



BeanFast

©2024 - FPT UNIVERSITY - GSP24SE27





BEANFAST

Breakfast ordering and delivery system for students in primary school from nearby cloud kitchen



Team Member

Supervisor: Lâm Hữu Khánh Phương



SE150997

Nguyễn Hoài Phương



SE151068

Đào Đức Thành



SE150972

Nguyễn Huỳnh Phi



SE151077

Phạm Quốc Thịnh



Agenda



1. Background
2. Shortcomings & Improvements
3. Demo App



BACKGROUND

- Kitchen Manager lists each school's daily menu so parents can order food for their children in advance.
- Parents use the mobile application to order food and choose a pickup location near the school gate.
- The ordered dishes will be prepared in the kitchen and delivered to the stations.
- At the station, customers will receive their orders.





Shortcomings



1. Delivery time needs to be in the morning.
2. One order cannot be delivered to multiple people.
3. Top up and refund money after cancel order
4. The process of changing the status of an order.
5. Gaming does not need to be tied to a specific student.
6. Fix sequence diagram and use case diagram.



**Delivery
time needs
to be in the
morning.**

The order time must be later than the current time and at least 6 hours before the delivery time, which should be from 4-11 AM.

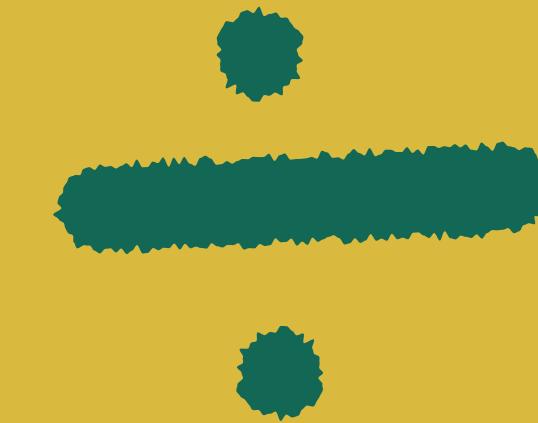
One order cannot be delivered to multiple people.



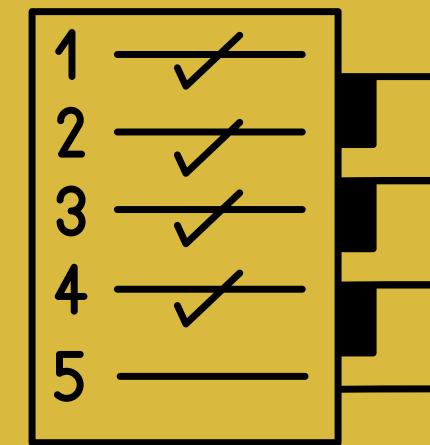
A delivery session requires a gateway with at least one delivery person.



Each delivery session gate requires a minimum of 1 delivery person.



Orders are allocated to delivery staff depending on the number of staff at a gate.



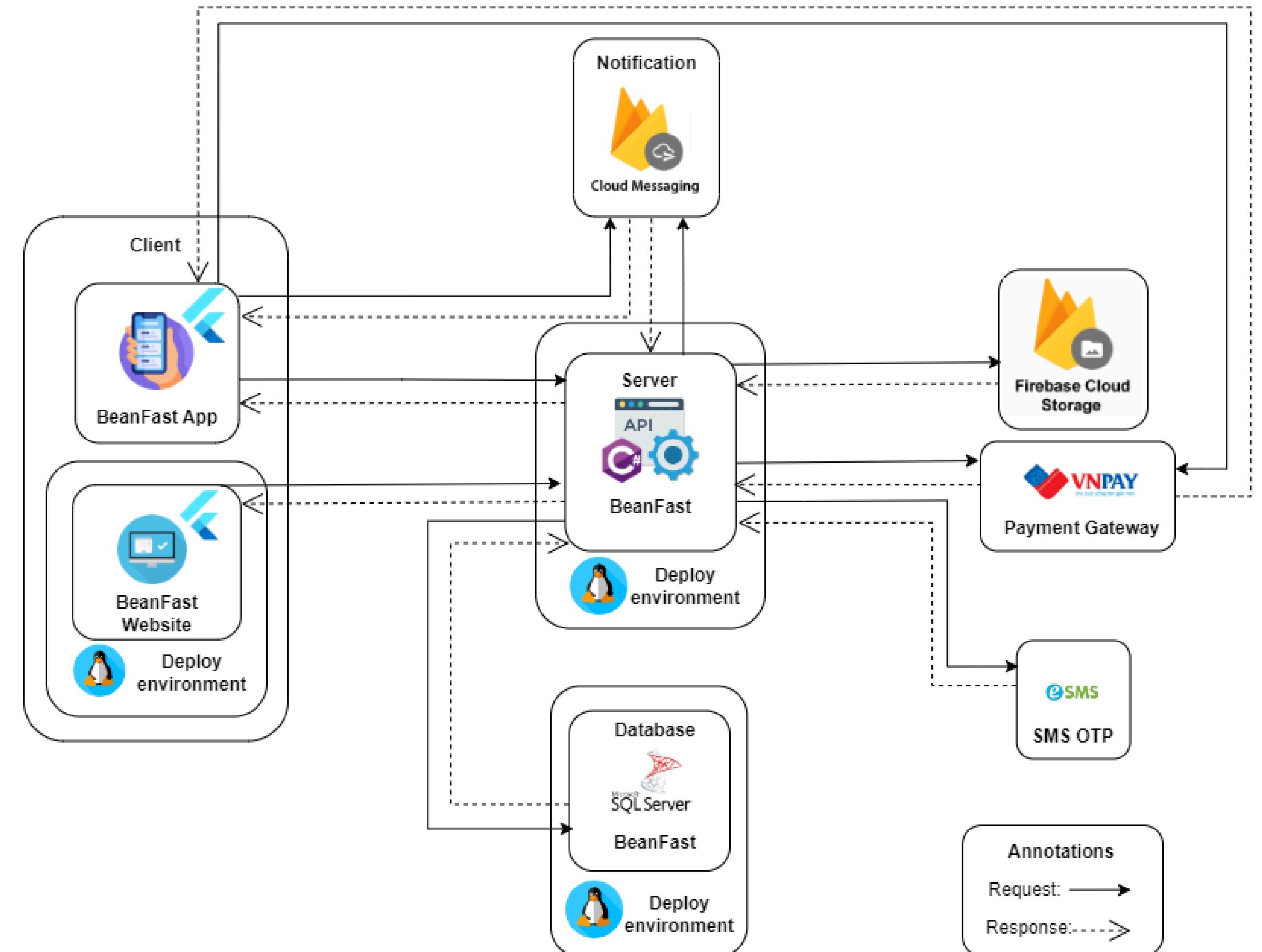
Each order is assigned to a single delivery person.



**Top up and refund
money after cancel
order**

**Test using a different network
due to a server system error.**

System Architecture



The process of changing the status of an order.



After foods is ordered, it will be in "Đang chuẩn bị" status.



When the order session time ends, the status will automatically change to "Đang chế biến".



