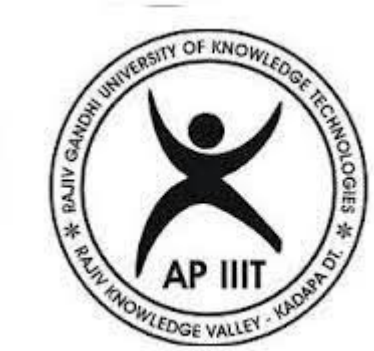
Project Report

On

POLICE CRIME RECORD MANAGEMENT SYSTEM

Department of Computer Science And Engineering



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RK VALLEY

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POLICE CRIME RECORD MANAGEMENT SYSTEM

A Project submitted to the Computer Science and Engineering Department, Rajiv Gandhi University of Knowledge and Technologies,R.K Valley in partial fulfillment of the Requirement for the degree of Bachelor of Technology.
This work has not been submitted elsewhere for a degree.

Signature of the Supervisor
---------.
Computer Science and Engineering
RGUKT, RK VALLEY
2nd Semester-2023
April,2023

DECLARATION

We here by declare that the report of the B.Tech Major Project Work entitled "POLICE CRIME RECORD MANAGEMENT SYSTEM" ,which is being submitted to Rajiv Gandhi University of Knowledge Technologies, R.K Valley, in partial fulfillment of the requirements for the award of Degree of Bachelor of Technology in Computer Science and Engineering, is a bonafide report of the work carried out by us.The material contained in this report has not been submitted to any University or Institution for award of any degree.

Student Names & Signatures

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C.MOUNIKA-R170168

APPROVAL

The project titled-"**POLICE CRIME RECORD MANAGEMENT SYSTEM**" prepared by the following students has been submitted to the following respective member of the board of examiners of the Computer Science Engineering,RGUKT,R.K Valley in partial fulfillment of the requirements for the degree of Bachelor of Technology in Computer Science Engineering.The project has been accepted on May 2023 as satisfactory.

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RAJIV GANDHI UNIVERSITY OF KNOWLEDGE TECHNOLOGIES

(A.P.Government Act 18 of 2008)
RGUKT, RK VALLEY
Department of Computer Science and Engineering

CERTIFICATE FOR PROJECT COMPLETION

This is certify that the project entitled "**POLICE CRIME RECORD MANAGEMENT SYSTEM**" submitted by **S.MAHALAKSHMI(R170160)** , **I.TEJASRI(R170164)** , **C.MOUNIKA(R170168)** , under our guidance and supervision for the partial fulfillment for the degree Bachelor of Technology in Computer Science and Engineering during the academic semester-2 2022-2023 at RGUKT, RK VALLEY.
To the best of my knowledge, the results embodied in this dissertation work have not been submitted to any University or Institute for the award of any degree or diploma.

Project Internal Guide
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RGUKT, RK Valley

Head Of The Department
N.SATYANANDARAM
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ABSTRACT

This Police Crime Record Management system Project was developed using PHP Language. It was developed to help police record crime types they receive at their stations on daily basis.
It is proposed to centralize Information Management in Crime for the purposes of fast and efficient sharing of critical information.It is well understood that Crime Prevention, Detection and Conviction of criminals depend on a highly responsive backbone of Information Management. The efficiency of the police function and the effectiveness with which it tackles crime depend on what quality of information it can derive from its existing records and how fast it can have access to it.

SRS DOCUMENT

2 INTRODUCTION:

The police crime record management system project is a web-based application and has CRUD (Create, Read, Update, and Delete) Operation functionalities. The system can be accessed by 2 types of system users which are the Admin, Police Staff (NCO and CID). The **Administrator (admin)** user is in charge of managing the list of the staff/users and also can manage the list of cases.The **NCO/Non-Commission Officer** is in charge of managing the complaints and assign the case to the specific **CID**. The **CID/Criminal Investigation Department Officer** is in charge of managing the investigation details of the cases assigned to them.This project was developed using PHP, MySQL Database, HTML, CSS, JavaScript (jQuery), and Bootstrap Framework.It has 3 modules i.e.

- **Admin**
- **NCO**
- **CID**

Admin Module

The **Administrator (admin)** user is in charge of managing the list of the staff/ users and also can manage the list of cases.

Add staff: In this section admin can add staff by adding their details like first name,staff number.Admin set password for the added staff and give the role for the staff like admin/NCO/CID.

view staff: The staff added by the admin will appear in this section with the complete details of the staff.

view cases: The cases which were added by the NCO officer and the details of the investigation submitted by the CID like the status (ongoing / completed) of the case will be appeared.

NCO Module:

New Case: A complaint will be registered by the NCO which includes the details of complainant like name,phone number,occupation,age,region,Address and also mention crime type.And NCO is the one who assigns the cases to one of the CID officer for further investigations.

View Case: In this section we find the complete details of the cases registered , the status of the investigation,Investigation statement which is printable and we change the assigned CID officer if the complainant is not satisfied by the previous officer.

CID Module:

View Assigned Cases: The assigned cases for particular CID officer will appear in their particular logins and CID will investigate the case and update the status of the cases whether it is completed or ongoing.

2.1 Purpose:

The purpose of this document is to gather the requirements that are needed for implementing the police crime record management project.The main purpose of this project is to centralize Information Management in Crime for the purposes of fast and efficient sharing of critical information.

2.2 PRODUCT VISION:

vision statement:

It product vision is to develop a police crime record managing system,which is useful for police to manage the police records.This police crime record management project will help police to record crime types they receive at their stations on daily basis.

3 Techologies:

- PHP
- MySQL
- HTML

- CSS
- JavaScript
- Bootstrap

PHP:

PHP is an open-source, interpreted, and object-oriented scripting language that can be executed at the server-side. PHP is well suited for web development. Therefore, it is used to develop web applications (an application that executes on the server and generates the dynamic page.).

MySQL:

MySQL is a widely used relational database management system (RDBMS).

MySQL is free and open-source.

MySQL is ideal for both small and large applications.

http://localhost/phpmyadmin

HTML:

The HyperText Markup Language or HTML is the standard markup language for documents designed to be displayed in a web browser. It can be assisted by technologies such as Cascading Style Sheets and scripting languages such as JavaScript

CSS:

Cascading Style Sheets is a style sheet language used for describing the presentation of a document written in a markup language such as HTML or XML. CSS is a cornerstone technology of the World Wide Web, alongside HTML and JavaScript.

JavaScript:

JavaScript, often abbreviated to JS, is a programming language that is one of the core technologies of the World Wide Web, alongside HTML and CSS. As of 2022, 98% of websites use JavaScript on the client side for webpage behavior, often incorporating third-party libraries.

Bootstrap:

Bootstrap is a free and open-source CSS framework directed at responsive, mobile-first front-end web development. It contains CSS and (optionally) JavaScript-based design templates for typography, forms, buttons, navigation, and other interface components.

4 SYSTEM REQUIREMENT SPECIFICATION

4.1 NON FUNCTIONAL REQUIREMENTS

4.1.1 SOFTWARE REQUIREMENTS

This web site requires the following software in Server, clients.

Server-side Requirements

Operation System : Windows 11
Web Server : XAMP
Database : MySQL

Client-side Requirements

Browser : Any HTML 4.0 or prior version compliant browser with a Minimum Screen resolution of 800X600 pixels (best viewed in 1024 x 768 resolution).
JavaScript:JavaScript should be enabled in the browser.

4.1.2 HARDWARE REQUIREMENTS

The following is a list of minimum requirements on server side
Hard Disk: 40GBHard disk with minimum 4GB free space.

Interface:Mouse,Keyboard.

On client side any hardware that can run a web browser

4.2 FUNCTIONAL REQUIREMENTS

4.2.1 Product Requirements

This web site is an online Micro Insurance Management System that provides the following features.

Admin

- View Staff List
- View Cases

NCO

- Register a Complain

- View list of complaints
- View details of case investigation
- Assign a case CID Officer
- Manage Account/Change Password

CID

- CID Dashboard
- View list of cases assigned
- View details of case investigation
- Write a report on the case being investigated

4.2.2 User Requirements

This website provides easy adding,deleting and updating the details of cases,staff.A visitor with minimum knowledge of web browsing/surfing can access the site very easily.Due to dynamic nature of features,the members,Admin members should be able to understand the provided facilities.

4.2.3 Performance Requirements

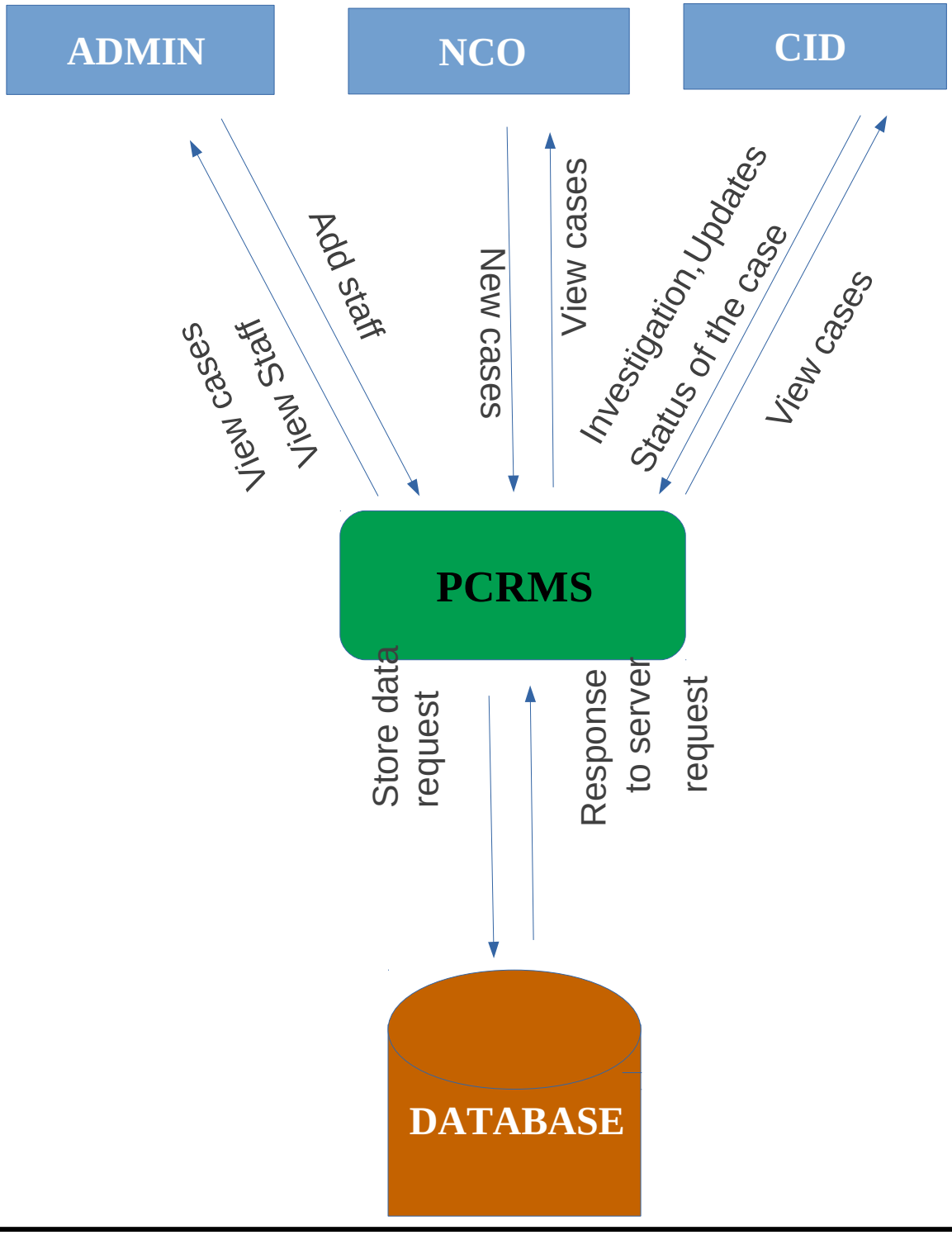
The following performance requirements should be maintained in the project.

