

Desktop Application

The home page of the developed pediatrics information system was shown in figure 1. This page provides an overview about the system.

Figure 2 showed the admin's login page, Figure 3 showed the receptionist's login page, Figure 4 showed the doctor's login page, Figure 5 showed the lab attendant's login page. These pages provide a secured environment for authorized member to login into the system. Such authorized members are required to provide a valid username, ID Number and password assigned to them by the system administrator.

Figure 6 showed the incorrect login page.

Figure 7 showed the admin's portal. This enables such an admin to manage patient, doctor and receptionist details and appointments.

Figure 8 showed the receptionist's portal. This enables such a receptionist to manage patient details and appointments, view profile and change password.

Figure 9 showed the doctor's portal. This enables such a doctor to manage patient details and appointments, view profile and change password.

Figure 10 showed the lab attendant's portal. This enables such a lab attendant to manage patient details, view profile and change password.

Figure 11 showed the add receptionist's page, Figure 12 showed the delete receptionist's page, Figure 13 showed the update receptionist's page, Figure 14 showed the search receptionist's page, Figure 15 showed the view receptionist's page. These pages provide a controlled management for receptionists by admin.

Figure 16 showed the add doctor's page, Figure 17 showed the delete doctor's page, Figure 18 showed the update doctor's page, Figure 19 showed the search doctor's page, Figure 20 showed the view doctor's page. These pages provide a controlled management for doctors by admin.

Figure 21 showed the add patient's page, Figure 22 showed the delete delete's page, Figure 23 showed the update patient's page, Figure 24 showed the search patient's page, Figure 25 showed the view patient's page. These pages provide a controlled management for patients by admin, receptionist or doctor.

Each doctor, receptionist and lab attendant can view and edit his profile. Figure 26 showed the receptionist's profile page, Figure 27 showed the list of procedures page that enable receptionist to edit profile.

Each doctor, receptionist can make and edit appointment. Figure 28 showed the appointment page, this enables such a doctor to view and approve appointments scheduled by the patients.

Figure 29 showed the diagnosis and prescriptions of the patients.

Figure 30 showed the successfully added patient, Figure 31 showed confirm delete patient page.

Figure 32 showed the send message form.

Figure 33 showed the outpatient billing form, Figure 34 showed the Inpatient billing form.

Desktop Application GUI Screens:

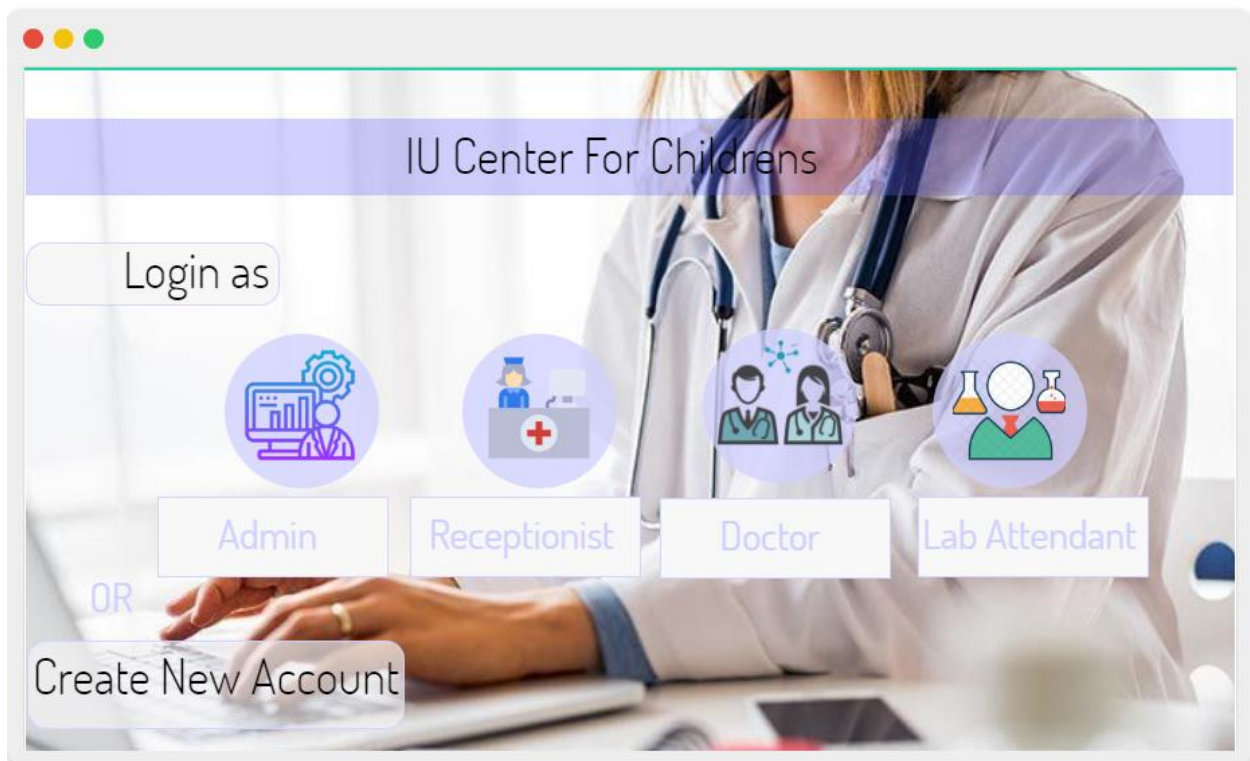


Fig. 1: The Home Page of the Pediatrics Management System

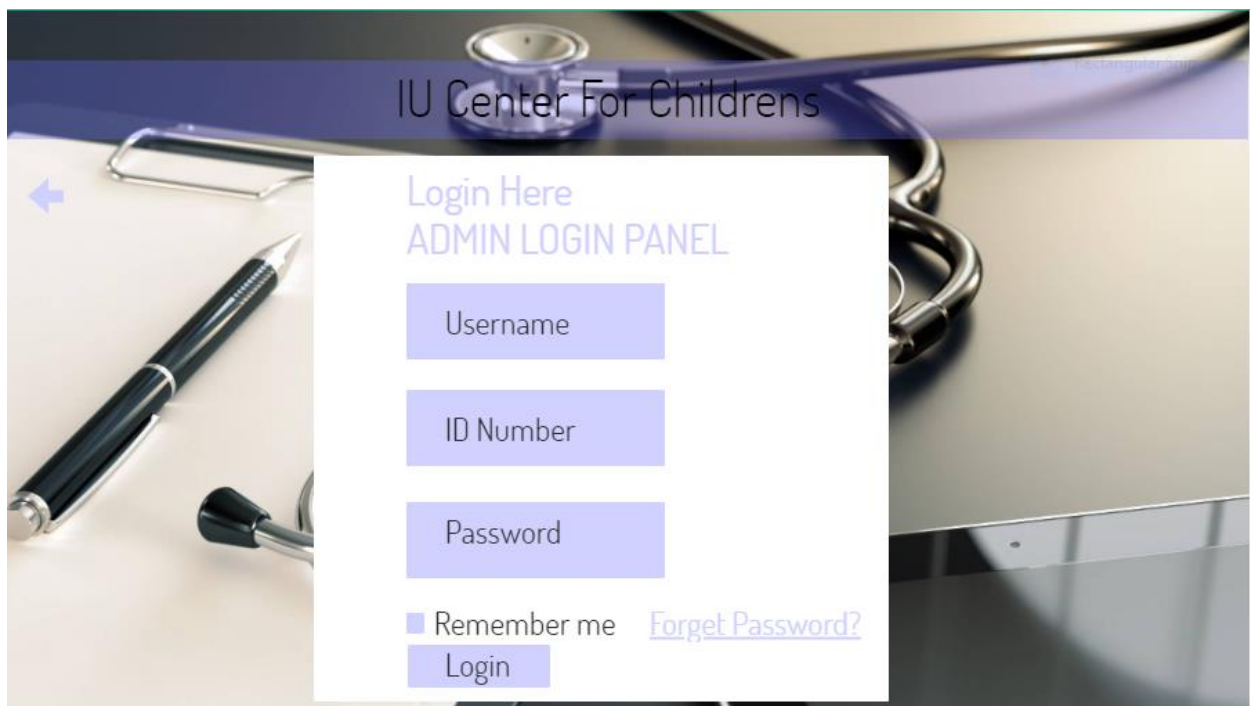


Fig. 2: Admin's Login page

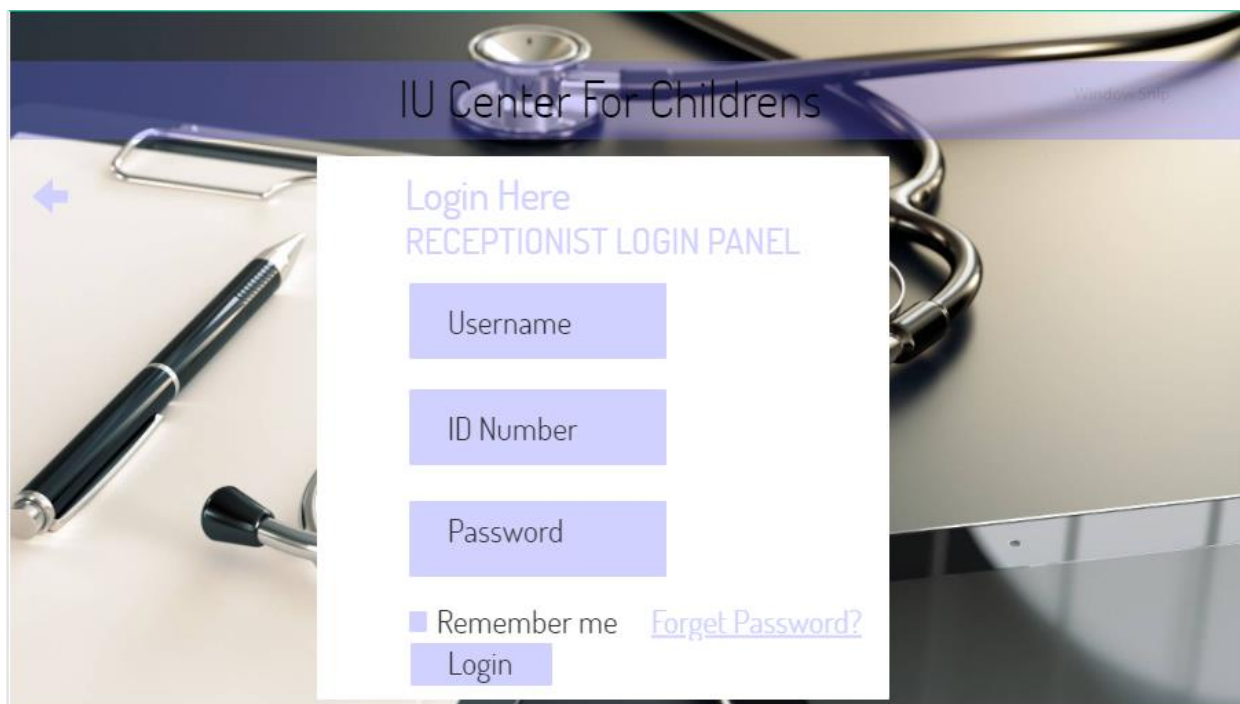


Fig. 3: Receptionist's Login page

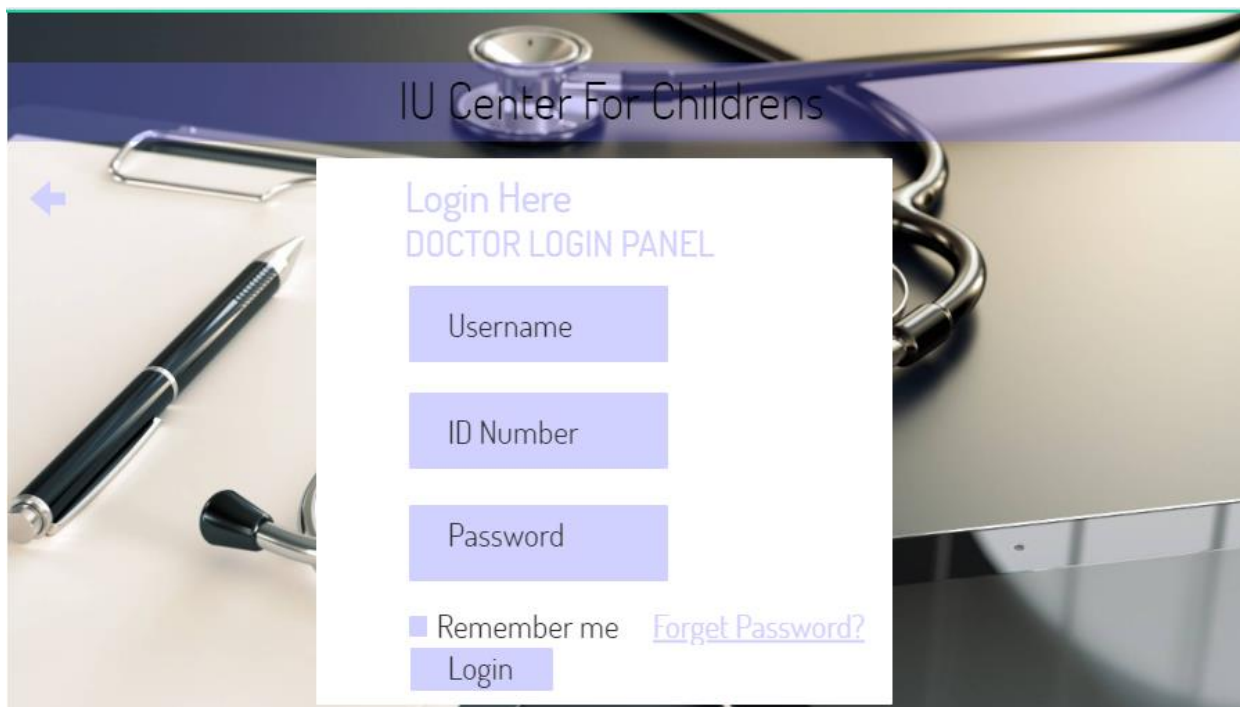


Fig. 4: Doctor's Login page

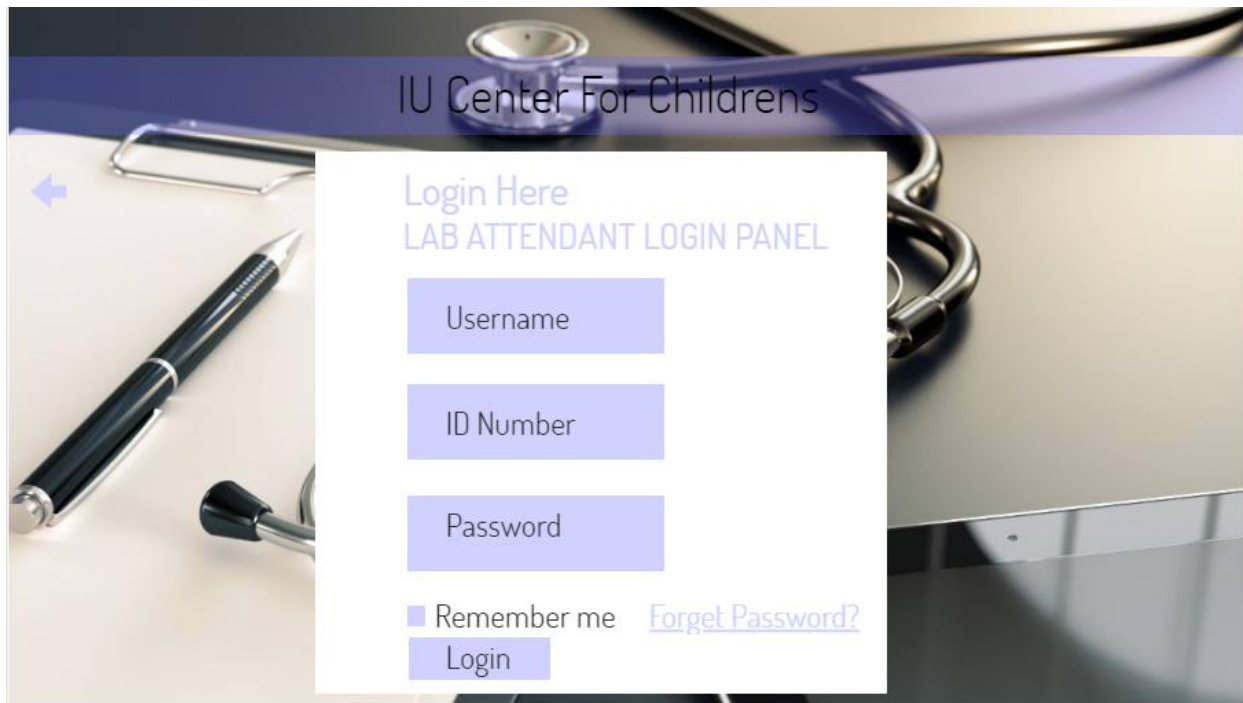


Fig. 5: Lab Attendant's Login page

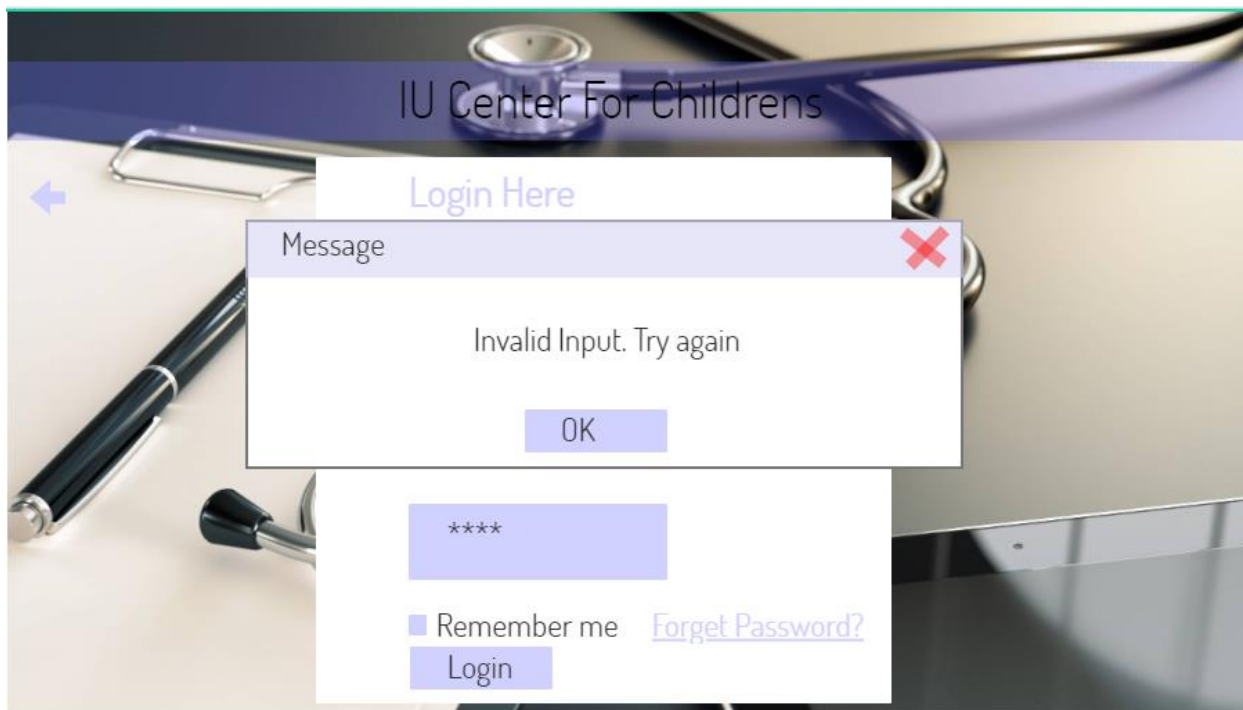


Fig. 6: Wrong Login page

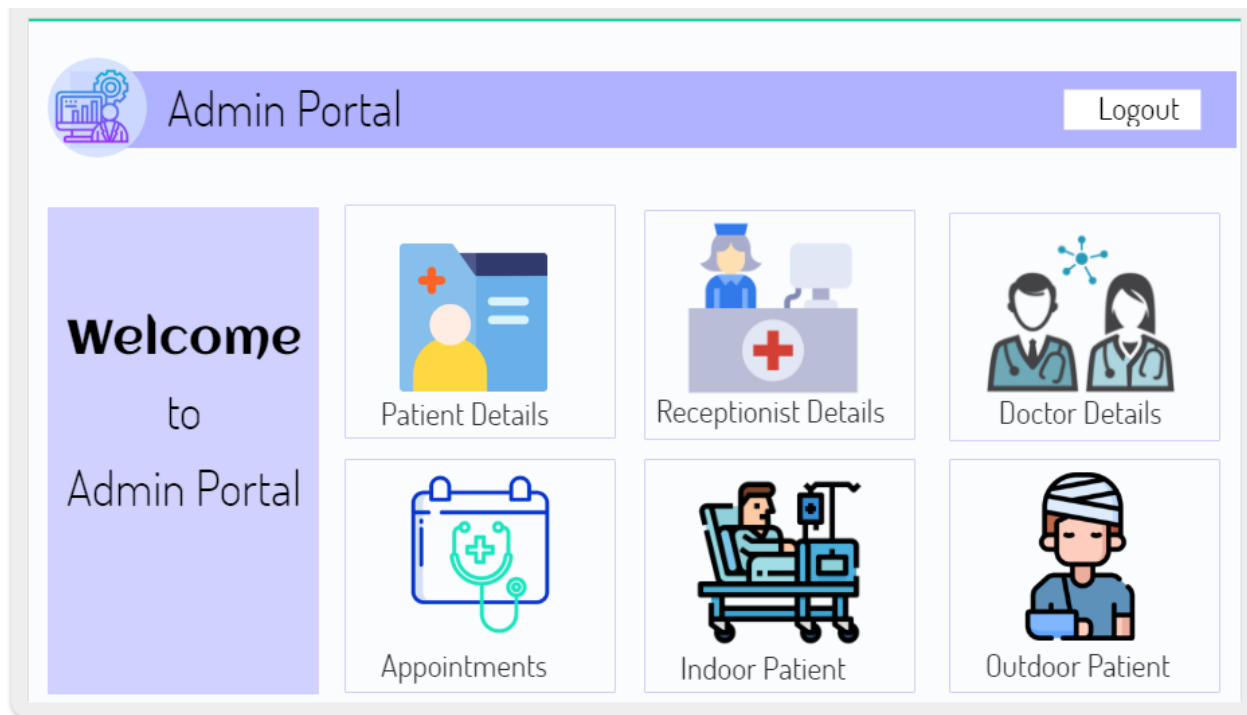


Fig. 7: Admin's portal page

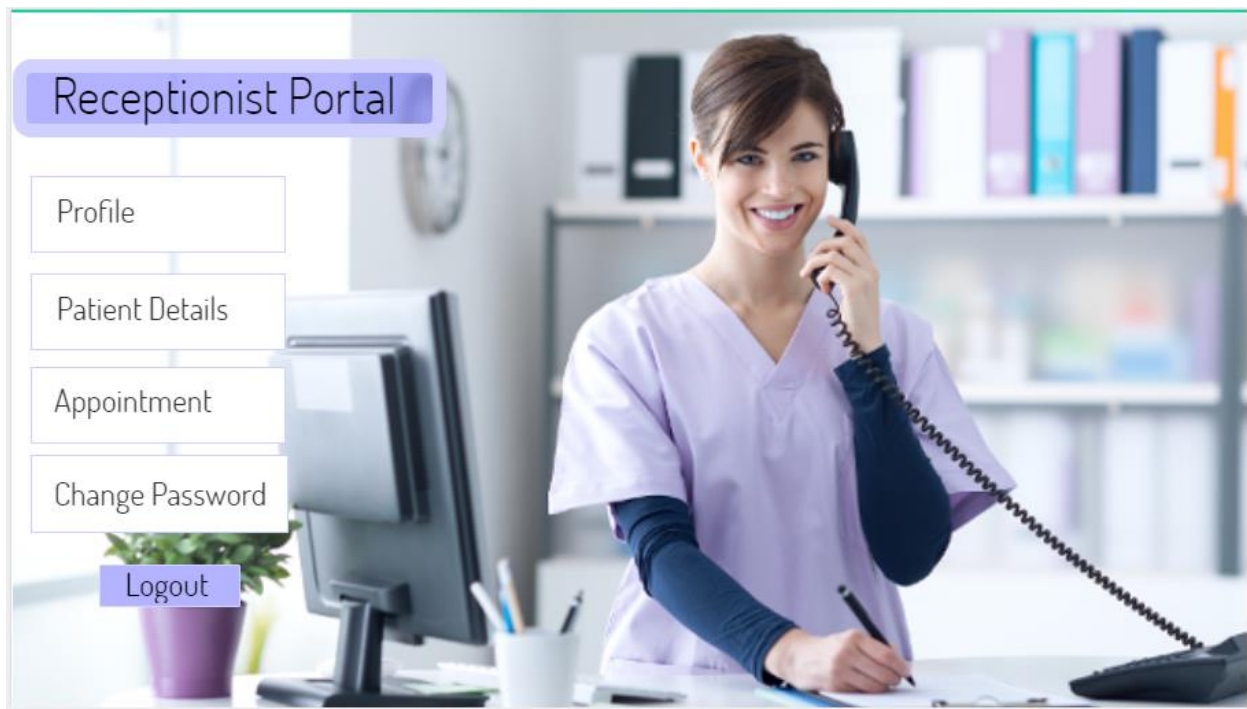


Fig. 8: Receptionist's portal page



Fig. 9: Doctor's portal page

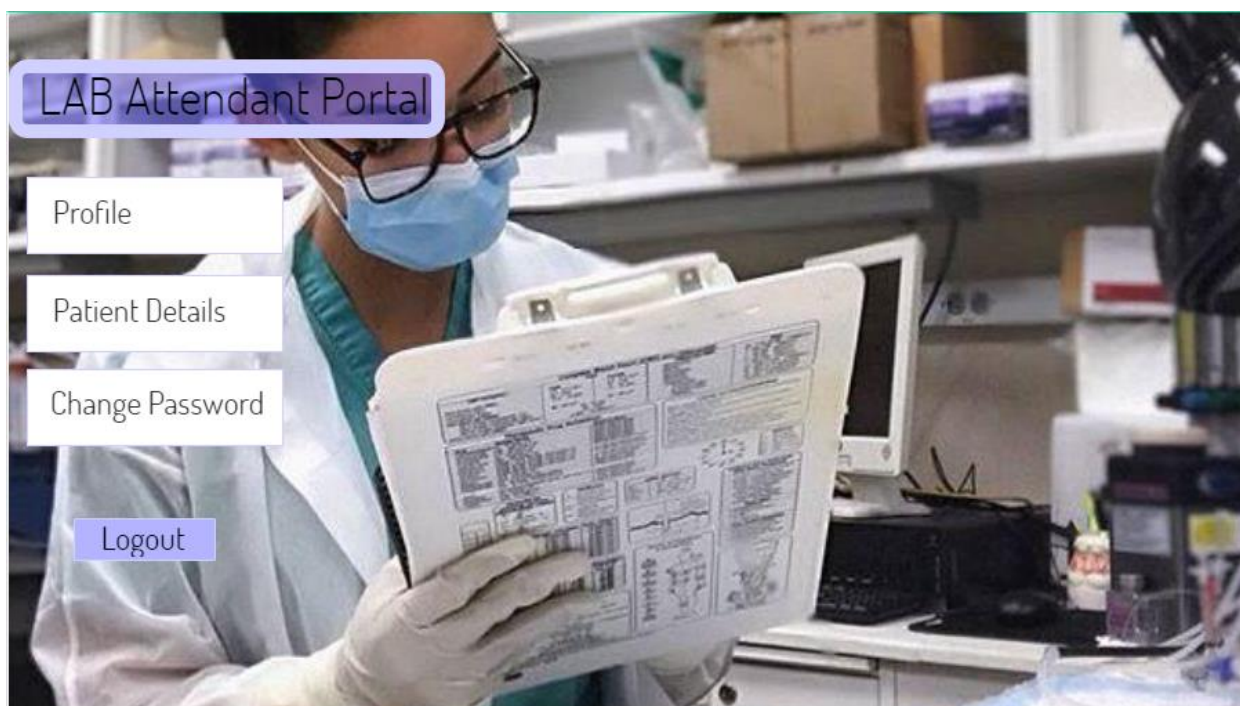




Fig. 10: Lab Attendant's portal page

Add Receptionist
