

QR Code Ordering Locator

System Overview – QR Code Ordering Locator

The **QR Code Ordering Locator** is a digital restaurant ordering solution that streamlines the dining experience for both customers and restaurant staff. The system is composed of **three main interfaces**:

1. **Customer Mobile App** – for browsing the menu, placing and tracking orders.
2. **Cashier Mobile App** – for managing orders, updating order statuses.
3. **Admin Dashboard (Restaurant Admin)** – for managing menus, tables, staff, and overall system operations.

The solution ensures efficiency by using **QR codes per table**, allowing customers to instantly access menus, place orders, and track order progress in real-time.

Functional Requirements

Customers (Mobile App)

- FR-1** Sign in with email and password.
- FR-2** Signup with (name, email, phone, password).
- FR-3** logout.
- FR-4** reset password.
- FR-5** Update profile.
- FR-6** Submit an enquiry.
- FR-7** View platform name and logo and social/contact channels: Facebook (link to facebook_url), WhatsApp (tap-to-chat with whatsapp_number), Phone numbers (click-to-call phone_number, second_phone_number) in header/footer.
- FR-8** Scan QR code on table to load menu.
- ✓ **FR-9** View menu categories and products with details.
- ✓ **FR-10** Add product to cart and submit order.
- ✓ **FR-11** Track order status (Pending → In Preparation → Ready → Delivered).
- FR-12** Rate orders and leave reviews.
- ✓ **FR-13** Receive notifications on order status changes.
- FR-14** View **About section**: image + description.
- FR-15** Access **Terms & Conditions** page.

Cashier (Mobile App)

- FR-16** Sign in with email and password.
- FR-17** logout.
- FR-18** reset password.
- FR-19** Update profile.
- ✓ **FR-20** View orders.
- ✓ **FR-21** Change order status (Pending → In preparation → Ready → Delivered).
- FR-22** Reprint QR codes for tables.

Restaurant Admin (Mobile/Web)

- FR-23** Sign in using email and password.
- FR-24** Reset password.
- FR-25** Update profile.
- FR-26** logout
- FR-27** Update restaurant with name, logo, working hours, about_image, about_description and terms_and_conditions, manage contact/social info (facebook_url, whatsapp_number, phone_number, second_phone_number), and preview changes before saving (overwriting the single settings row).
- FR-28** Generate unique QR code per table.
- FR-29** Create, read, update, delete (CRUD) cashiers.
- FR-30** CRUD menu categories and products.
- ✓ **FR-31** View/update orders history.
- FR-32** View / hide inappropriate enquiries.

Core Data - Suggested

- **User:** id, name, email, phone, password, role(admin, cashier, customer).
- **setting:** (one row) id, name, logo_url, address, working hours, about_image_url, about_description, terms_and_conditions, facebook_url, whatsapp_number, phone_number, second_phone_number.
- **Table:** id, number.
- **Category:** id, name.
- **Product:** id, name, description, image, price, category_id.
- **Order:** id, customer_id, table_id (optional), total_price, status, timestamps.
- **orderItem:** id, product_id, order_id, quantity, price.
- **order_status_changes:** id, order_id, status, created_at.
- **Review:** id, order_id, customer_id, rating, comment.
- **Enquiry:** id, content, customer_id.