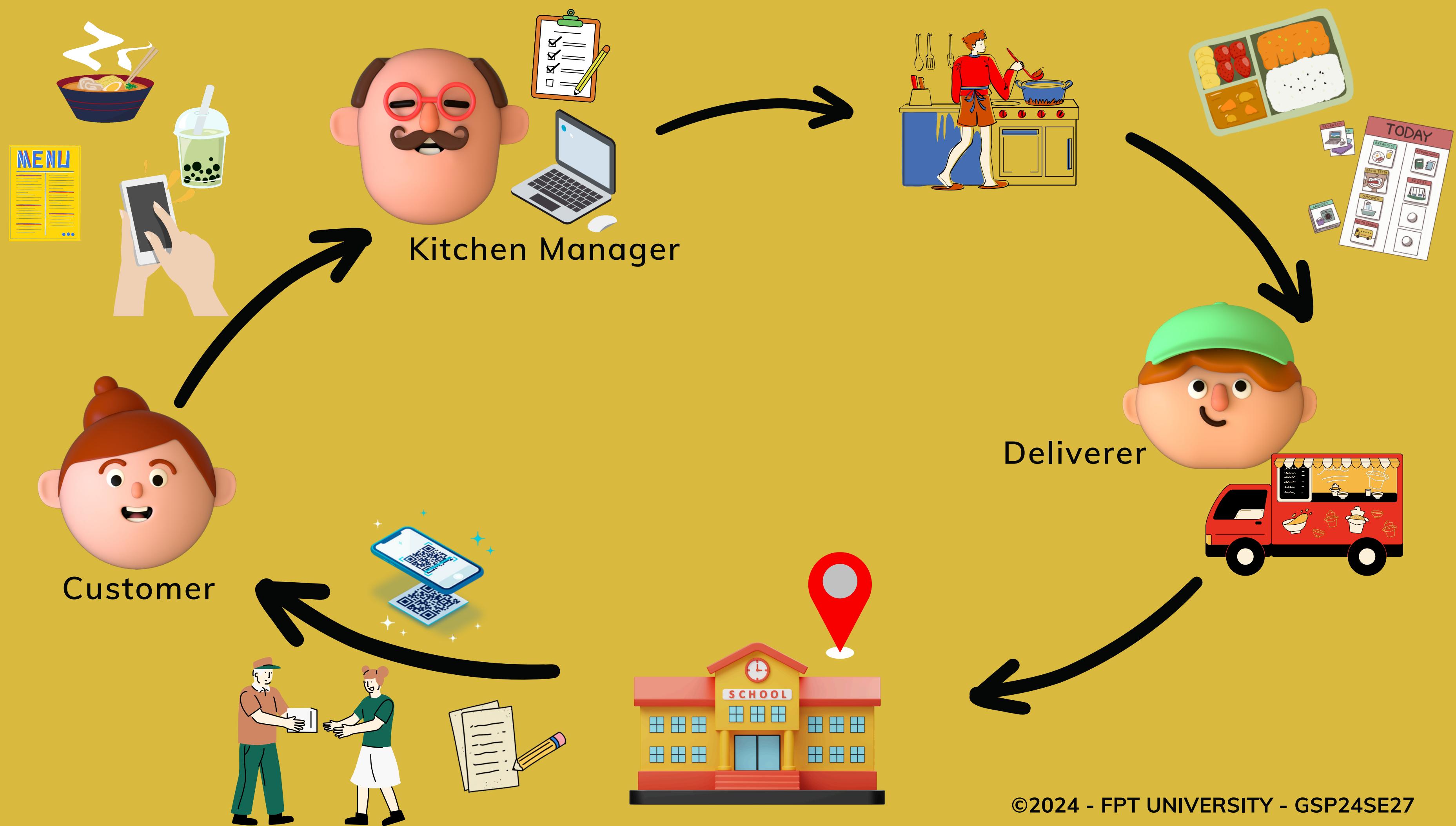
Once the delivery process commences, the status is updated to "Đang giao".



After the delivery person confirms successful delivery, the order status changes to "Hoàn thành".



Orders past delivery time not confirmed as completed will be marked as "Huỷ".





**Gaming does not
need to be tied
to a specific
student.**

**Students and parents pool wallets for
points in games and gift exchanges,
which still rely on school and student
details.**

Fix sequence diagram and use case diagram.

01

Sequence diagram has been revised to match the project architecture.

02

Use case diagram is drawn according to standards

ACTORS

Roles in the system



Customer



Kitchen Manager



Deliverer



Administrator

Technologies



C Sharp (.Net 7)



MS SQL Server



Flutter



Dart

3rd party



Firebase

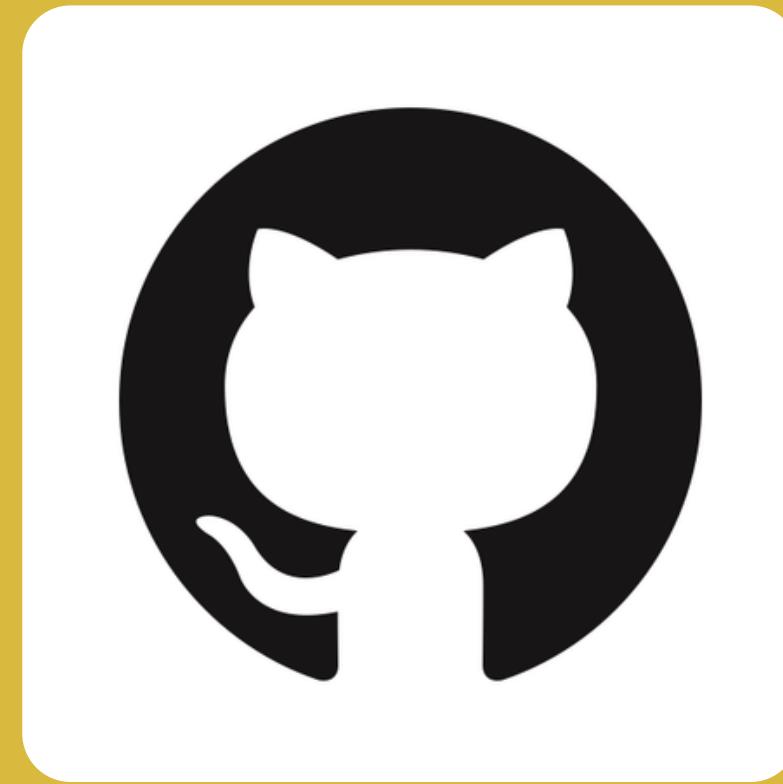


Send SMS OTP



Payment gateway

Management & Deployment



Github



Azure



Basic Features





Customer



Register account - log in

Create child profile

Recharge the app

View food menu based
on child school - session

Ordering food for a child

Exchange a gift by
using a point.