Delete Receptionist
Update Receptionist
Search Receptionist
view Receptionist

 Home
 Logout

Add Receptionist

Receptionist ID

First Name

Last Name

Age

Gender
option

Qualification
option

Blood Group
option

Address

City

Phone No.

CNIC

Marital status
option

Username

Password

Joining Date

Leaving Date

Add






Fig. 11: Add Receptionist page

Add Receptionist
Delete Receptionist
Update Receptionist
Search Receptionist
view Receptionist

 Home
 Logout

Delete Receptionist

Receptionist ID

Search

Delete

First Name

Last Name

Age

Gender
option

Qualification
option

Blood Group
option

Address

City

Phone No.

CNIC

Marital status
option

Username

Password

Joining Date

Leaving Date






Fig. 12: Delete Receptionist page

Add Receptionist
Delete Receptionist
Update Receptionist
Search Receptionist
view Receptionist

 Home
 Logout

Update Receptionist

Receptionist ID

First Name
Last Name

Age
Gender ▼

Qualification ▼
Blood Group ▼

Address

City
Phone No.

CNIC
Marital status ▼

Username
Password

Joining Date
Leaving Date






Fig. 13: Update Receptionist page

Add Receptionist
Delete Receptionist
Update Receptionist
Search Receptionist
view Receptionist

 Home
 Logout

Search Receptionist

Receptionist ID

First Name
Last Name

Age
Gender ▼

Qualification ▼
Blood Group ▼

Address

City
Phone No.

CNIC
Marital status ▼

Username
Password

Joining Date
Leaving Date






Fig. 14: Search Receptionist page

Add Receptionist
Delete Receptionist
Update Receptionist