- Each page in the site needs to load in a reasonable amount of time.
- Latest web techniques like Caching should be implemented to speed up the loading of dynamic pages. This will also improve on the number of simultaneous users, as connections are freed faster.

5 SYSTEM DESIGN:

The police crime record management system project helps to manage the list of staff and also can manage the list of cases,manages the complaints and assign them to specific CID,manages the investigation details of the cases assigns to the CID.

5.1 Context diagram:



5.2 UML Diagrams:

Actor :

A coherent set of roles that users of use cases play when interacting with the use case.An observable result of value of an actor.

Use case:

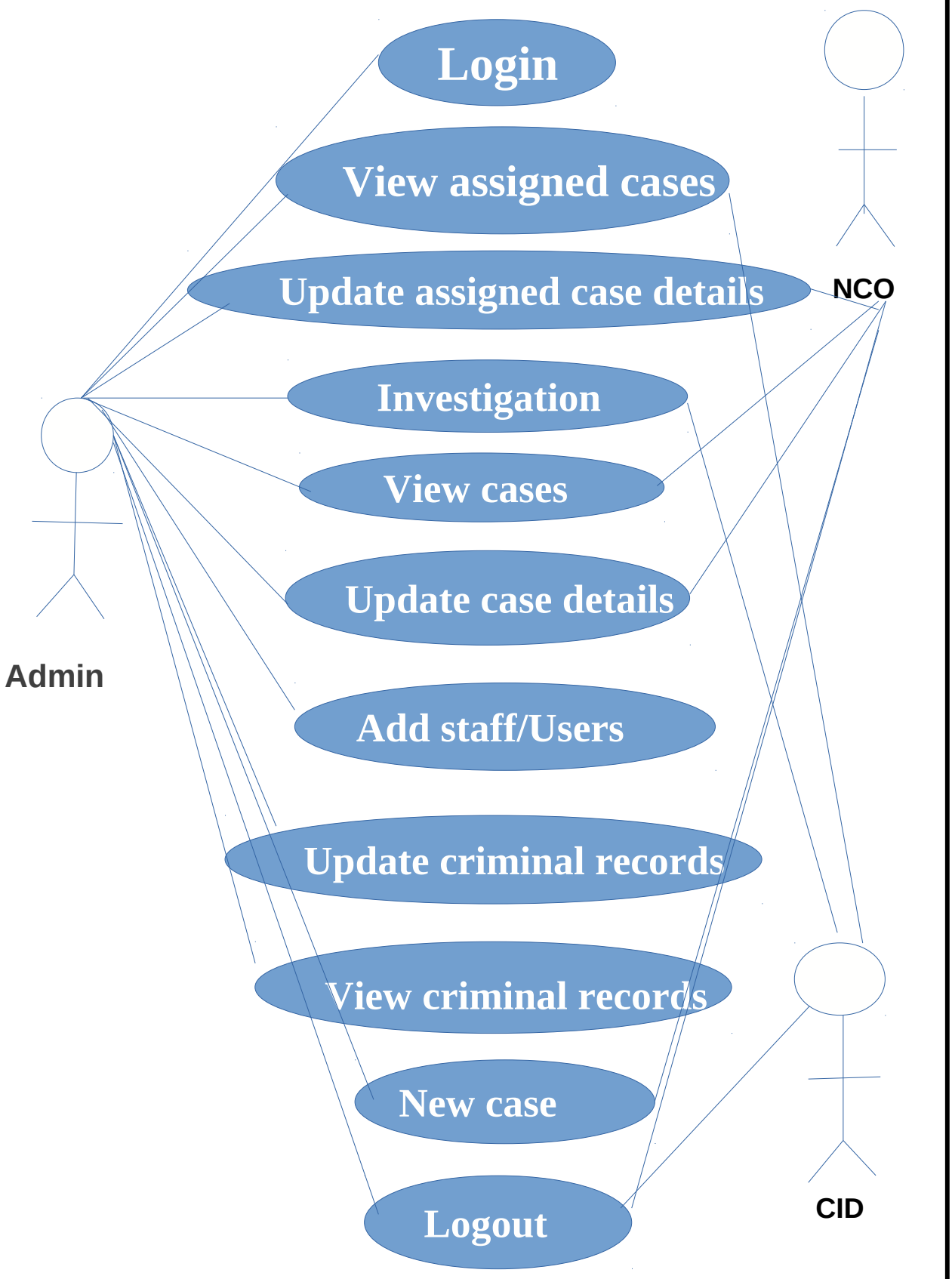
A description of sequence of actions,including variants,that a system performs yields an observable result of value of an actor.Actor diagram is drawn in a eclipse shape UML stands for Unified Modeling Language.UML is a language for specifying ,visualizing and documenting the system.This is the step while developing any product after analysis.

The goal from this is to produce a model of the entities involved in the project which later need to built.The representation of the entities that are to be used in the product being developed need to be designed.

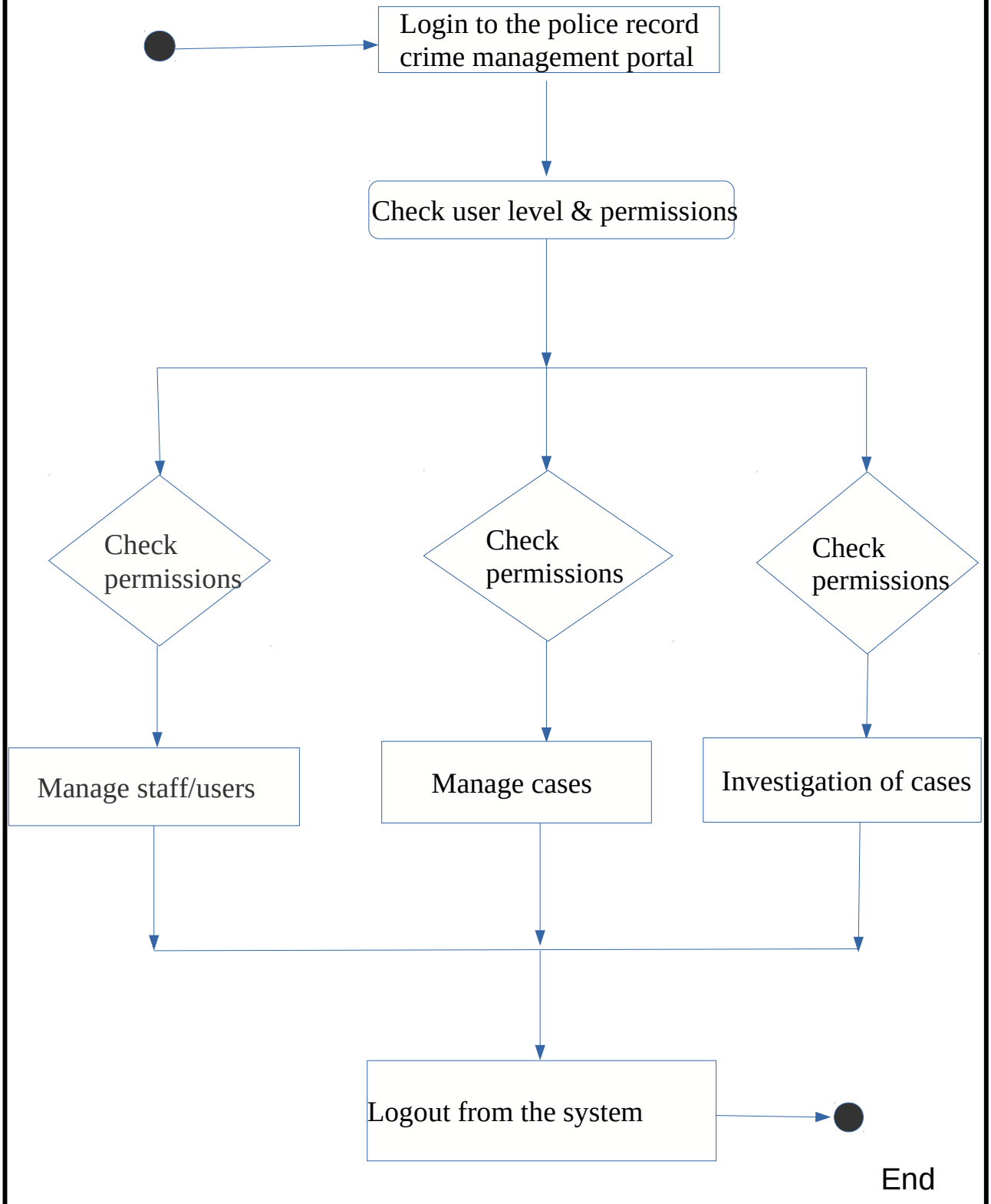
Use case diagram:

A use case is a description of set of sequence of actions.Graphically it is rendered as an ellipse with solid line including only its name.Use case diagram is a behavioural diagram that shows a set of use cases actors and their relationship. It is an associate between the use cases and actors.An actors represents a real-world object.Primary Actor-Sender,Secondary Actor Reciever.

