

CS 5336/7336 - Web Application Development

Fall 2025

FrontDash Project Navigation

This document explains the project by walking through the functionalities performed by various users.

Landing Page

Should be mainly for customers, displaying restaurants and menu items. Include a link to “Login” by other users.

Optionally, this page may include `FrontDash` picture and some services it offers and then take to customers’ view.

Customers

1. Select a restaurant.
2. Select one or more menu items.
3. When finished, go to view the bill/cart which includes items, subtotal, tax, tip and grand total.
 - If accepted by customer, go to payment information and/or delivery address.
Billing address of credit card and delivery address must use the same structure. Do not use just one string for billing address and a structure for the other.
When finished, go to “Order creation”.
 - If canceled by customer, go back to “Landing Page”. Indirectly, it says you should include a ‘cancel’ option.
4. “Order creation”: Display the order number and other details of the order including (i) the date and time of placing this order, and (ii) estimated delivery time. It is this `<date, time>` that should be recorded along with order details. The ‘estimated delivery time’ should be auto-generated. At this stage, it can be set to any reasonable value. In this project, you do not need to validate this value.
When finished, go to “Landing Page”.

Restuarant Owners

If not registered, register the restaurant with all the details given in the project description.

- Make sure to include all the details.
- Street address should have the same structure as used when entering billing address or delivery address of a customer.
- Hours of operation must be a structure indicating opening and closing time for each day. If you are using a String to represent this information, then you are responsible to parse that String to indicate when the restaurant is open or closed. Customer should see this information when they browse the restaurants.

If registered, login with the given credentials. A logout button or link should appear if successfully logged in. Perform one of the actions listed below:

- Change password (**required, if it is the first-time login**).
- Change menu
- Change opening hours
- Change contact information
- Withdraw from ~~FrontDish~~.
- Logout

Administrator

Login with the given credentials. A logout button or link should appear if successfully logged in. Perform one of the actions listed below:

- Change password.
- Add a new staff member - Only enter ‘firstname’ and ‘lastname’ of the new staff member. The username of the staff member and password must be auto-generated (see the project description for username creation). Communicating this login credentials to the staff member can be done through email if the staff member email address is also given. Otherwise, it is assumed that the communication is outside the scope of this project.
- View the list of staff members currently in the system. Even though this is not explicitly stated in the project description, it is still required in order to select a staff member to delete (see the next item).
- Delete the selected staff member. You can hard delete this staff member so that if they are hired again, the administrator should create a new account. If you decide to soft delete (inactivate) this staff member, you can reactivate the staff member if they are hired again. The uniqueness of username must be checked in that case.

- Hire a driver - Only enter a unique name (may include firstname and lastname). **Drivers do not have accounts and so they do not interact with the system directly.**
- View the list of drivers currently in the system. Even though this is not explicitly stated in the project description, it is still required in order to select a driver to delete (see the next item).
- Delete the selected driver. You can hard delete this driver so that if they are hired again, the administrator should add them again. If you decide to soft delete (inactivate) this driver, you can reactivate the driver.
- View the list of registration requests for new restaurants. Even though this is not explicitly stated in the project description, it is still required in order to select a request and act on it (see the next item).
- Approve or disapprove the selected registration request.
 - If approved, an account should be created for this restaurant. Username for this account can be auto-generated or let the restaurant owner specify at the time of registration or you can use the email address of the restaurant. Password must be auto-generated. The login credentials must be sent to the restaurant owner through email which is specified in the registration.
 - If disapproved, a reason must be sent to the restaurant owner through email which is specified in the registration.
- Approve or disapprove the selected withdraw request.
 - If approved, the associated account should be deleted in the database and a message should be set to the restaurant owner through email which is specified in the registration. You can use hard delete or soft delete for this operation.
 - If disapproved, a reason must be sent to the restaurant owner through email which is specified in the registration.
- Logout

Staff members

Login with the given credentials. A logout button or link should appear if successfully logged in. Perform one of the actions listed below:

- Change password (**required, if it is for the first-time**).
- View the list of orders - Even though this is not explicitly stated in the project description, it is still required in order to select an order and act on it (see the next item).

- Retrieve an order - by default, it should retrieve the first order in the queue. You can provide additional options to select any order from the list.
Assign a driver for the selected order. This action should be on the same page as that of the order.
- Retrieve an order for which a driver has already been assigned. This is required because the staff member must update the status of the order and record the delivery time.
Read the clarifications document posted on Canvas.
- **Ignore the computation of estimated delivery time by a staff member. The estimated delivery time must only be computed automatically by the system when a customer places an order and will not be changed afterwards. If you wish, you can have the staff member adjust the algorithm that computes the estimated delivery time.**

Bonus

If you include the bonus section on customer discounts,

- Customer must register with the details as stated in the problem description. Customer registration requests should be queued. Administrator should be able to view and approve or disapprove the request. If approved, customer will get a unique number sent through email.
- When customer gets to the billing page, there should be an option to enter their unique number. If entered, delivery address and credit card information of the customer should be auto-filled by the system. **Customer should have an option to edit either them for that particular order only.**
- When order is finally placed, additional information such as points earned, discount applied etc. should be displayed.
- **Notice that customers never login into the system.**

Miscellaneous

- When a user logs in, the logged in username should appear on the top right corner of the screen at all times.
- When a user logs out, the application should go back to “Landing Page”.
- If you include additional features, you have to generate the test data for those features on your own for the final demo. The instructor will provide test data based on the current description of the project only.