Search Receptionist
View Receptionist



 Home
 Logout

View Receptionist

Receptionist ID	First Name	Last Name	Age	Gender	Qualification	Blood Group	Address	City	Phone No.	CNIC	Marital status	Username	Password	J. Date	L. Date
IU-23987	Islam	Aymen	21	Male	Graduated	O+	8 Al Galaa St. Aghakhan	Shoubra	022031820	2031820	Single	Aymen@21	2123	21-02-2019	-
IU-23678	Raghad	Elhael	24	Female	Graduated	AB+	El-Obour City Industrial Zone	Cairo	2026651615	26651615	Married	Elhael@24	2412	05-03-2020	-
IU-23469	Nour	Saed	22	Male	Graduated	B+	3 Osman Abd El-Hafiz St. off Tayran St.	Nasr City	024040016	4040016	Single	Saed@22	2234	02-01-2018	14-01-2020

Fig. 15: View Receptionist page

Add Doctor
Delete Doctor
Update Doctor
Search Doctor
View Doctor

 Home
 Logout

Add Doctor

Doctor ID

First Name
Last Name

Age
Gender

Specialization

Blood Group

Address

City
Phone No.

CNIC
Marital status

Username
Password

Joining Date
Leaving Date





Add


Fig. 16: Add Doctor page

Add Doctor
Delete Doctor
Update Doctor
Search Doctor
View Doctor


Delete Doctor
 Home
 Logout

First Name

Last Name

Age

Gender

select ▼

Specialization

select ▼

Blood Group

select ▼

Address

City

Phone No.

CNIC

Marital status

select ▼

Username

Password




Joining Date

Leaving Date



Fig. 17: Delete Doctor page

Add Doctor
Delete Doctor
Update Doctor
Search Doctor
View Doctor


Update Doctor
 Home
 Logout

First Name

Last Name

Age

Gender

select ▼

Specialization

select ▼

Blood Group

select ▼

Address

City

Phone No.