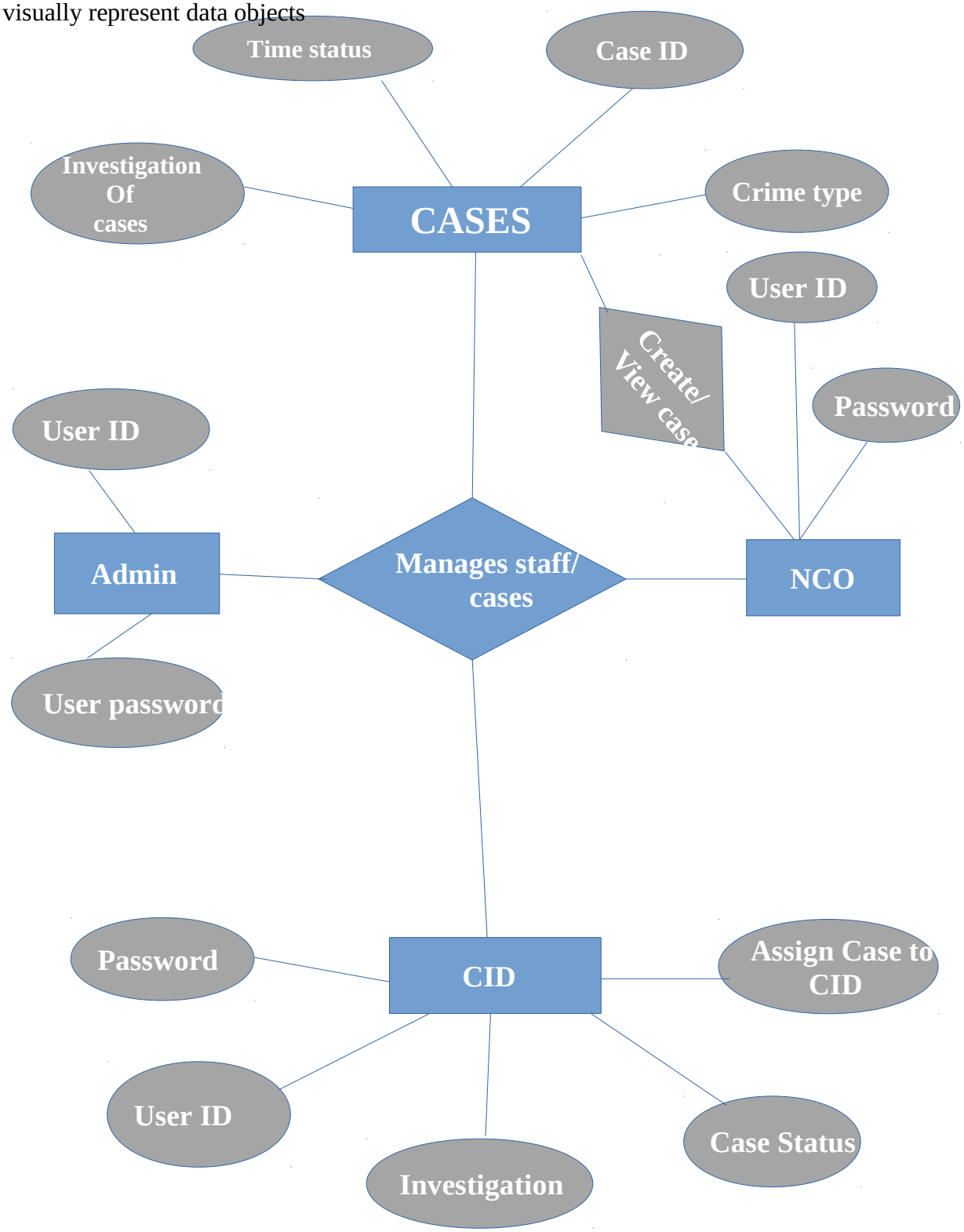
5.2.1 Use Case Diagrams:



5.2.2 ACTIVITY DIAGRAM:



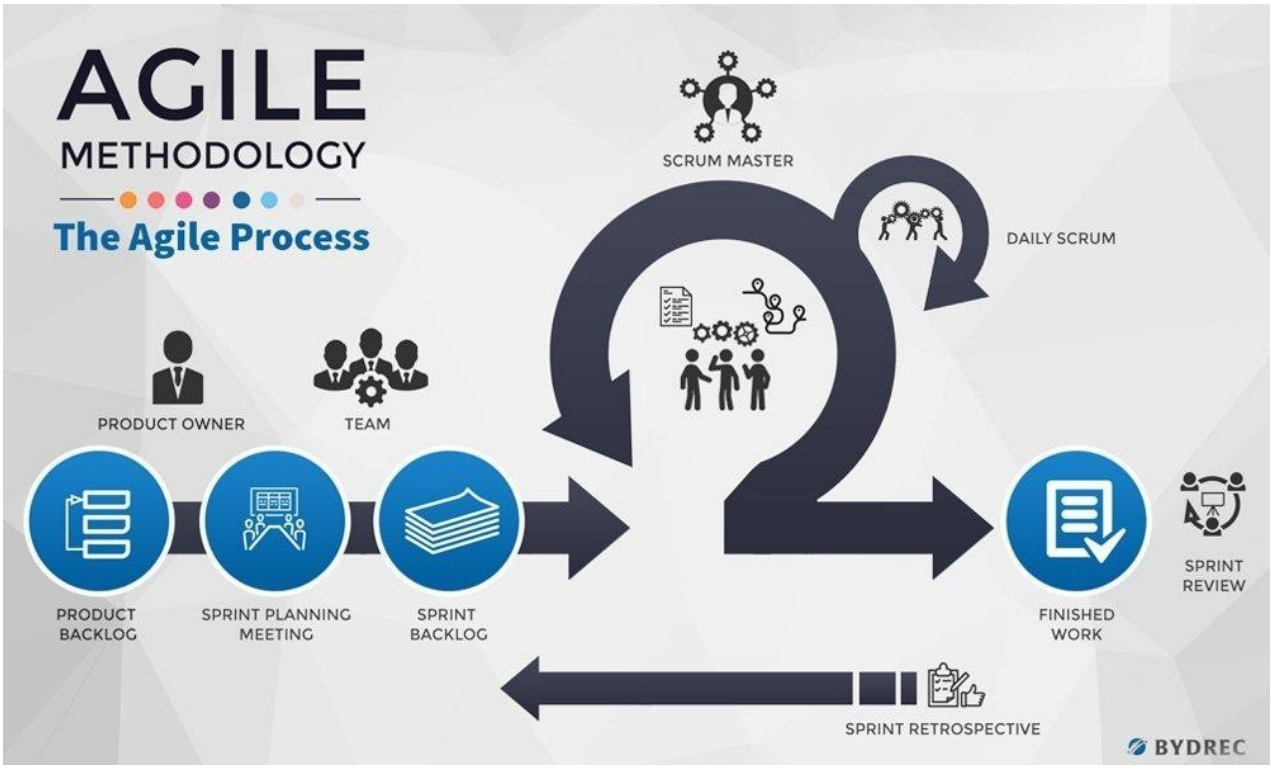
5.2.3 ER Diagram : The Entity relationship(ER) model was originally proposed by peter in 1976[chen76) as a way to unify the network and relational Database views.Simply stated the ER model is a data model that views the real world as entities and relationships.A basic component of the model is the Entity-Relationship diagram which is used to visually represent data objects



6 Agile Development

Agile

The Agile methodology is a way to manage a project by breaking it up into several phases. It involves constant collaboration with stakeholders and continuous improvement at every stage. Once the work begins, teams cycle through a process of planning, executing, and evaluating. Continuous collaboration is vital, both with team members and project stakeholders.



Agile methodology

It’s a process for managing a project that involves constant collaboration and working in iterations. Today, the word Agile can refer to these values and the frameworks for implementing them, including Scrum, Kanban, Extreme Programming (XP), and Adaptive Project Framework (APF)

Agile

A project management methodology characterized by building products using short cycles of work that allow for rapid production and constant revision.

Kanban

A visual approach to project management where teams create physical representations of their tasks, often using sticky notes on whiteboards (or online apps). Tasks are moved through predetermined stages to track progress and identify common roadblocks.

Scrum

A PM methodology in which a small team is led by a Scrum master, whose main job is to clear away all obstacles to completing work. Work is done in short cycles called sprints, but the team meets daily to discuss current tasks and roadblocks.

Adaptive Project Framework (APF)

A project management methodology that grew from the idea that most IT projects can't be managed using traditional PM methods. Work is done in stages and evaluated after each one.

Extreme Project Management (XPM)

A PM methodology where the project plan, budget, and final deliverable can be changed to fit evolving needs, no matter how far along the project is.

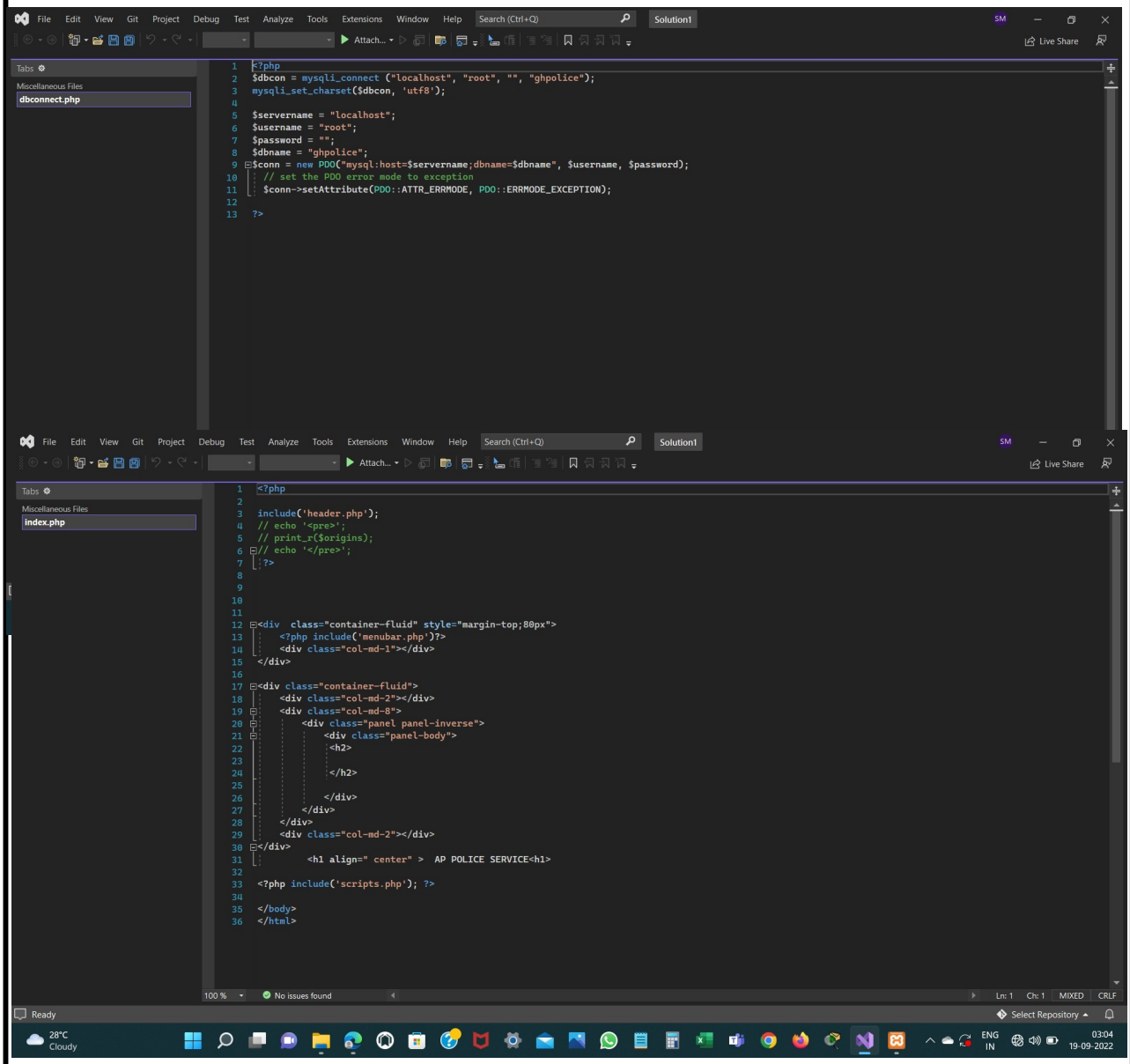
How to Develop a project using Agile methodology

Agile Development is a Continuous Integration(CI) from Requirements gathering to testing the code.