Play game to get points

Get notifications

Kitchen Manager



Log in account

Manage orders

Manage schools

Manage food

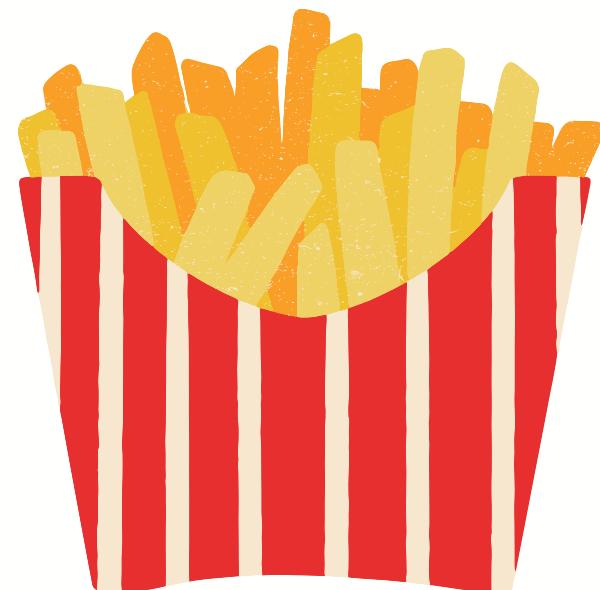
Manage gifts

Manage menus

Session Management



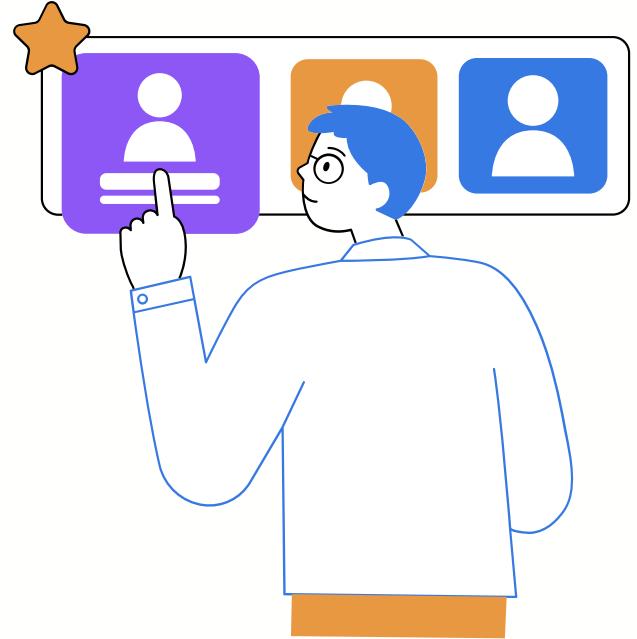
Deliverer



Log in account

View delivery schedule

Scan QR code



Administrator

