

Development of Smart Ordering System

Raj Kumar. P¹, Sudharsan. R², Vedakeerthi. P³, Zion Pious Shilva. P⁴, Sathish Kumar. M⁵
^{1,2,3,4,5} SNS College of Engineering, Department of Mechanical Engineering, Coimbatore

Abstract- Smart Ordering System is proposed here which simplifies the food ordering process. The proposed system shows a user interface and update the menu with all available options so that it eases the customer work. Customer can choose more than one item to make an order and can view order details before logging off. The order confirmation is sent to the customer. The order is placed in the queue and updated in the database and returned in real time. This system assists the staff to go through the orders in real time and process it efficiently with minimal errors

I. INTRODUCTION

The labour wages are increasing steadily year on year thus making it difficult to find employees. The food industry is highly labour intensive and the biggest expense in the food industry is the cost of employing the right kind of people to do the work. One of the ways to reduce this expense is to use modern technology to replace some of the jobs done by human beings and make machines do the work. Here we propose an “Smart Ordering System” that has been designed for Fast Food restaurant, Take-Out or College Cafeterias. The system can also be used in any food delivery industry. This simplifies the process of food ordering for both the customer and the restaurant, as the entire process of taking orders is automated.

II. LITERATURE REVIEW

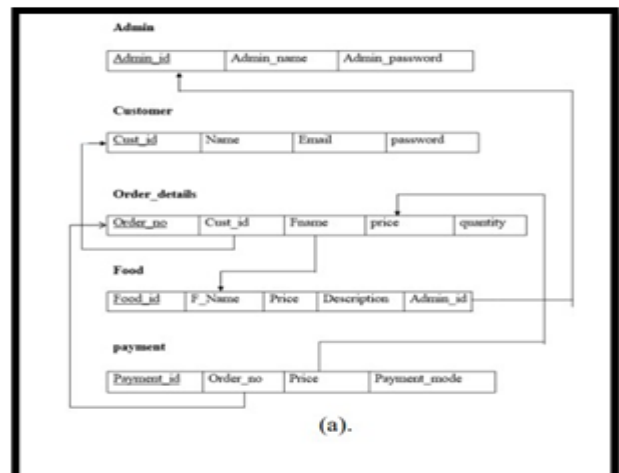
Various case studies have highlighted the problems faced while setting up a restaurant. Some of the problems found during the survey in the existing system are listed below:

- To place the orders customer visits the restaurant, checks the menu items available in the restaurant, and chooses the items required, then places the order and then do the payment. This method demands manual work and time on the part of the customer.
- When the customer wants to order over the phone, customer is unable to see the physical copy of the menu available in the restaurant, this also lags the verification that the order was placed for the appropriate menu items.

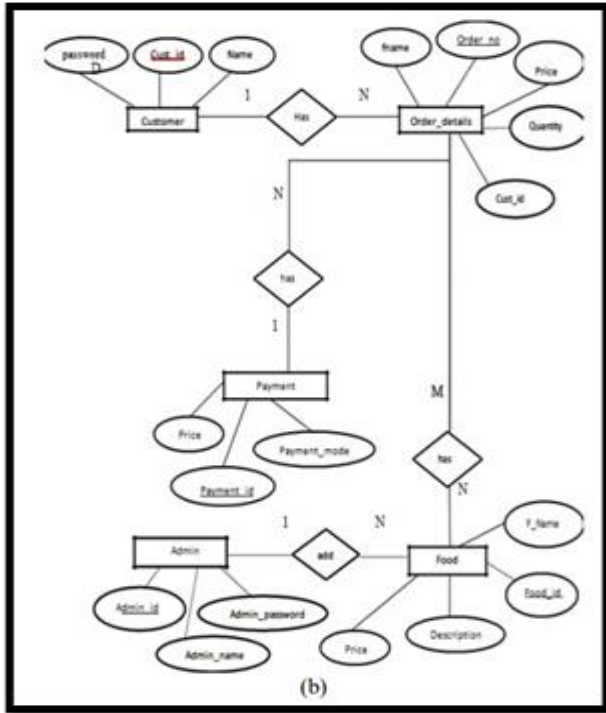
- Every restaurant needs someone or the other to take the order personally or over phone, to offer the customer a rich experience and even to process the payment

III. METHODOLOGY

The simulation first starts with the customer entering his/her credentials (name, ID and password). Once that has been verified, the customer can place an order specifying the quantity of the food required. Now we get a window that displays the order number, customer ID, food name, price and quantity. Once the customer finalizes his/her order, they are redirected to the payment window where the total price is displayed, and the customer can select the payment method of their choice and then the customer gets a message of confirmation of order. The block diagram and the ER Diagram of the proposed Smart Ordering System is given in Figure 1 (a) and (b). The above-mentioned simulation flow is with respect to the customer's point of view. Now if you are an admin, you can select the normal login option and enter the admin credentials (email ID and password). Once you enter the admin portal, you get the option of adding food, deleting food or updating food. Any option of choice leads you to the food menu. Once the selected operation is carried out, the end result, i.e, the added food or the updated food list is displayed and if you have deleted a food, that particular food disappears from main menu.



Block diagram Figure 1 (a)



III.SOFTWARE REQUIREMENTS

PHP: Hypertext Pre-processor is language which began for developing web applications, is also a general-purpose programming language. PHP code is executed in a given order where it is first started by a PHP interpreter, which is then implemented as a web server module. The output of both of the interpreted and executed PHP code is combined by web server, which may be any type that is associated with the created web page .