We start the project Development with Requirements analysis and Gathering. In this we collect the data from the project description and draw the UML diagrams like ER diagram or database tables and Use Case diagram for implementation functionalities.

After we create a short stories like Login, Signup, Homepage Design, Database Creation From the requirements file.

7 CODING:

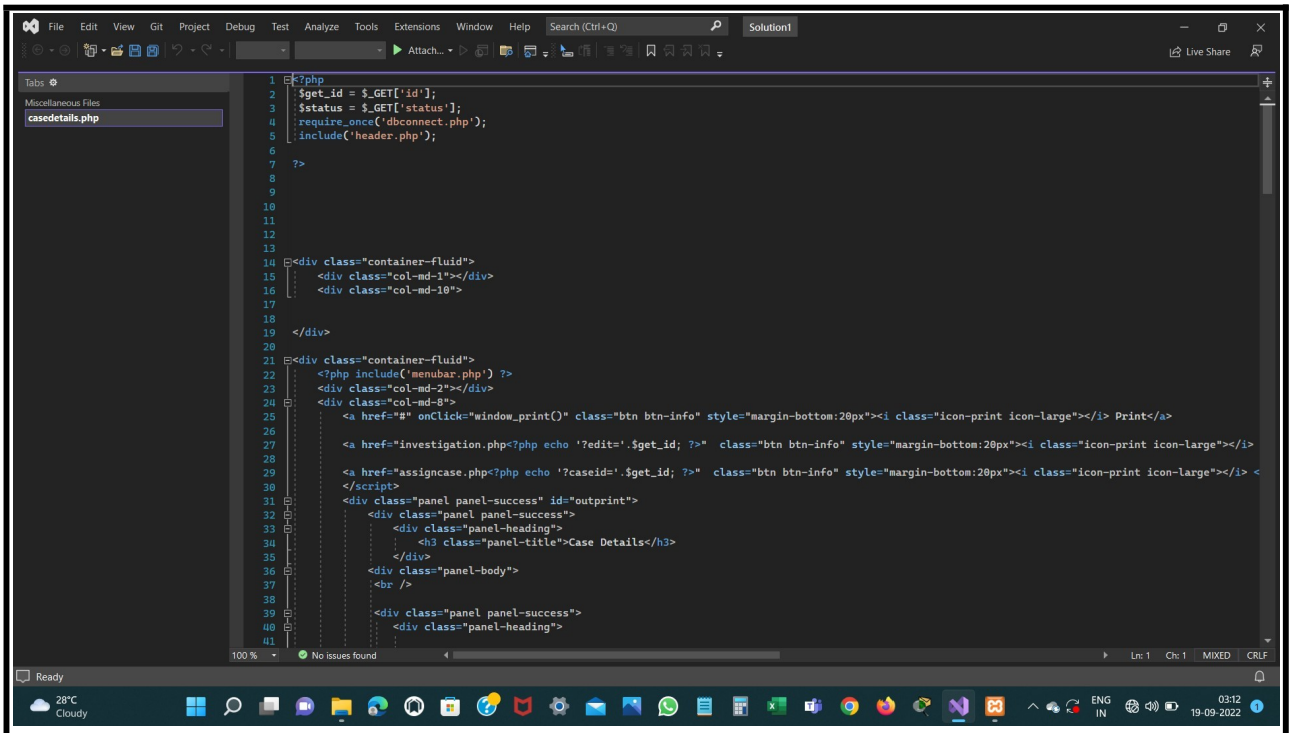


Miscellaneous Files
dbconnect.php

```php
<?php
$dbcon = mysqli_connect ("localhost", "root", "", "ghpolice");
mysqli_set_charset($dbcon, 'utf8');

$servername = "localhost";
$username = "root";
$password = "";
$dbname = "ghpolice";
$conn = new PDO("mysql:host=$servername;dbname=$dbname", $username, $password);
  // set the PDO error mode to exception
  $conn->setAttribute(PDO::ATTR_ERRMODE, PDO::ERRMODE_EXCEPTION);

 ?>
```


Miscellaneous Files
index.php

```php
<?php

include('header.php');
// echo '<pre>';
// print_r($origins);
// echo '</pre>';
 ?>



<div  class="container-fluid" style="margin-top;80px">
    <?php include('menubar.php')?>
    <div class="col-md-1"></div>
</div>

<div class="container-fluid">
    <div class="col-md-2"></div>
    <div class="col-md-8">
        <div class="panel panel-inverse">
            <div class="panel-body">
             <h2>


             </h2>

            </div>
        </div>
    </div>
    <div class="col-md-2"></div>
</div>
        <h1 align=" center" >  AP POLICE SERVICE<h1>

 <?php include('scripts.php'); ?>

 </body>
 </html>
```

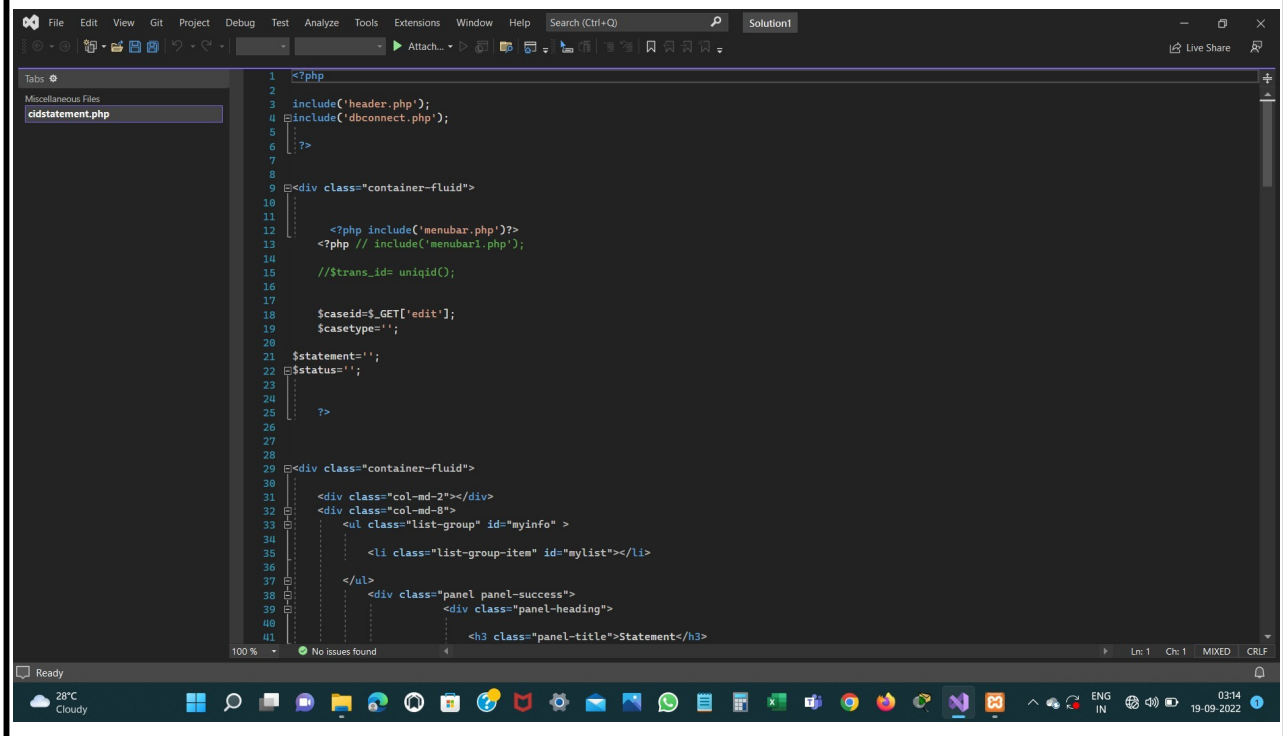

File Edit View Git Project Debug Test Analyze Tools Extensions Window Help
Search (Ctrl+Q)
Solution1
Live Share
Tabs
Miscellaneous Files
casedetails.php
<?php
$get_id = $_GET['id'];
$status = $_GET['status'];
require_once('dbconnect.php');
include('header.php');
?>

<?php include('menubar.php') ?>

 Print
<a href="investigation.php<?php echo '?edit='.$get_id; ?>" class="btn btn-info" style="margin-bottom:20px">
<a href="assigncase.php<?php echo '?caseid='.$get_id; ?>" class="btn btn-info" style="margin-bottom:20px"> <
</script>

<h3 class="panel-title">Case Details</h3>

100 %
No issues found
Ln: 1 Ch: 1 MIXED CRLF
Ready
28°C Cloudy
ENG IN
03:12 19-09-2022


File Edit View Git Project Debug Test Analyze Tools Extensions Window Help
Search (Ctrl+Q)
Solution1
Live Share
Tabs
Miscellaneous Files
cidstatement.php
<?php
include('header.php');
include('dbconnect.php');
?>

<?php include('menubar.php')?>
<?php // include('menubar1.php');
//$trans_id= uniqid();
$caseid=$_GET['edit'];
$casetype='';
$statement='';
$status='';
?>

<ul class="list-group" id="myinfo" >
<li class="list-group-item" id="mylist">

<h3 class="panel-title">Statement</h3>
100 %
No issues found
Ln: 1 Ch: 1 MIXED CRLF
Ready
28°C Cloudy
ENG IN
03:14 19-09-2022

8 Testing:

After all phase have been perfectly done, the system will be implemented to the server and the system can be used.