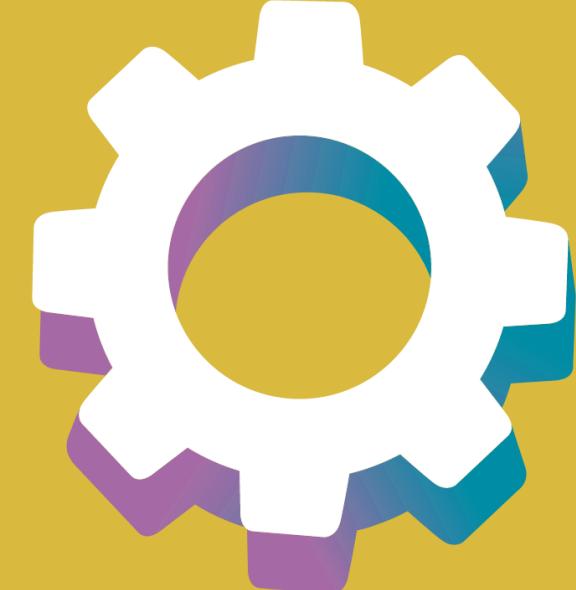
Log in account

Manage delivery accounts

Manage kitchen placement

Manage customer accounts

Manage kitchen manager accounts





Main Flow & Demo



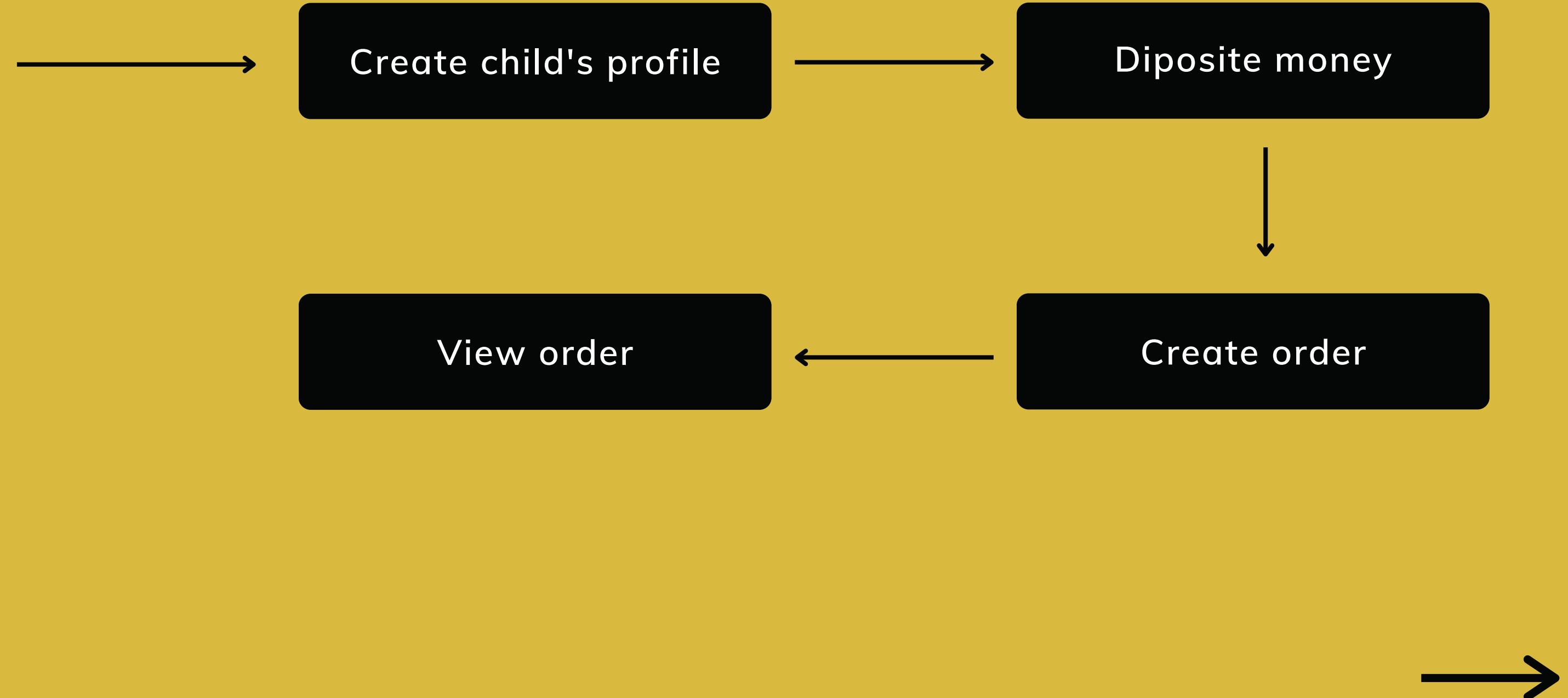


Kitchen Manager





Customer





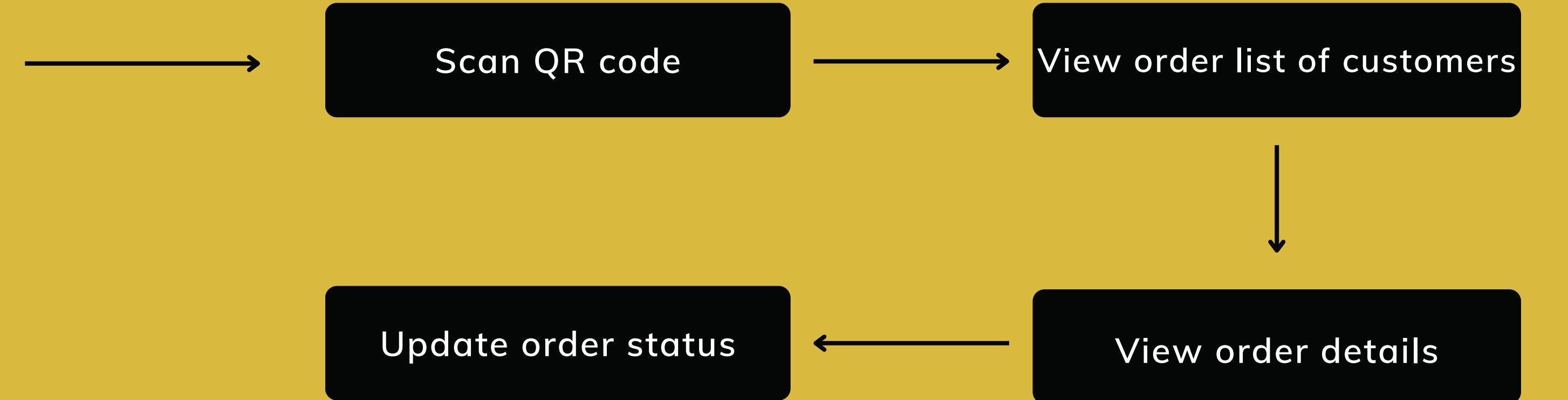
View order

Kitchen Manager





***D*eliverer**





Demo



