Burglary and Theft Management System

1.Introduction

This project's main objective is to develop a comprehensive and user-friendly database management system that effectively tracks, manages, and analyzes burglary and theft incidents which will improve public safety and community well-being. Our goal is to prevent crime and advance a safer community by providing law enforcement agencies with actionable insights, streamlining incident reporting and response, and encouraging community participation

2.Business Problems Addressed

Delayed Response and Investigation Time

Police departments can gather information more rapidly, accelerate the investigation process, and reduce reaction times when every theft incidence is digitally recorded which includes information about when the crime occurred, the identity of the suspects, and the police officer leading the investigation

Difficulty in Connecting Related Theft Incidents

Officers may view suspects past records, link similar cases, and keep track of their involvement in other incidents with ease because of a centralized database, which makes it easier to spot patterns and monitor organized crime activity.

Lack of Accountability and Transparency

To provide complete transparency and responsibility for law enforcement actions, the database maintains careful records of each case, including reporting times, officers assigned, suspects identified, and measures taken.

Comprehensive Suspect History Analysis

Officers have access to a suspect's whole history through the system, including any prior cases they may have been involved in, charges they have faced, and convictions. This allows for a more thorough investigation and helps to strengthen cases.

3. Entities Description

3.1 Police

- **Attributes:** Police ID, Name, Role (Admin, Officer, Investigator, etc.), Contact Information, Years of Service

- **Relationships:** Is Assigned, Logs

3.2 Incident Report

- **Attributes:** Incident Id, Type, Date and Time, Description
- **Relationships:** Has, Involves, takes place at, Is Assigned, Is Related To, Includes, Receives, Identifies, Records.

3.3 Suspect

- **Attributes:** Suspect Id, Gender, Contact Information, Age, Last Known Location, Height, Description
- **Relationships:** Relates To

3.4 Victim

- **Attributes:** Victim Id, Name, Gender, Contact Information, Description
- **Relationships:** Is About, Provides

3.5 Evidence

- **Attributes:** Id, Type, Collection Date
- **Relationships:** Includes

3.6 Property (Theft)

- **Attributes:** Id, Type, Description, Estimated Value
- **Relationships:** Involves

3.7 Witness

- **Attributes:** Id, Name, Gender, Contact Information, Statement
- **Relationships:** Testified By

3.8 Investigation

- **Attributes:** Id, Start Date, End Date, Status
- **Relationships:** Is Related To

3.9 Location

- **Attributes:** Id, Address, Type (Residential, Commercial), Surveillance Availability
- **Relationships:** Takes Place At

3.10 Response

- **Attributes:** Id, Arrival Time, Response Time

- **Relationships:** Logs, Records

3.11 Feedback

- **Attributes:** Id, Description, Rating
- **Relationships:** Provides, Receives

Associative Entities

3.12 Victim Involvement

- **Attributes:** Role, Date of Involvement
- **Relationships:** Has, Is About

3.13 Witness Involvement

- **Attributes:** Date Of Testimony
- **Relationships:** Has, Testified by

3.14 Suspect Involvement

- **Attributes:** Date Of Involvement, Role, Status, Arrest Date
- **Relationships:** Has, Testified by

4. Entity Relationships

4.1 Incident Report

- **Police:** (Many to One) Many incidents report will be assigned to one police.
- **Investigation:** (One to Many) An Incident report will be related to more than one Investigations.
- **Property:** (One to Many) There will be more than one property that will be involved in the incident report.
- **Victim:** (Many to Many) There will be more than one victim mentioned in the Incident Report.
- **Victim Involvement:** (One to one) There will be one Victim Involvement.
- **Location:** (One to One) The Incident Report will contain only one location of incident.
- **Evidence** (One to Many): There may be more than one evidence.
- **Feedback** (One to One): There will be one feedback for one incident report.

- **Suspect:** Many to Many (Many Incident reports will have will have list of many suspects.)
- **Response:** One to Many (One Incident Report will keep logs of many Responses provided by the police)

4.2 Police:

- **Response:** One to Many (One Police will keep logs of many Responses provided by the police)
- **Incident Report:** One to Many (One Police will be assigned to more than one incidence in Incident Report)

4.3 Response:

- **Incident Report** Many to One (There will be more than one response recorded for single Incident Report).
- **Police:** Many to One (Many Responses could be logged by one Police)

4.4 Investigation:

- **Incident Report:** Many to One (Multiple Investigations could be carried out and recorded in the incident report)

4.5 Suspect:

- **Suspect Involvement:** One to Many (Suspect is related to optionally more than one Suspect Involvement)

4.6 Feedback:

- **Incident Report:** One to One (One Incident report is provided only one feedback)
- **Victim:** Many to One (Many Feedback would be provided to)

4.7 Evidence:

- **Incident Report:** Many to one (Many Evidences can be found and reported in Incident Report)

4.8 Witness:

- **Witness Involvement:** One to Many (One Witness could have many witness involvement details to be stored)

4.9 Witness Involvement:

- **Witness:** Many to One (Many Witnesses Involvement related testification will be given by One Witness)
- **Incident Report:** Many to One (Many witnesses related information will be stored in single incident report)

4.10 Victim:

- **Feedback:** One to Many (One Victim can provide many feedbacks throughout the case)
- **Victim Involvement:**

4.11 Property:

- **Incident Report:** Many to One (Many Properties could be involved in the incident report)

4.12 Suspect Involvement:

- **Incident Report:** Many to One (Many Suspect Involvement are identified in one Incident Report)
- **Suspect:** Many to One (Many Suspect involvement will be related to one Suspect)

4.13 Victim Involvement:

- **Victim:** Many to One (Many Victims Involvement related information is about one Employee)
- **Incident Report:** Many to One (Many Victims Involvement information is associated with One Incident Report)

4.14 Location

- **Incident Report:** Many to One (There can be more than one Location for single incident in Incident Report).