System Testing

The goal of the system testing process was to determine all faults in our project .The program was subjected to a set of test inputs and many explanations were made and based on these explanations it will be decided whether the program behaves as expected or not. Our Project went through two levels of testing

1. Unit testing

2 .Integration testing

Unit Testing

Unit testing is commenced when a unit has been created and effectively reviewed .In order to test a single module we need to provide a complete environment i.e. besides the section we would require the procedures belonging to other units that the unit under test calls Non local data structures that module accesses .A procedure to call the functions of the unit under test with appropriate parameters

1. Test for the admin module

Testing admin login form-This form is used for log in of administrator of the system. In this form we enter the username and password if both are correct administration page will open otherwise if any of data is wrong it will get redirected back to the login page and again ask the details.

Report Generation: admin can generate report from the main database.

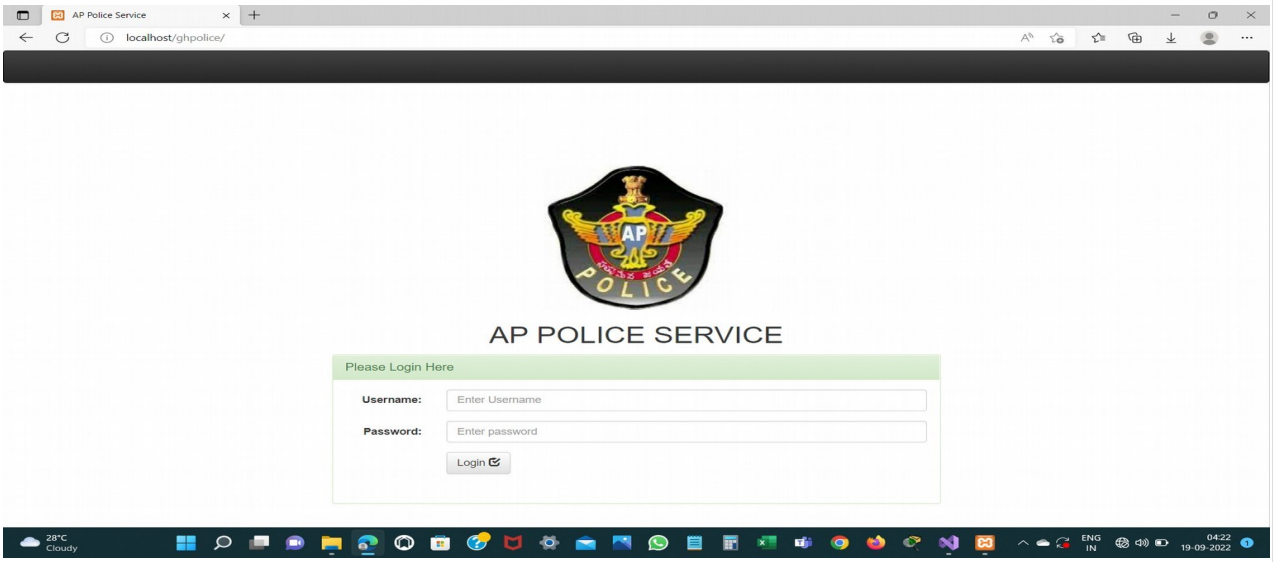
Integration Testing

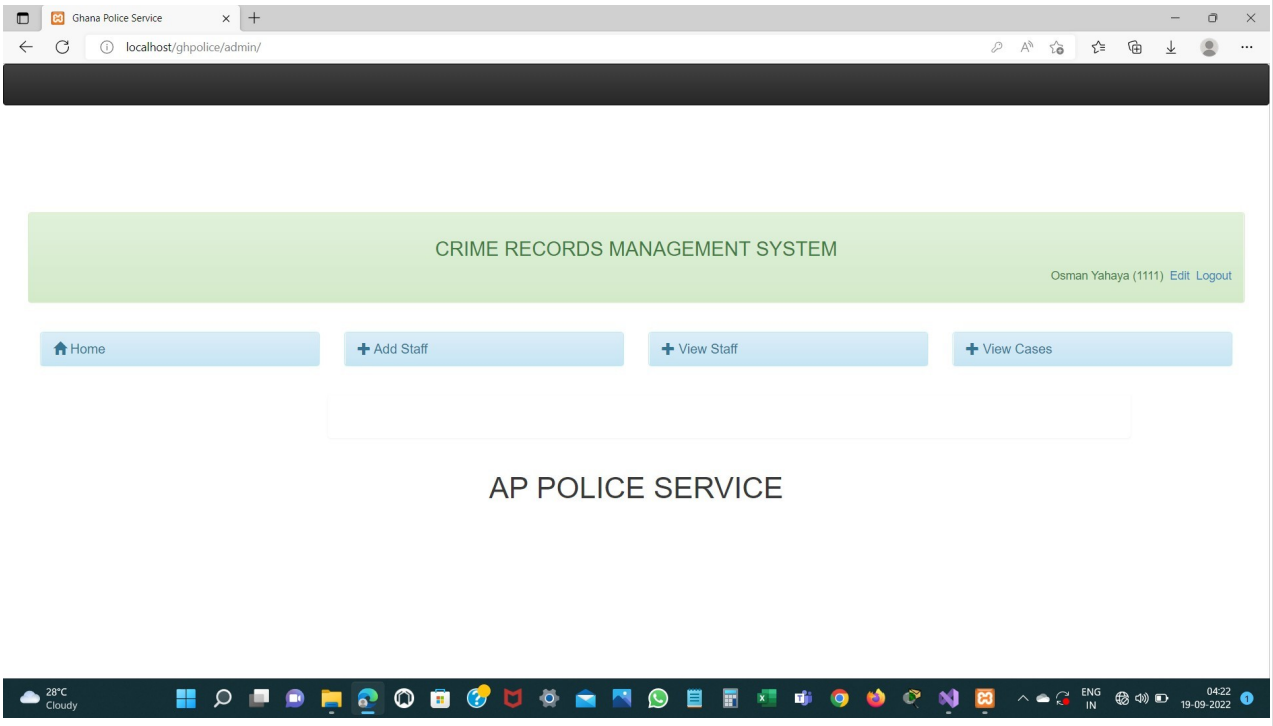
In the Integration testing we test various combination of the project module by providing the input.

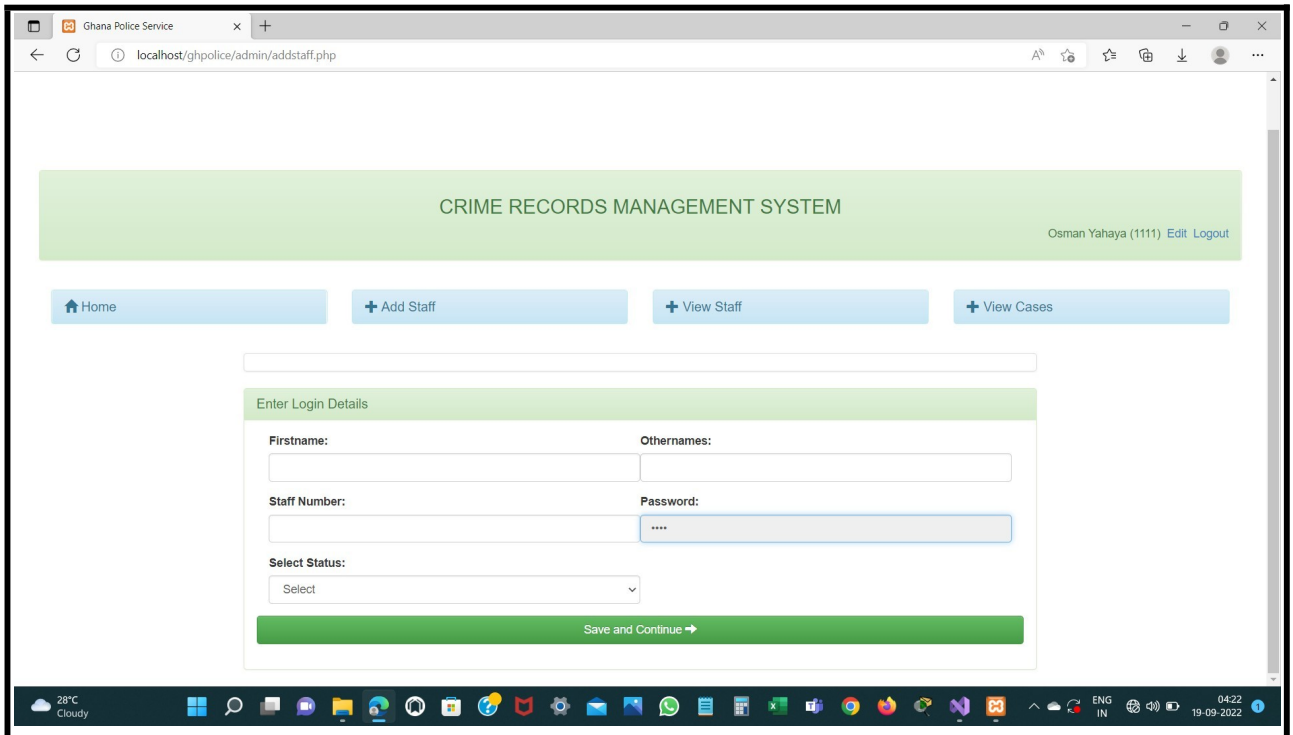
The primary objective is to test the module interfaces in order to confirm that no errors are occurring when one module invokes the other module.