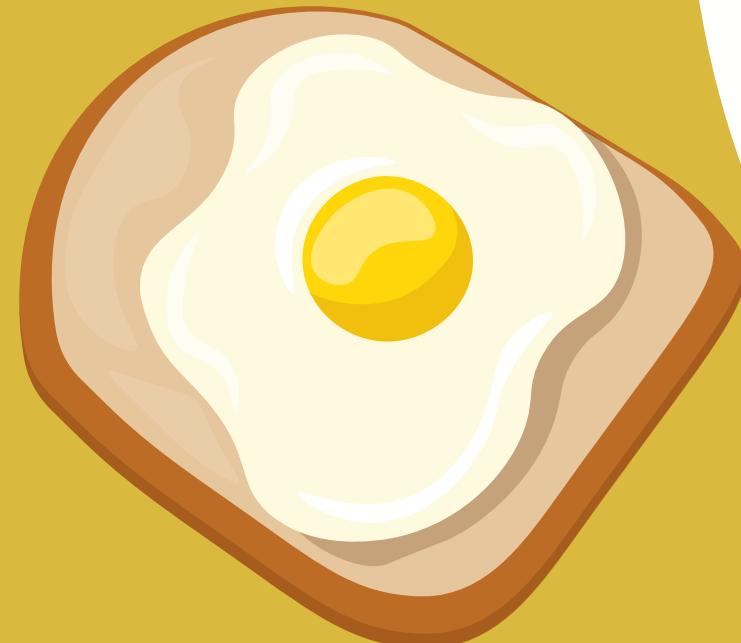


System architecture

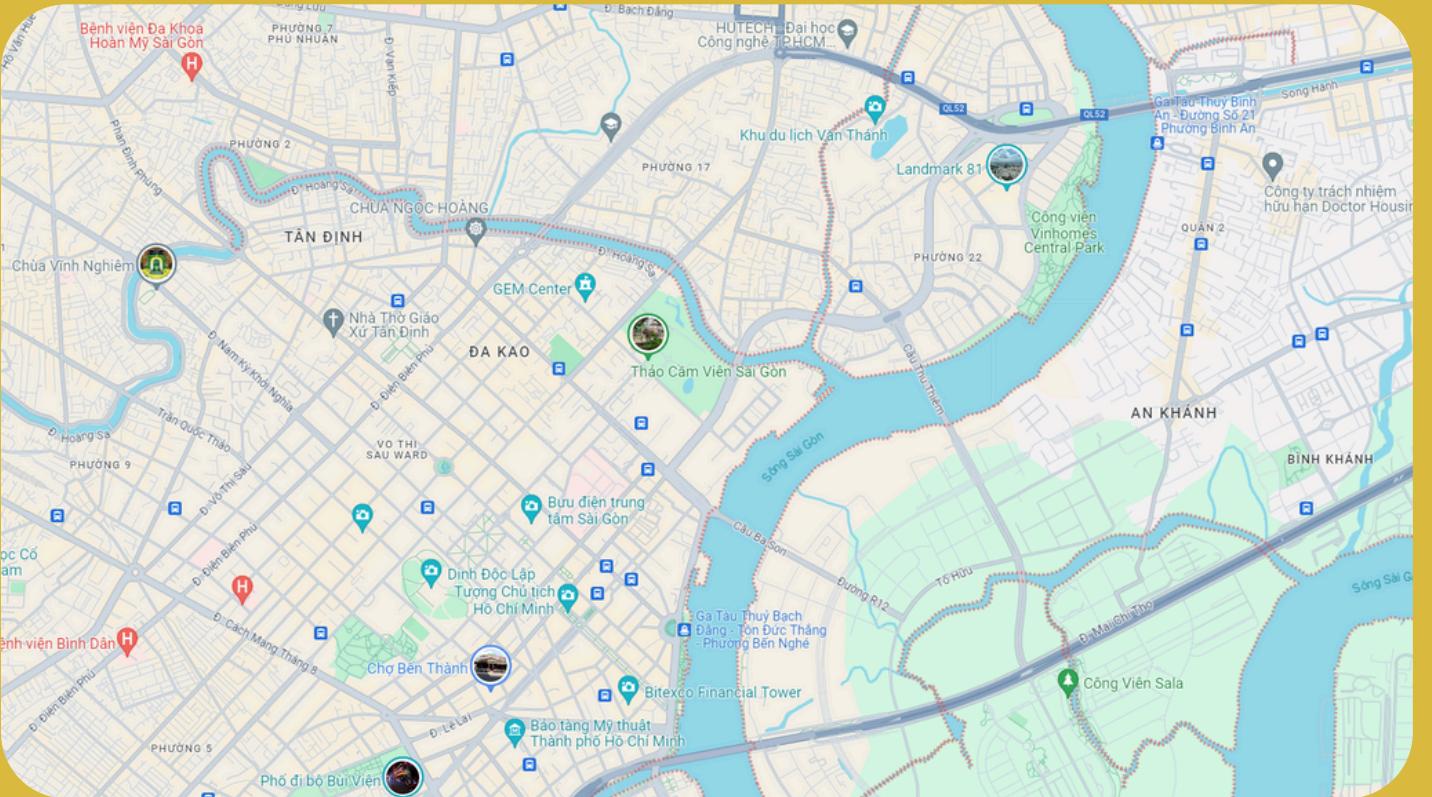




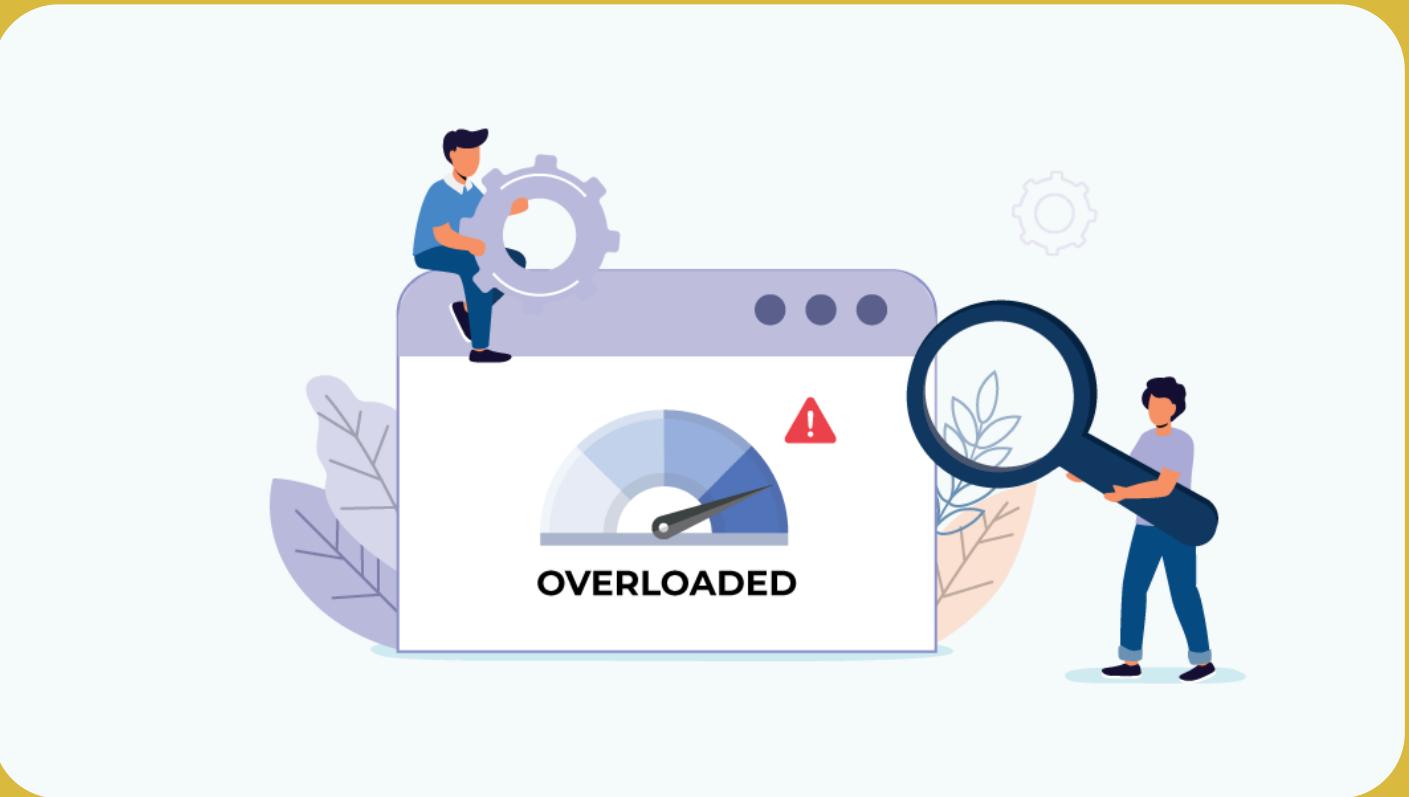
Conclusion & Future Plans



Limitation



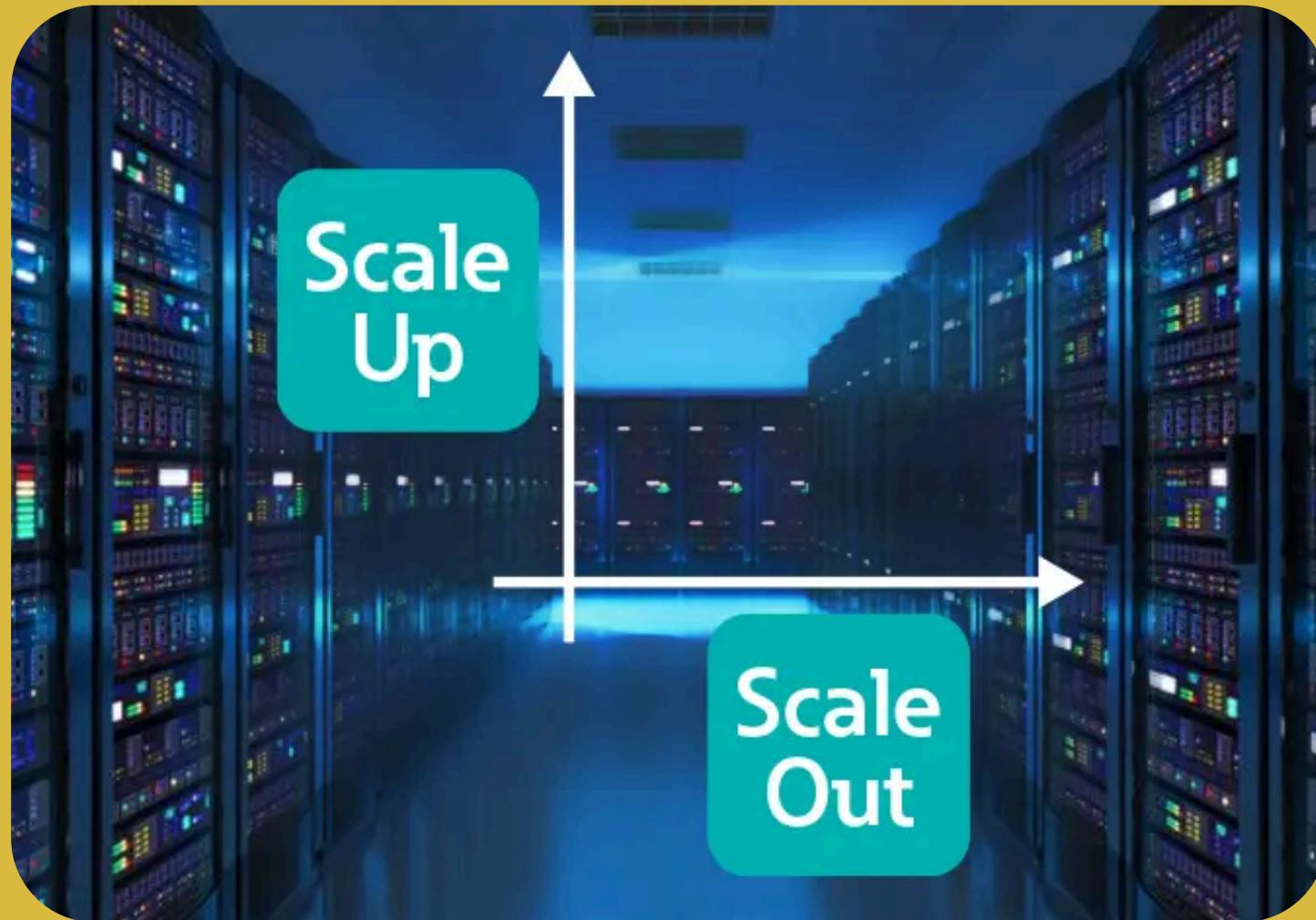
The delivery does not currently suggest optimal directions or real-time map updates for management.