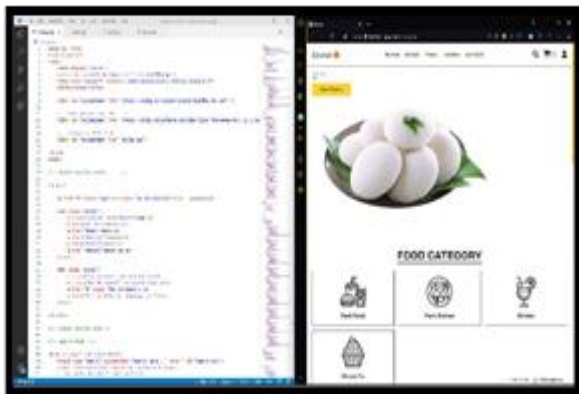
MySQL: It is an open-source relational database management system (RDBMS). MySQL is the central component of the XAMPP open-source web application software stack. XAMPP is an acronym for "Windows, Apache, MySQL, and Perl/PHP/Python". From source code MySQL can be built and installed manually, but it is always installed from a binary package due to customization. Although further steps is required to alert the security and optimization settings.

Block diagram Figure 2 (b)



Customer’s Website:(1)

Sample Code



Program and Output

HARDWARE REQUIREMENTS

- A tablet with minimum storage 8GB ROM and 2GBRAM is used.
- A desktop computer with Intel Core i3 64-bit processor and Graphic card 1 GB RAM, and Microsoft Windows10 operating system was used.

ADVANTAGES

Following are the results that one can draw from this system:

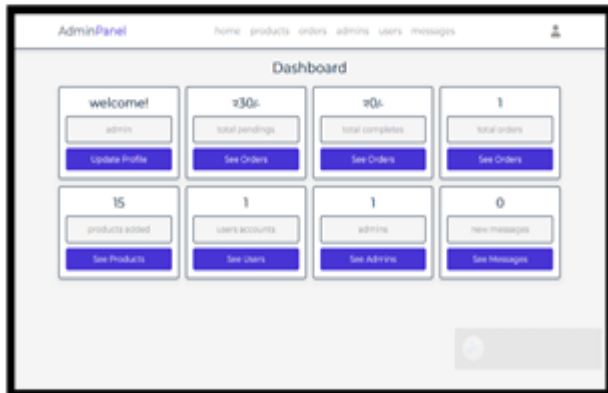
- People can successfully order thefood using the proposed system.
- There will be a lesser requirementof staff at the back counter.

- The system will help in reduction of labour cost involved and also reduces the space required to set up cafeterias in the restricted area.
- As it is an automated system it is less probable to make any mistakes.
- The customers can avoid the long queues at the counter, with a reasonable speed of execution and maximum throughput. The snapshot of various stages of the food ordering system on the website is shown below.

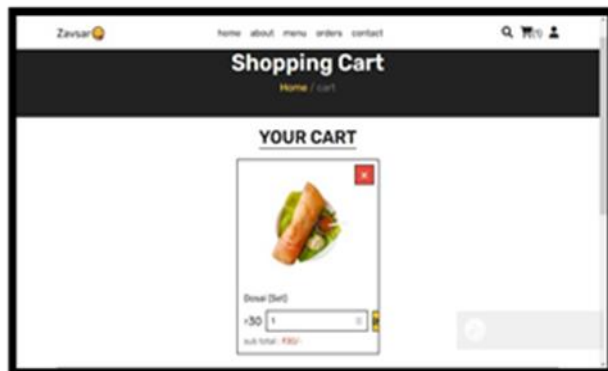
Customer: Home Page



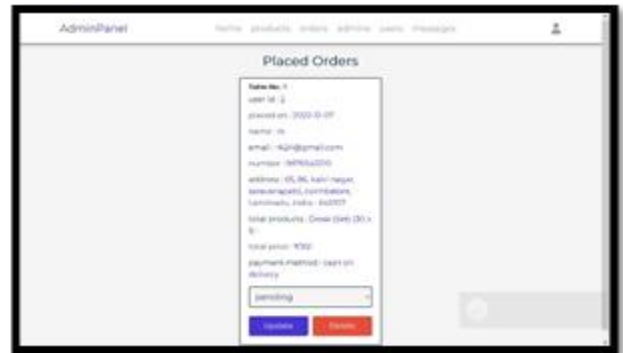
Customer: Menu Page



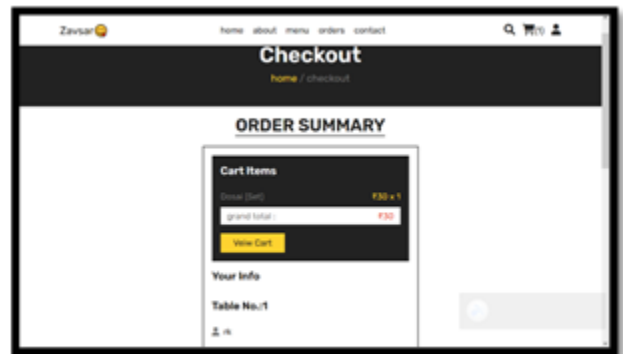
Customer: Cart Page



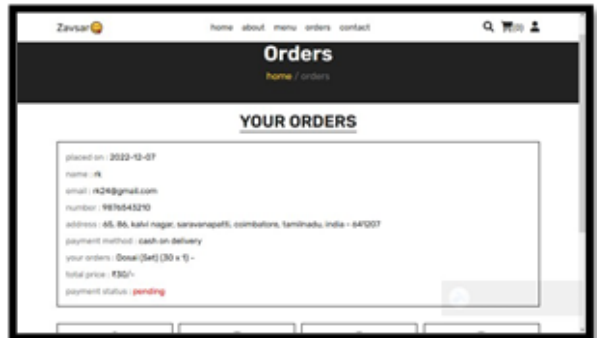
Admin: Home Page



Customer: Checkout Page



Admin: Placed Order Page



Customer: Order Summary Page

Admin Website:

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