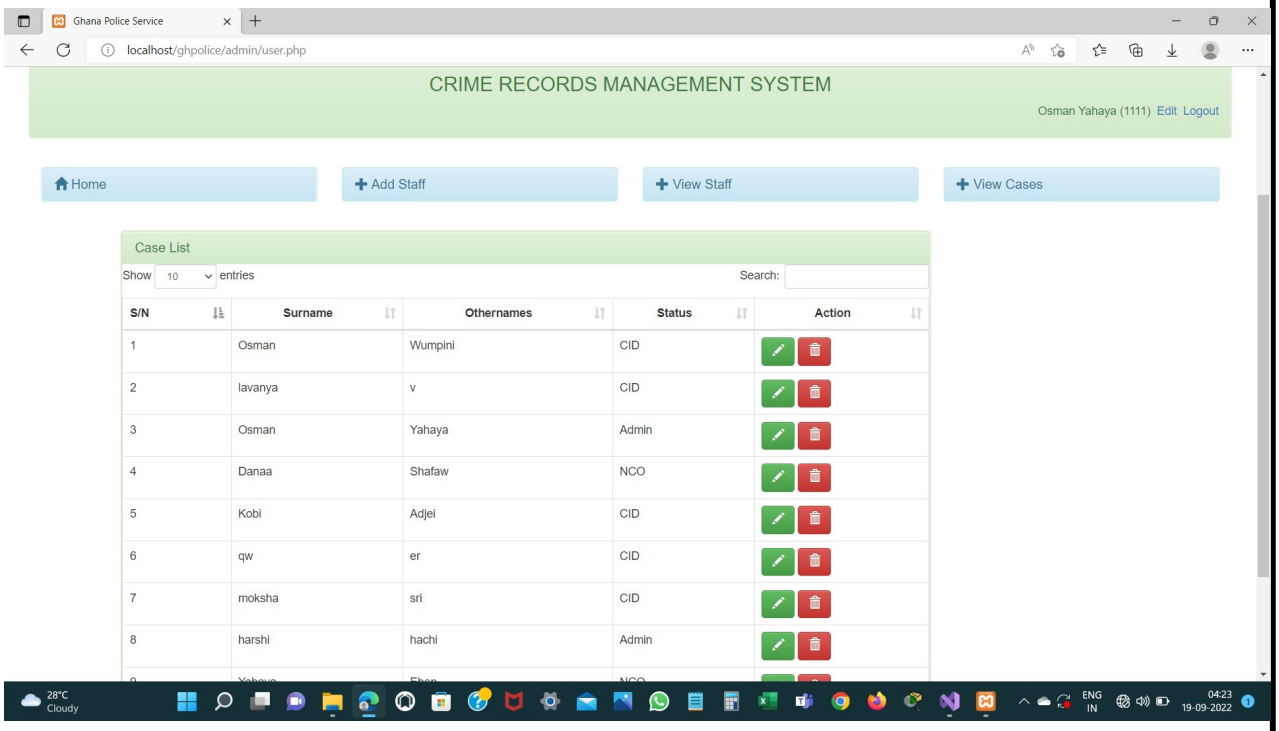
9 EVALUATION:

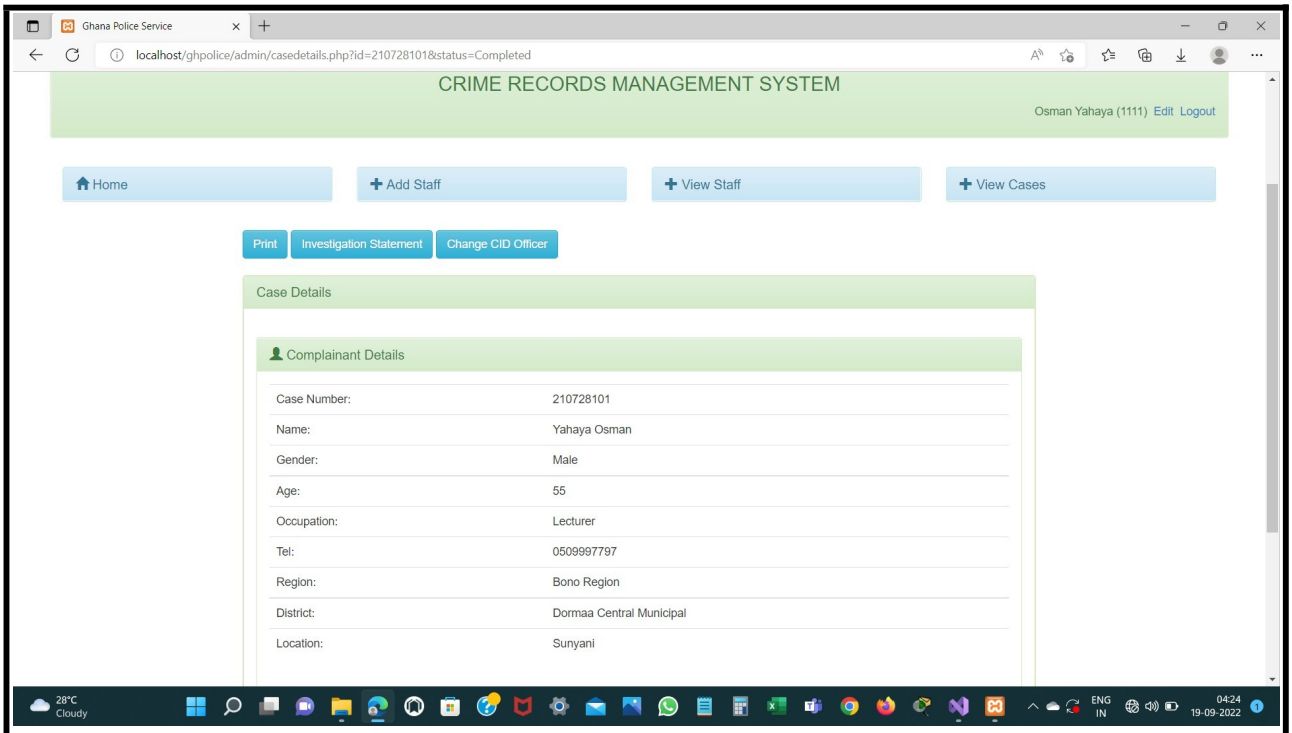
ADMIN:



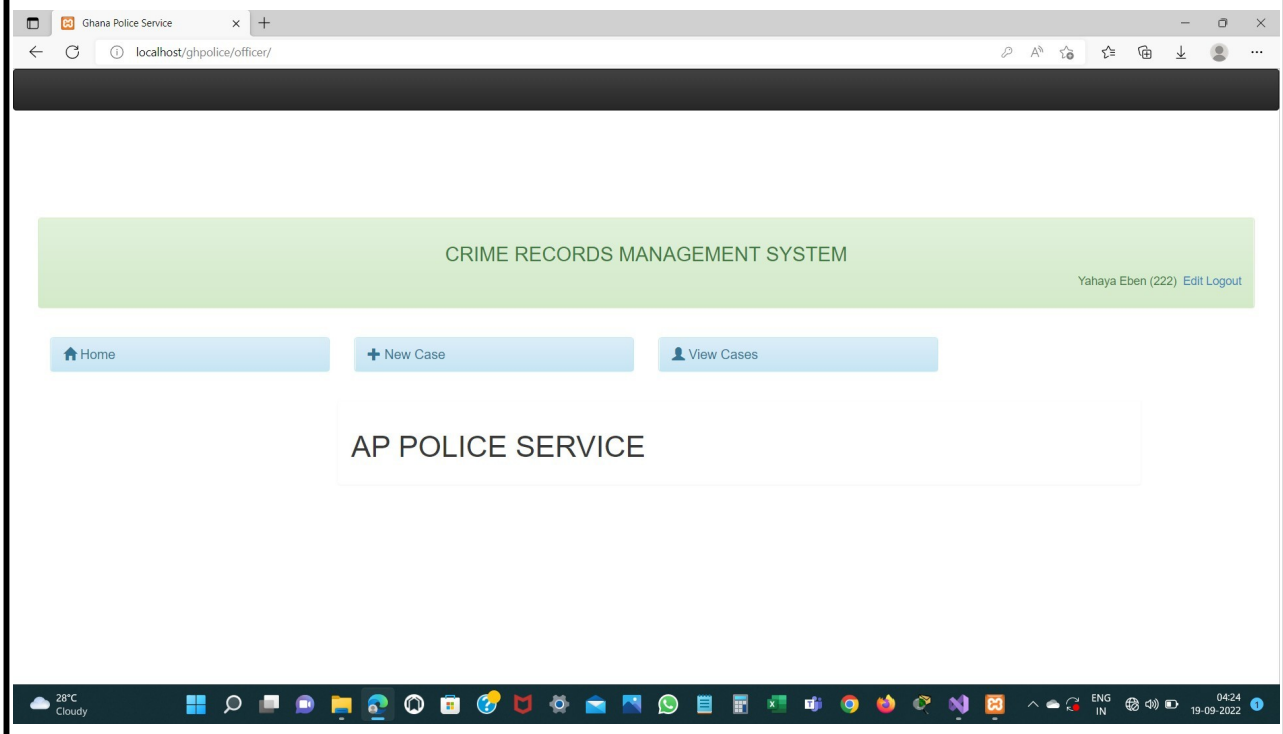


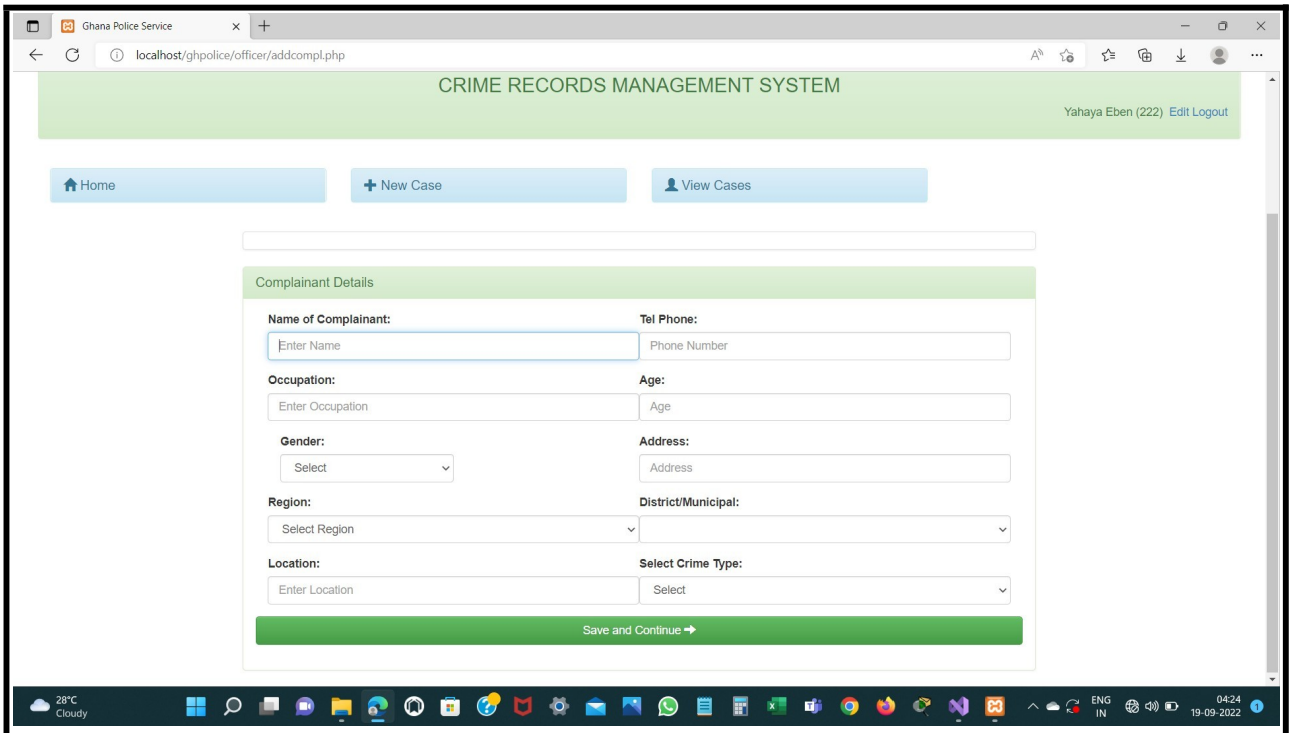

Ghana Police Service
localhost/ghpolice/admin/addstaff.php
CRIME RECORDS MANAGEMENT SYSTEM
Osman Yahaya (1111) Edit Logout
Home
Add Staff
View Staff
View Cases
Enter Login Details
Firstname:
Othernames:
Staff Number:
Password:
Select Status:
Select
Save and Continue