The system is not yet subject to a large user load.

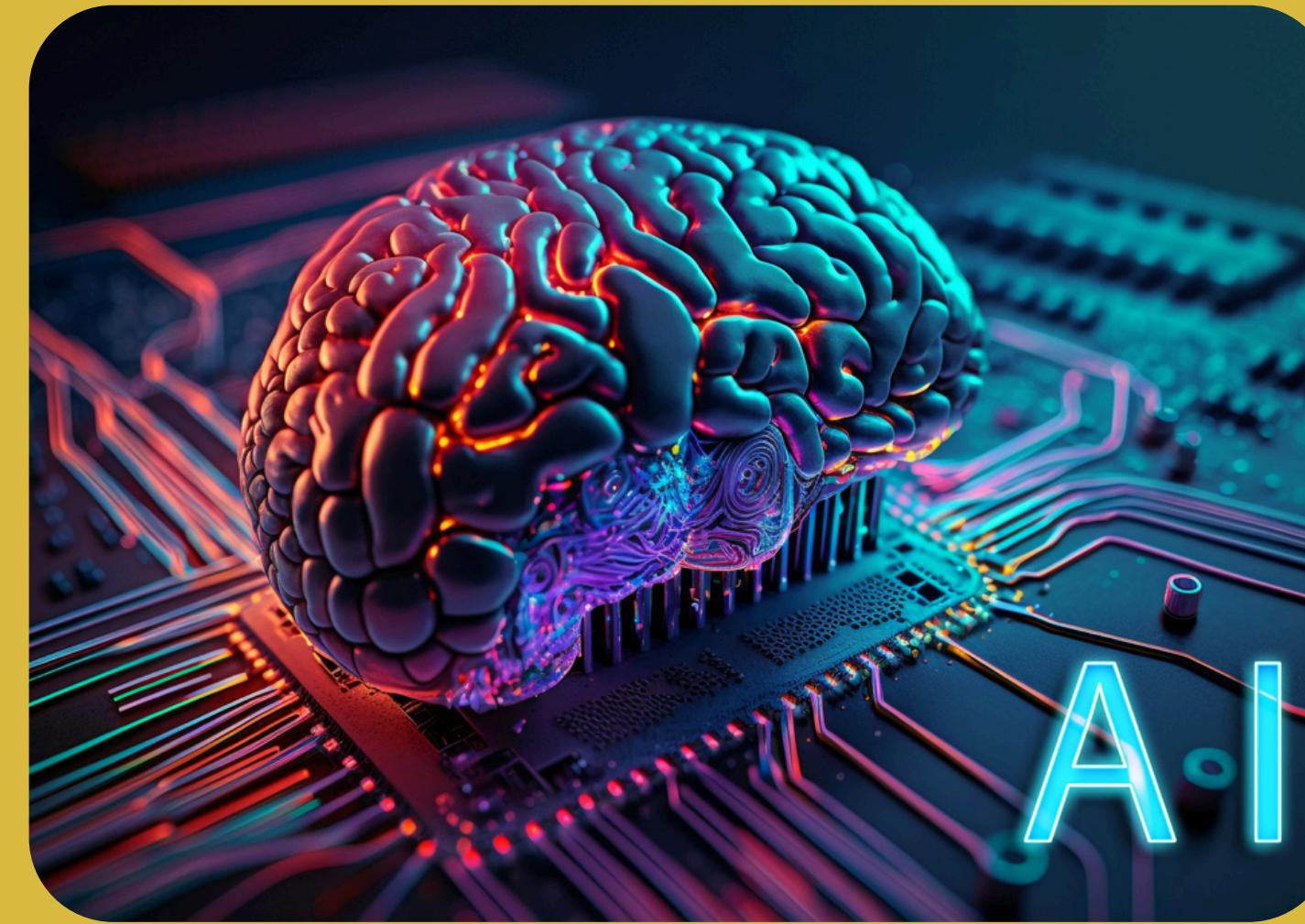


Future plan



Scale Up: Enhance performance through the implementation of database caching.

Scale Out: Expand by renting extra servers to handle each service independently and boost performance.

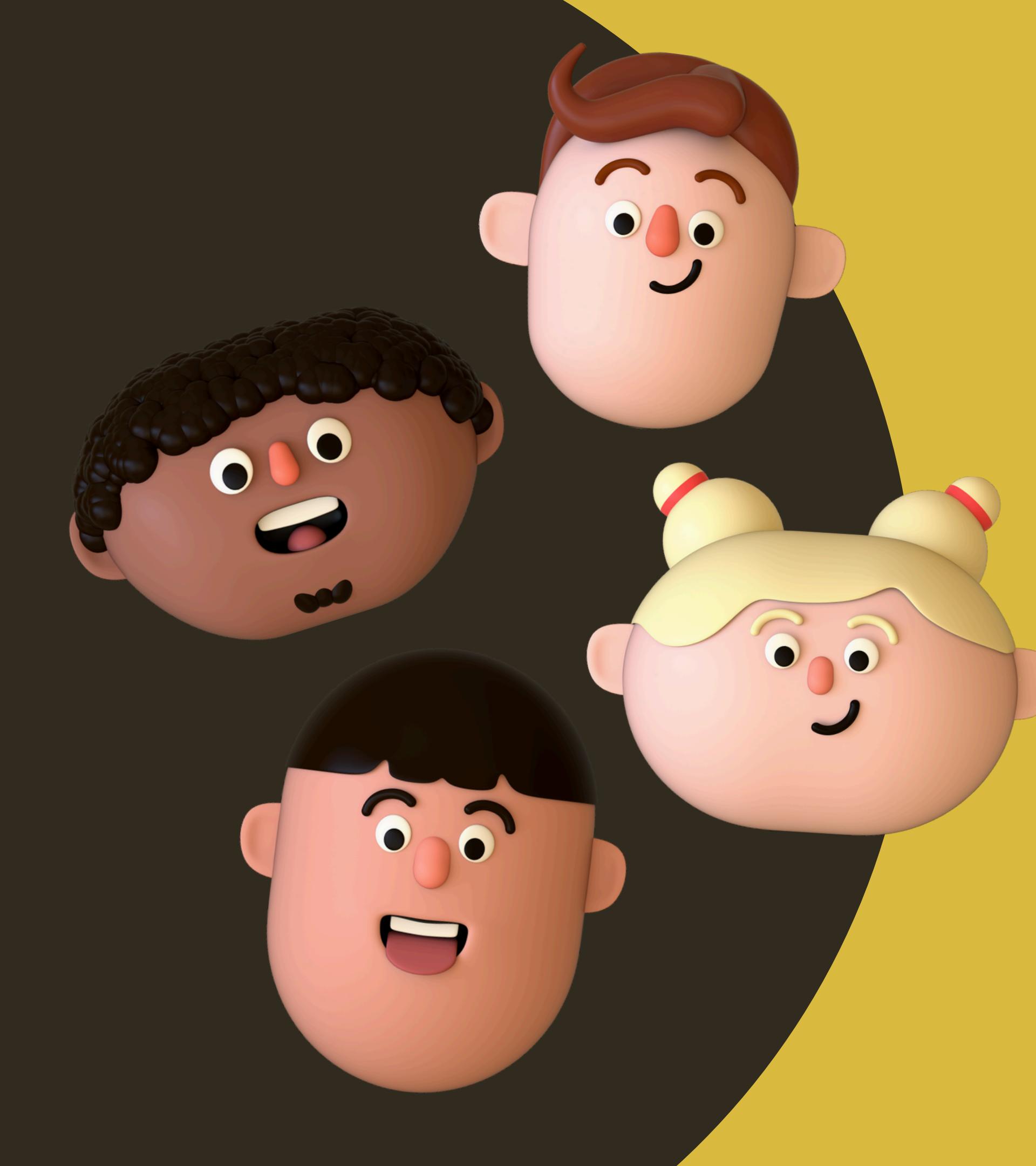


The system recommends meals based on students' habits and BMI.