CNIC

Marital status

select ▼

Username

Password


Joining Date

Leaving Date





Fig. 18: Update Doctor page

Add Doctor
Delete Doctor
Update Doctor
Search Doctor
View Doctor



Search Doctor

 Home
 Logout

Doctor ID

First Name
Last Name

Age
Gender

Specialization
Blood Group

Address

City
Phone No.

CNIC
Marital status

Username
Password

Joining Date
Leaving Date







Fig. 19: Search Doctor page

Add Doctor
Delete Doctor
Update Doctor
Search Doctor
View Doctor




View Doctor

 Home
 Logout



Receptionist ID	First Name	Last Name	Age	Gender	Specialization	Blood Group	Address	City	Phone No.	CNIC	Marital status	Username	Password	J. Date	L. Date
IU-23987	Islam	Aymen	45	Male	surgery	O-	8 Al Galaa St. Aghakhan	Shoubra	022031820	2031820	Single	Aymen@21	2123	21-02-2019	-
IU-23678	Raghad	Elhael	40	Female	Bones	AB-	El-Obour City Industrial Zone	Cairo	2028651615	28651615	Married	Elhael@24	2412	05-03-2020	-
IU-23469	Nour	Saed	35	Male	Mental Health	B-	3 Osman Abd El-Hafiz St. off Tayran St.	Nasr City	024040016	4040016	Single	Saed@22	2234	02-01-2018	14-01-2020

Fig. 20: View Doctor page

Add Patient
Delete Patient
Update Patient
Search Patient
view Patient



Add Patient

 Home
 Logout

Patient ID

First Name

Last Name

Age

Gender
option

Date

Address

City

Phone No.

CNIC

Patient type
option

(FOR INDOOR PATIENTS ONLY)

Ward No.

Bed No.

Add







Fig. 21: Add Patient page

Add Patient
Delete Patient
Update Patient
Search Patient
view Patient




Delete Patient

 Home
 Logout

Patient ID

Search

Delete



First Name

Last Name

Age

Gender
option

Date

Address

City

Phone No.

CNIC

Patient type
option


(FOR INDOOR PATIENTS ONLY)

Ward No.



Bed No.

Fig. 22: Delete Patient page

Add Patient
Delete Patient
Update Patient
Search Patient
view Patient



Update Patient

 Home
 Logout

Patient ID

First Name
Last Name

Age
Gender ▼

Date

Address

City
Phone No.

CNIC
Patient type ▼

(FOR INDOOR PATIENTS ONLY)

Ward No.
Bed No.







Fig. 23: Update Patient page

Add Patient
Delete Patient
Update Patient
Search Patient
view Patient



Search Patient

 Home
 Logout

Patient ID

First Name
Last Name

Age
Gender ▼

Date

Address

City
Phone No.

CNIC
Patient type ▼

(FOR INDOOR PATIENTS ONLY)

Ward No.
Bed No.




Fig. 24: Search Patient page





<div> Add Patient Delete Patient Update Patient Search Patient view Patient </div> <div>  <h2>View Patients</h2> <div>  Home  Logout </div> </div>													
Admit Date	Patient ID	First Name	Last Name	Age	Gender	Address	City	Phone No.	Patient type	CNIC	Ward No.	Bed No.	Disc. Date
23-11-2020	IU-2311200	Adam	Ahmed	2y	Male	Badr	Cairo	457021678	Outdoor	4571678	-	-	23-11
02-12-2020	IU-2312200	Jna	Ibrahim	3y	Female	Mit Ghamr	Gharbia	459821768	Indoor	4521768	D-3	1	12-12
24-12-2020	IU-2314200	Roka	Mohamed	7 m	Female	Zifta	Gharbia	45398201	Outdoor	458201	-	-	24-12
29-12-2020	IU-2315200	Adn	Othman	1y	Male	Banha	Qalyubia	453112890	Outdoor	4512890	-	-	29-12
01-01-2021	IU-2316200	Aml	Mahmoud	11 m	Female	Tanta	Al Gharbiah	451660985	Indoor	4560985	A-3	4	5-01

Fig. 25: View Patients page



View Profile

 Home
 Logout

Receptionist ID: View ⚙️

First Name:

Last Name:

Age:

Gender:

Qualification:

Blood Group:

Address:

City:

Phone No.:

CNIC:

Marital status:

Username:

Password:

Joining Date:

Leaving Date:








Fig. 26: View receptionist's profile page




View Profile

 Home
  Logout

Receptionist ID:


First Name	<input type="text" value="Islam"/>	Last Name	<input type="text" value="Aymen"/>	<input type="button" value="Edit Profile"/> <input type="button" value="Change Password"/> <input type="button" value="Preferred Language"/> <input type="button" value="Notifications"/> <input type="button" value="Help"/>
Age	<input type="text" value="21"/>	Gender	<input type="text" value="Male"/>	
Qualification	<input type="text" value="Graduated"/>	Blood Group	<input type="text" value="O+"/>	
Address <input type="text" value="8 Al Galaa St., Aghakhan"/>				
City	<input type="text" value="Shoubra"/>	Phone No.	<input type="text" value="022031820"/>	
CNIC	<input type="text" value="2031820"/>	Marital status	<input type="text" value="Single"/>	
Username	<input type="text" value="Aymen@21"/>	Password	<input type="text" value="2123"/>	
Joining Date	<input type="text" value="21-02-2019"/>	Leaving Date	<input type="text" value="Still working"/>	

Fig. 27: Edit receptionist's profile page



Add New Appointment

Patient ID:

First Name:
 Last Name:

Age:
 Gender:

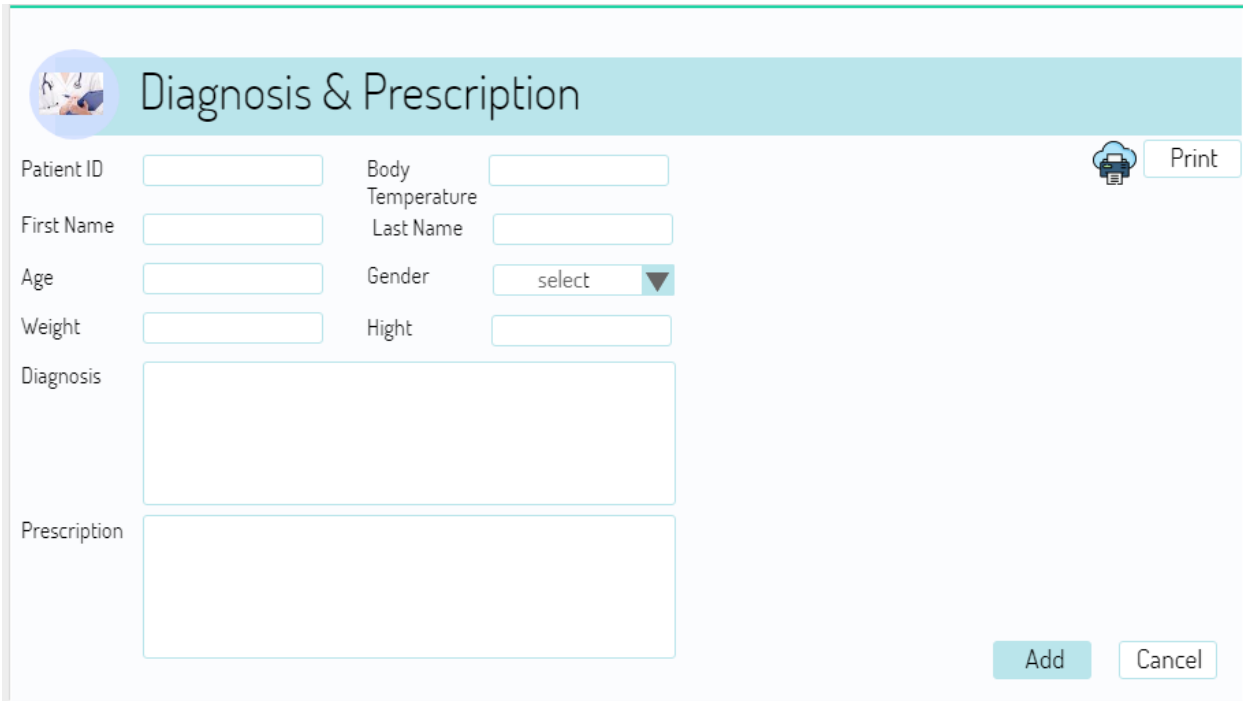
Appt Date:
 Appt Time:

Address:

City:
 Phone No.:

CNIC:
 Doctor:

Fig. 28: Appointment page



The "Diagnosis & Prescription" page features a light blue header with a medical icon and the page title. Below the header, there are two columns of input fields for patient information: Patient ID, First Name, Age, Weight, Diagnosis, and Prescription on the left; and Body Temperature, Last Name, Gender (a dropdown menu), and Height on the right. A "Print" button with a printer icon is located in the top right corner. At the bottom right, there are "Add" and "Cancel" buttons.

Fig. 29: Diagnosis & Prescription page




The "Add Patient" page has a light blue header with a patient icon, the page title, and navigation links for "Home" and "Logout". Below the header, there are buttons for "Add Patient", "Delete Patient", "Update Patient", "Search Patient", and "view Patient". The main form contains input fields for Patient ID (filled with "IU-4567"), First Name (filled with "Hana"), Age (filled with "2y"), Date (filled with "26-12-2020"), Address (filled with "Quesina-M"), City (filled with "Quesina"), CNIC (filled with "11200014"), and Patient type (a dropdown menu filled with "Outdoor"). There are also fields for "Ward No." and "Bed No." under the heading "(FOR INDOOR PATIENTS ONLY)". A "Message" dialog box is displayed in the center, stating "Successfully Added." with an "OK" button. A small photo of a child is visible on the right side of the page. An "Add" button is located in the top right corner of the form area.

Fig. 30: Successfully added patient page

[Add Patient](#) [Delete Patient](#) [Update Patient](#) [Search Patient](#) [view Patient](#)



Delete Patient

 Home  Logout

Patient ID

Search

Delete

First Name

Age

Date

Address

City

CNIC Patient type

Outdoor ▼

(FOR INDOOR PATIENTS ONLY)

Ward No. Bed No.





Delete

Are you sure to delete patient record?

Yes No

Fig. 31: confirm delete patient page

Send Message

 Home  Logout

To

select ▼

Subject



Send

Attach File

Browse

Fig. 32: send message page

OutPatient Bill

 Home  Logout

Bill No.

Date

Patient ID

Age

First Name

Last Name

Doctor

Consultation

Total Fees



Add

Save

Exit

Fig. 33: Outpatient Billing page

InPatient Bill

 Home  Logout

Bill No.

Date

Patient Details

Patient ID

Age

First Name

Last Name

Date of Admission

Date of Discharge

Charges

Room Charges

Miscellaneous

Doctor Fees

Total Fees

Add

Save

Exit

Fig. 34: Inpatient Billing page