective (collect items, reach a money threshold). Dialogue with NPCs unlocks new quests and drives narrative progression.

Inventory & Shop System

Modular, data-driven system using ScriptableObjects for all items. Inventory and shop share the same structure, each shop carries unique stock and dynamic pricing. Transactions update player currency in real time.

References

- <https://www.feedingamerica.org/hunger-in-america>
- <https://www.ers.usda.gov/topics/food-nutrition-assistance/food-security-in-the-u-s/>
- <https://bphc.hrsa.gov/about-health-centers/health-center-data>
- <https://www.nachc.org/research-and-data/>
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- <https://www.feedingamerica.org/hunger-in-america>
- <https://www.ers.usda.gov/topics/food-nutrition-assistance/food-security-in-the-u-s/>
- <https://davargas016.itch.io/concretedreams>



Figure 7: GitHub Repository QR Code for Concrete Dreams Source Code and Playable Link