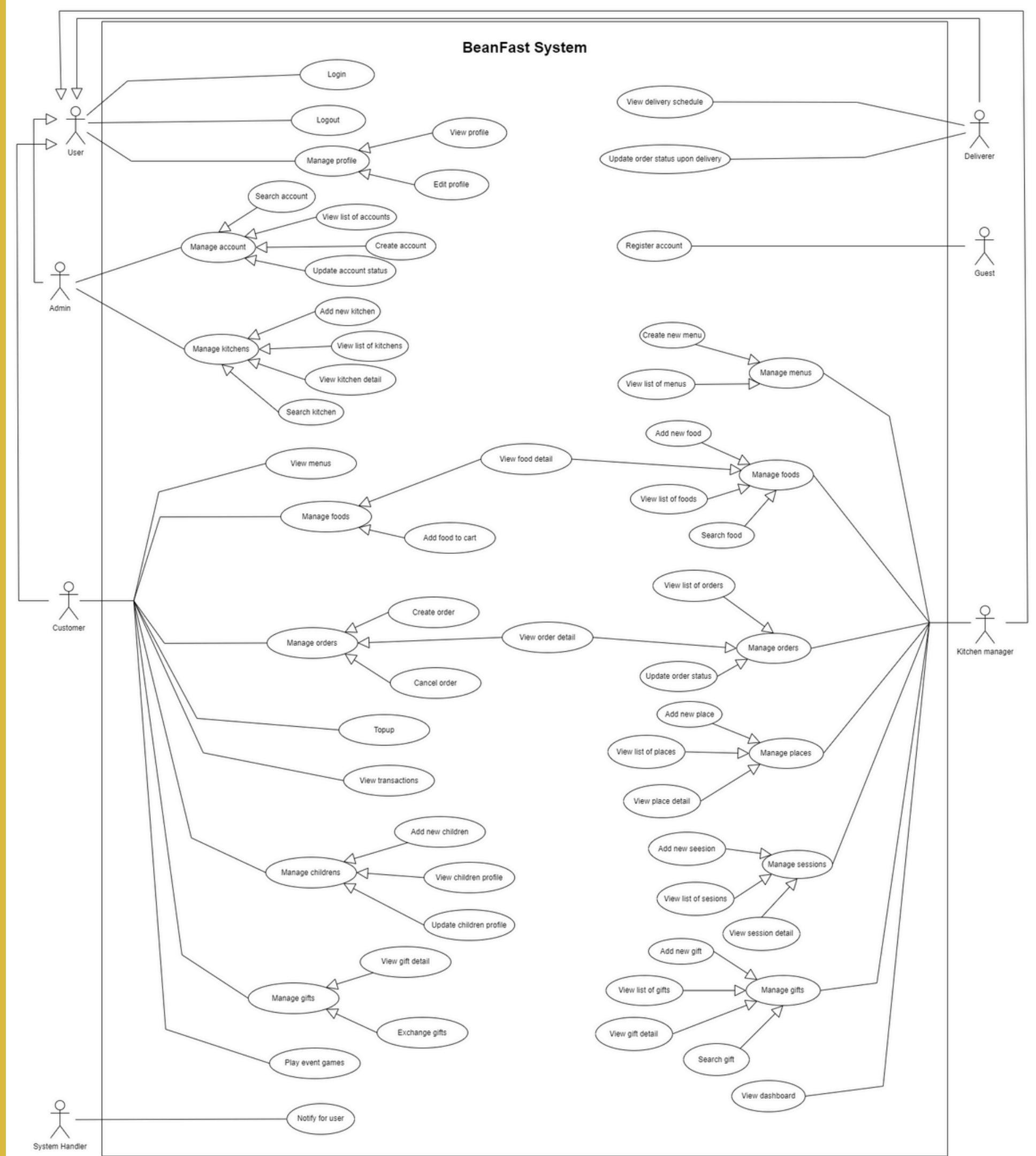


Thank you for listening!



A group of four cartoon characters (three boys and one girl) are peeking over a dark grey diagonal wall on a yellow background. The characters have large heads and expressive faces. The boy on the far left has dark skin, curly black hair, and is looking surprised. The boy in the middle has light brown hair styled in two buns with red ribbons and is smiling. The boy on the right has dark hair and is also smiling. The boy at the top has brown hair and is looking slightly to the side.