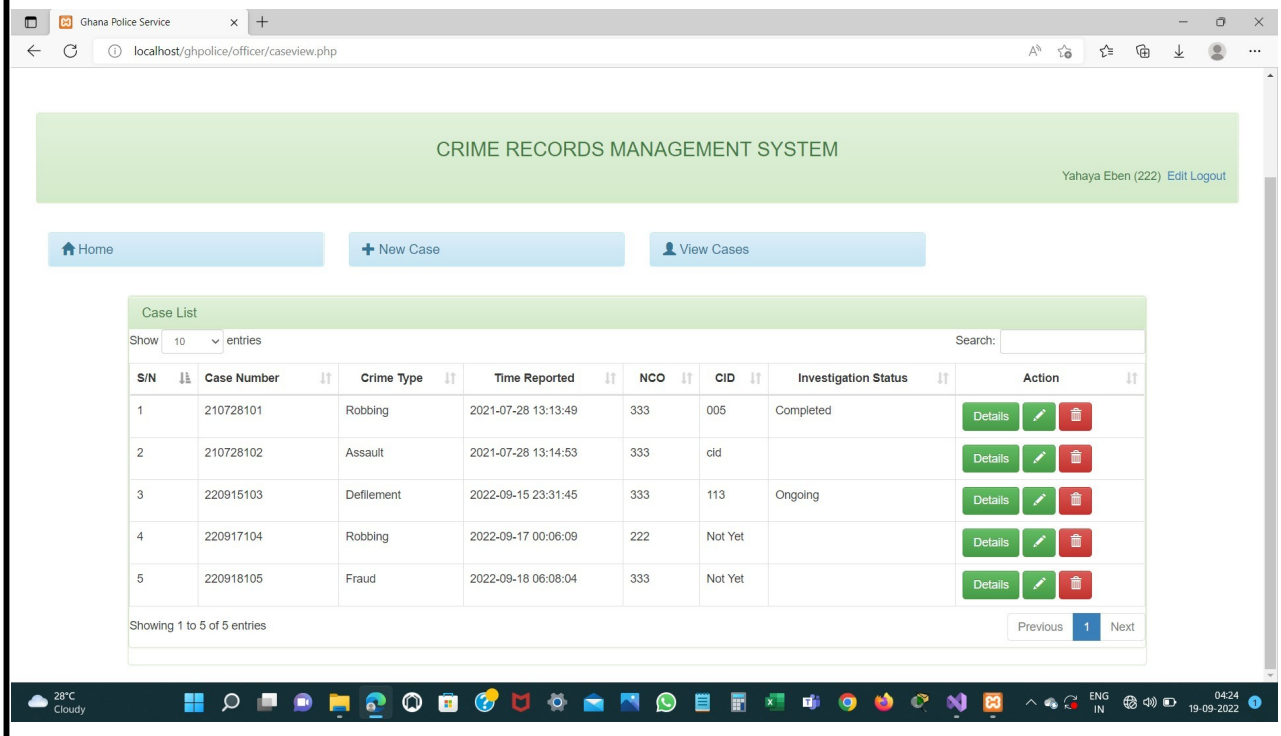

Ghana Police Service
localhost/ghpolice/admin/user.php
CRIME RECORDS MANAGEMENT SYSTEM
Osman Yahaya (1111) Edit Logout
Home
Add Staff
View Staff
View Cases
Case List
Show 10 entries
Search:
S/N
Surname
Othernames
Status
Action
1 Osman Wumpini CID
2 lavanya v CID
3 Osman Yahaya Admin
4 Danaa Shafaw NCO
5 Kobi Adjei CID
6 qw er CID
7 moksha sri CID
8 harshi hachi Admin

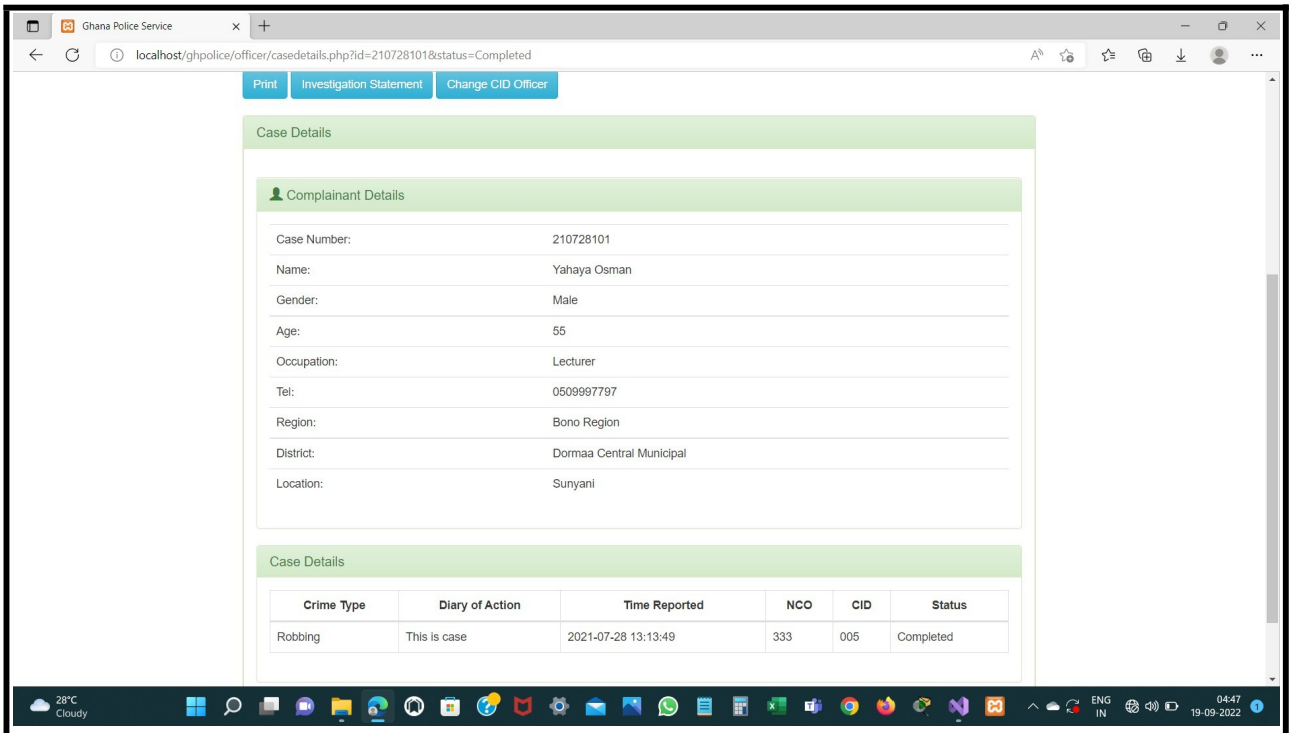

Ghana Police Service
localhost/ghpolice/admin/casedetails.php?id=210728101&status=Completed
CRIME RECORDS MANAGEMENT SYSTEM
Osman Yahaya (1111) Edit Logout
Home
Add Staff
View Staff
View Cases
Print
Investigation Statement
Change CID Officer
Case Details
Complainant Details
Case Number: 210728101
Name: Yahaya Osman
Gender: Male
Age: 55
Occupation: Lecturer
Tel: 0509997797
Region: Bono Region
District: Dormaa Central Municipal
Location: Sunyani

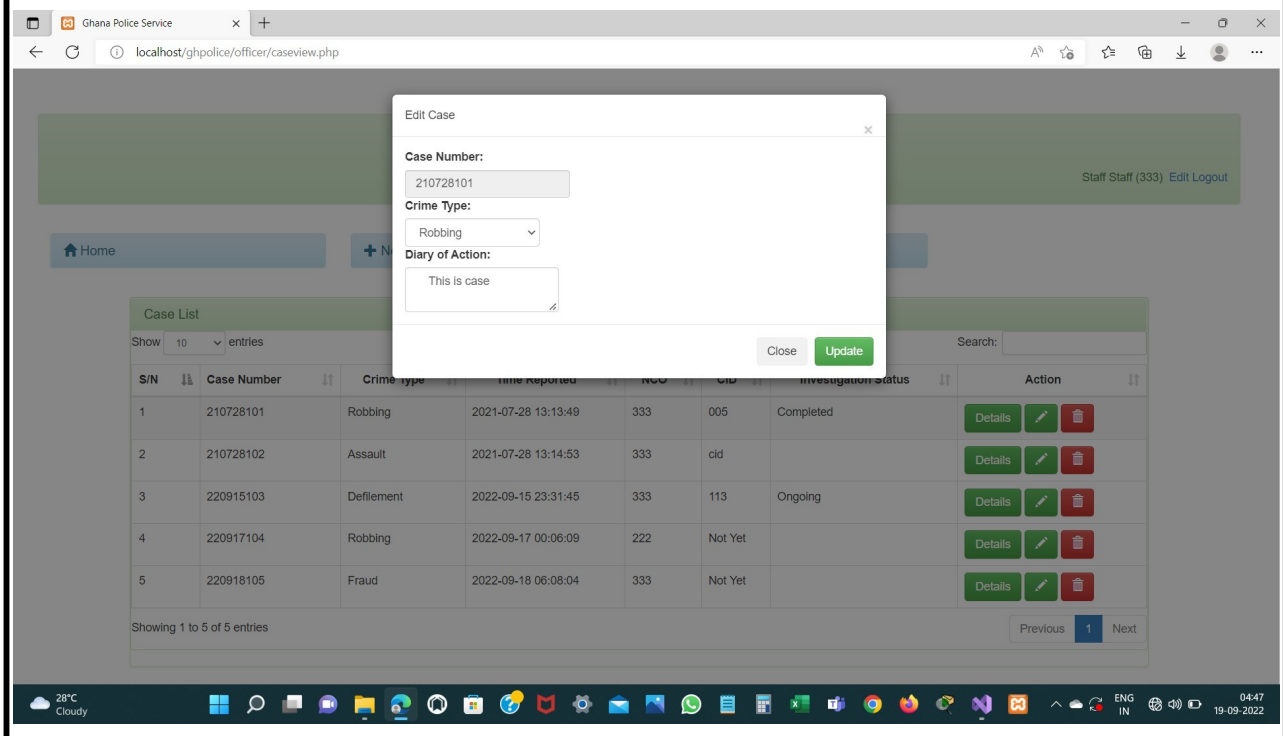
NCO:

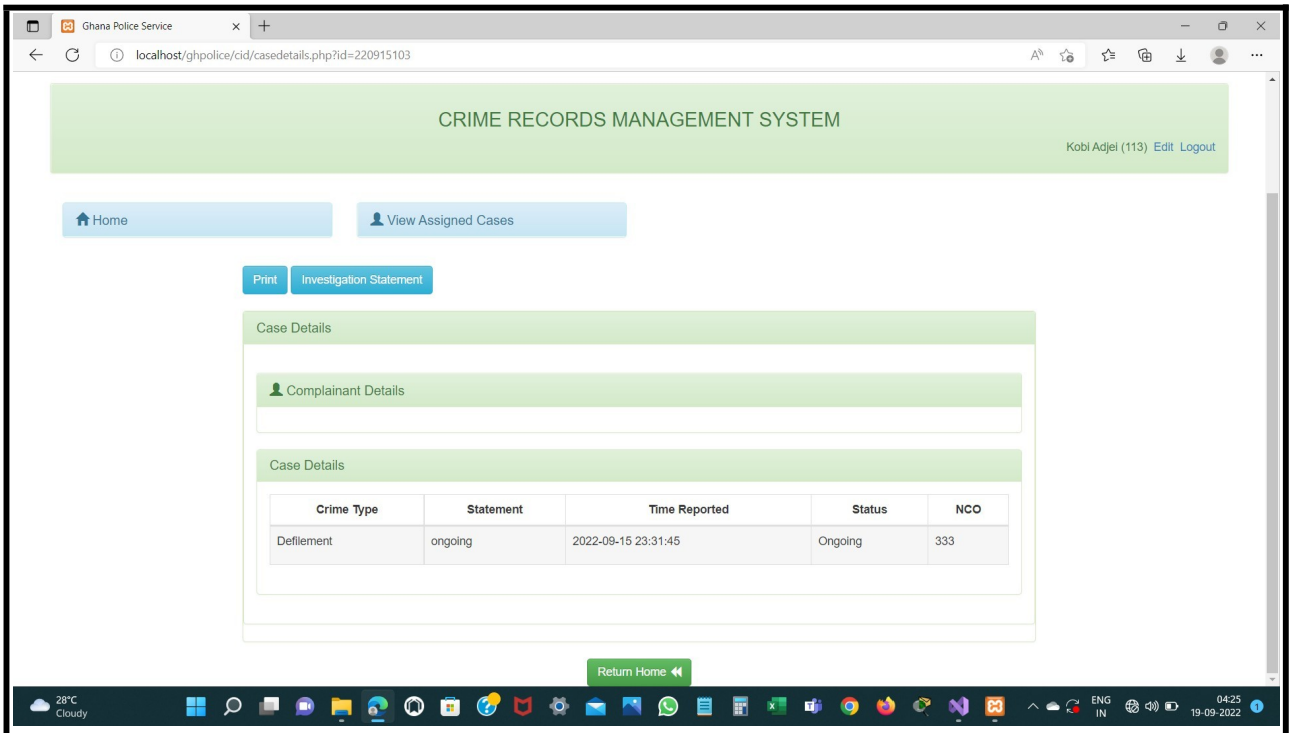

Ghana Police Service
localhost/ghpolice/officer/
CRIME RECORDS MANAGEMENT SYSTEM
Yahaya Eben (222) Edit Logout
Home
New Case
View Cases
AP POLICE SERVICE

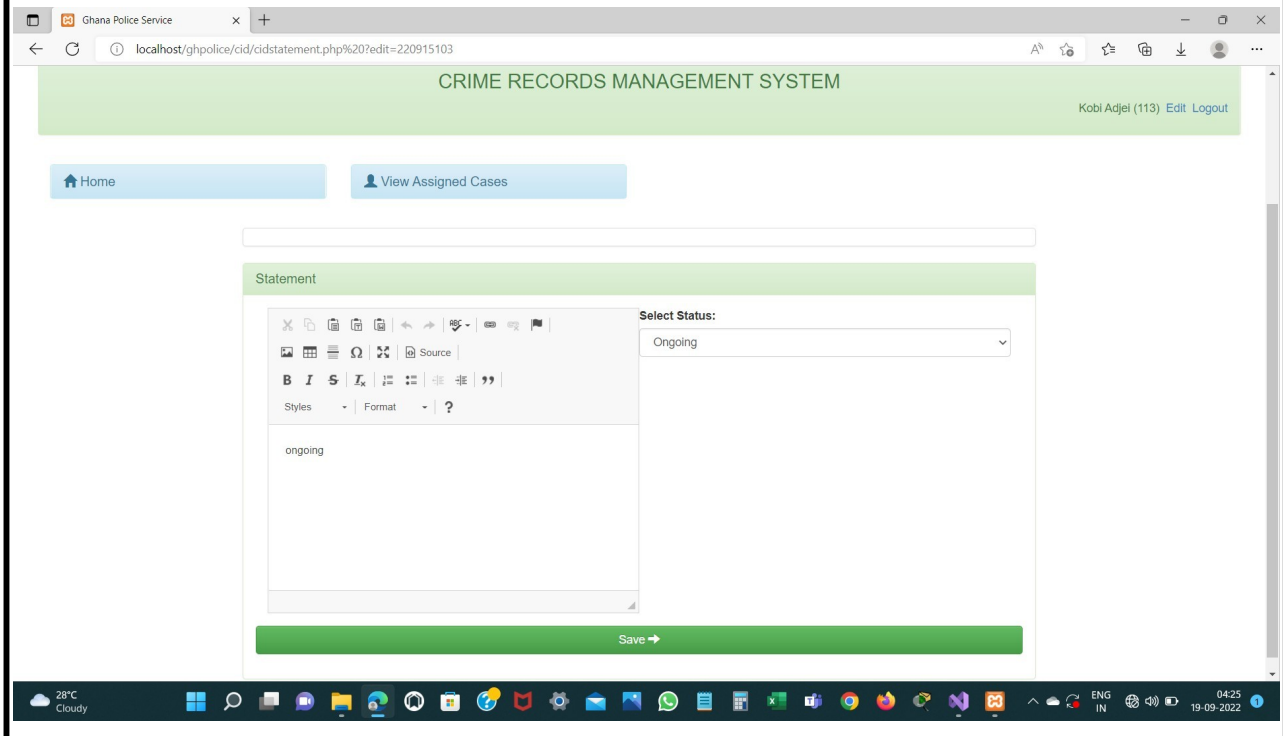

Ghana Police Service
localhost/ghpolice/officer/addcompl.php
CRIME RECORDS MANAGEMENT SYSTEM
Yahaya Eben (222) Edit Logout
Home
New Case
View Cases
Complainant Details
Name of Complainant:
Enter Name
Tel Phone:
Phone Number
Occupation:
Enter Occupation
Age:
Age
Gender:
Select
Address:
Address
Region:
Select Region
District/Municipal:
Location:
Enter Location
Select Crime Type:
Select
Save and Continue
28°C
Cloudy
ENG
IN
04:24
19-09-2022


Ghana Police Service
localhost/ghpolice/officer/caseview.php
CRIME RECORDS MANAGEMENT SYSTEM
Yahaya Eben (222) Edit Logout
Home
New Case
View Cases
Case List
Show 10 entries
Search:
S/N
Case Number
Crime Type
Time Reported
NCO
CID
Investigation Status
Action
1 210728101 Robbing 2021-07-28 13:13:49 333 005 Completed Details
2 210728102 Assault 2021-07-28 13:14:53 333 cid Details
3 220915103 Defilement 2022-09-15 23:31:45 333 113 Ongoing Details
4 220917104 Robbing 2022-09-17 00:06:09 222 Not Yet Details
5 220918105 Fraud 2022-09-18 06:08:04 333 Not Yet Details
Showing 1 to 5 of 5 entries
Previous
1
Next
28°C
Cloudy
ENG
IN
04:24
19-09-2022


Ghana Police Service
localhost/ghpolice/officer/casedetails.php?id=210728101&status=Completed
Print
Investigation Statement
Change CID Officer
Case Details
Complainant Details
Case Number: 210728101
Name: Yahaya Osman
Gender: Male
Age: 55
Occupation: Lecturer
Tel: 0509997797
Region: Bono Region
District: Dormaa Central Municipal
Location: Sunyani
Case Details
Crime Type | Diary of Action | Time Reported | NCO | CID | Status
Robbing | This is case | 2021-07-28 13:13:49 | 333 | 005 | Completed


Ghana Police Service
localhost/ghpolice/officer/caseview.php
Edit Case
Case Number:
210728101
Crime Type:
Robbing
Diary of Action:
This is case
Close
Update
Staff Staff (333) Edit Logout
Home
Case List
Show 10 entries
Search:
S/N | Case Number | Crime Type | Time Reported | NCO | CID | Investigation Status | Action
1 | 210728101 | Robbing | 2021-07-28 13:13:49 | 333 | 005 | Completed | Details
2 | 210728102 | Assault | 2021-07-28 13:14:53 | 333 | cid | | Details
3 | 220915103 | Defilement | 2022-09-15 23:31:45 | 333 | 113 | Ongoing | Details
4 | 220917104 | Robbing | 2022-09-17 00:06:09 | 222 | Not Yet | | Details
5 | 220918105 | Fraud | 2022-09-18 06:08:04 | 333 | Not Yet | | Details
Showing 1 to 5 of 5 entries
Previous 1 Next


Ghana Police Service
localhost/ghpolice/cid/casedetails.php?id=220915103
CRIME RECORDS MANAGEMENT SYSTEM
Kobi Adjei (113) Edit Logout
Home
View Assigned Cases
Print
Investigation Statement
Case Details
Complainant Details
Case Details
Crime Type
Statement
Time Reported
Status
NCO
Defilement
ongoing
2022-09-15 23:31:45
Ongoing
333
Return Home
28°C
Cloudy
ENG
IN
04:25
19-09-2022


Ghana Police Service
localhost/ghpolice/cid/cidstatement.php%20?edit=220915103
CRIME RECORDS MANAGEMENT SYSTEM
Kobi Adjei (113) Edit Logout
Home
View Assigned Cases
Statement
Source
Styles
Format
ongoing
Select Status:
Ongoing
Save
28°C
Cloudy
ENG
IN
04:25
19-09-2022

10 CONCLUSION:

Nowadays everything is getting computerized.Manual work usally consumes a lot of paper work and time ,it leads to error-prone,with help of this application it is easy for NCOs,CIDs to their manage crime records.The Police Crime Record Management System main Motto is based on CRUD i,e; Create, Read,Update,Delete. Thus the Police Crime Record Management System overcomes most of the existing system limitations. It is a very User-friendly application.The Web- Application project “Police Crime Record Management System” is successfully completed.

11 REFERENCES:

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[6] https://www.mssqltips.com/sqlservertutorial/9222