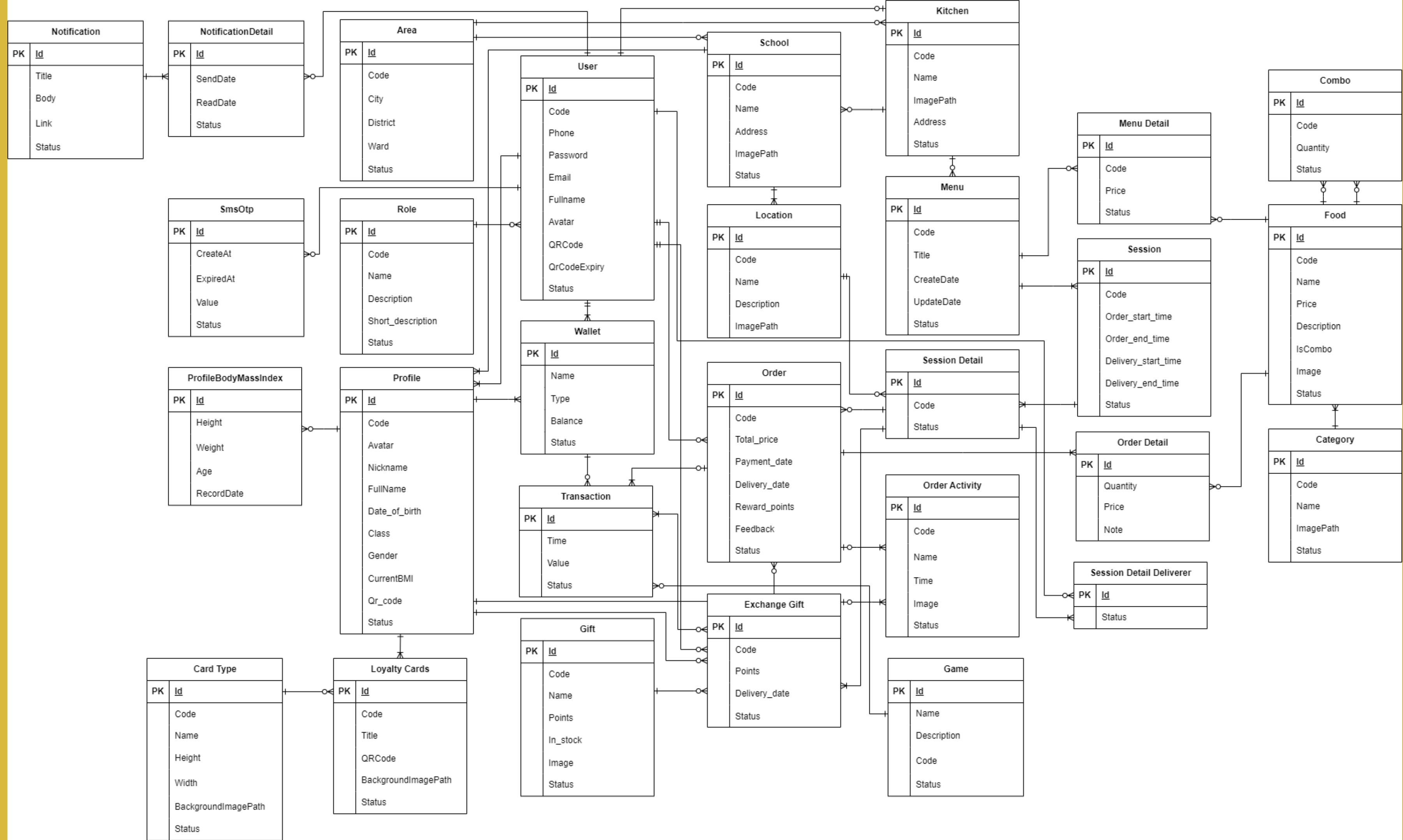
Use Case Diagram

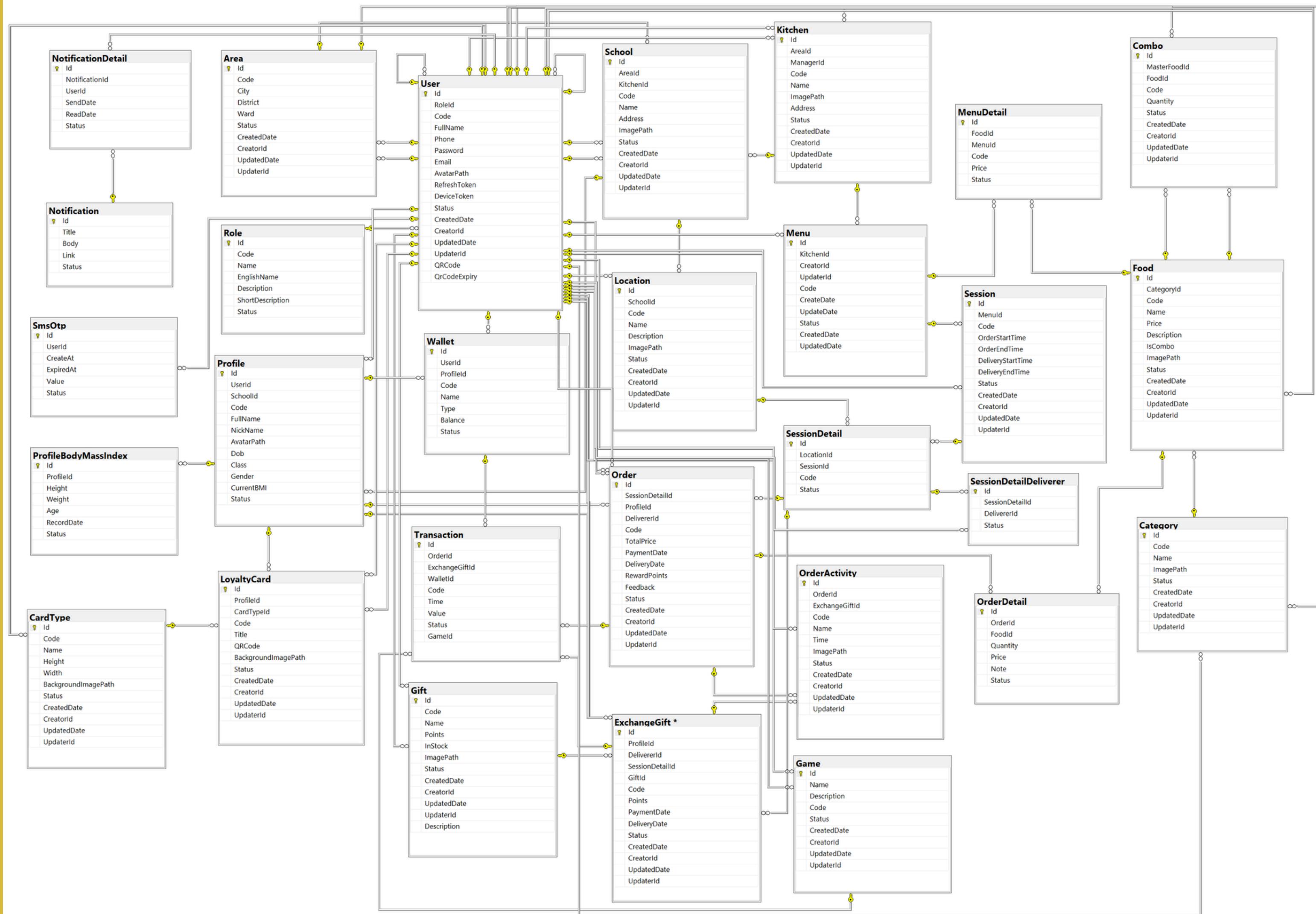




Logical ERD & DB

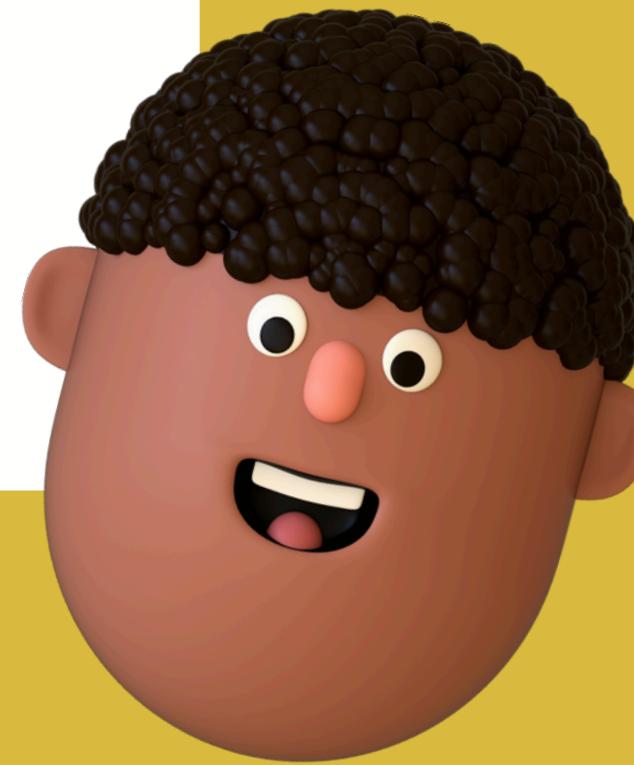








State Machine Diagram



Order State Machine

