Hotel Database Proposal

Description:

Our database aims to store hotel information for many different hotels. The goal being that hotels can use our database to manage employees and promote their business. The hotels will be able to store information regarding both clients and employees in an organized fashion. We do plan to create a website so that our database can be altered and changed by specific administrators however all the information besides possibly the clients and employee information will be viewable by anyone. This way when a person decides to look for a hotel they are able to see information about the hotel specifically and also information regarding local destinations that the client can visit. Administrators will be able to alter personal information such as who is renting a room at a specific hotel and which employee is in charge for each task in the hotel.

Requirements:

The database will store multiple **Hotels;** these Hotels will store their own address and unique hotel id stored as hid. The database will keep track of each hotel's **Employees, Rooms, Reservations and Clients.**

The **Destinations** entity set will hold information regarding the different places to go near the hotel. This means that **Hotel** will give destinations its hid as a foreign key. Each destination will hold an address, their name, and a small description of what can be done at the destination.

Employees will hold the information regarding all the employees in the hotel. It will hold the employee's specific id, the employee's title, and their name. To link employees to hotel the **Employee** entity will take in hid as a foreign key.

There will also be a **Room Category** entity set that will hold specific information about the different types of rooms in each hotel. It will hold its own specific id number which is a primary key and an hid number which is a foreign key referencing the set **Hotel.** Each room category will also hold the price and description of the rooms.

The **Rooms** set will be responsible for holding information about each specific room in the hotel. So it needs to hold the hotel id(hid) which references the entity set **Hotel**. The set also needs to hold the room category(rcid) which references **Room Category**. The other information that is needed in the rooms set is the room id(rid) which is a primary key, occupancy, and number.

A **Clients** entity set is used to hold information about the occupants such as their own unique id (cid) which is a primary key. The set will also hold their name, address, date of birth, gender, and phone number.

The **Rooms Reserved** relation is used to save which rooms are being reserved by who. So it will hold the specific room id from **Rooms** and the specific customer id from **Clients.**

Schemas:
Hotel(address, hid)
PRIMARY KEY (hid)

Destinations(hid, name, description, address)
PRIMARY KEY (address)
FOREIGN KEY (hid) REFERENCES Hotel(hid)

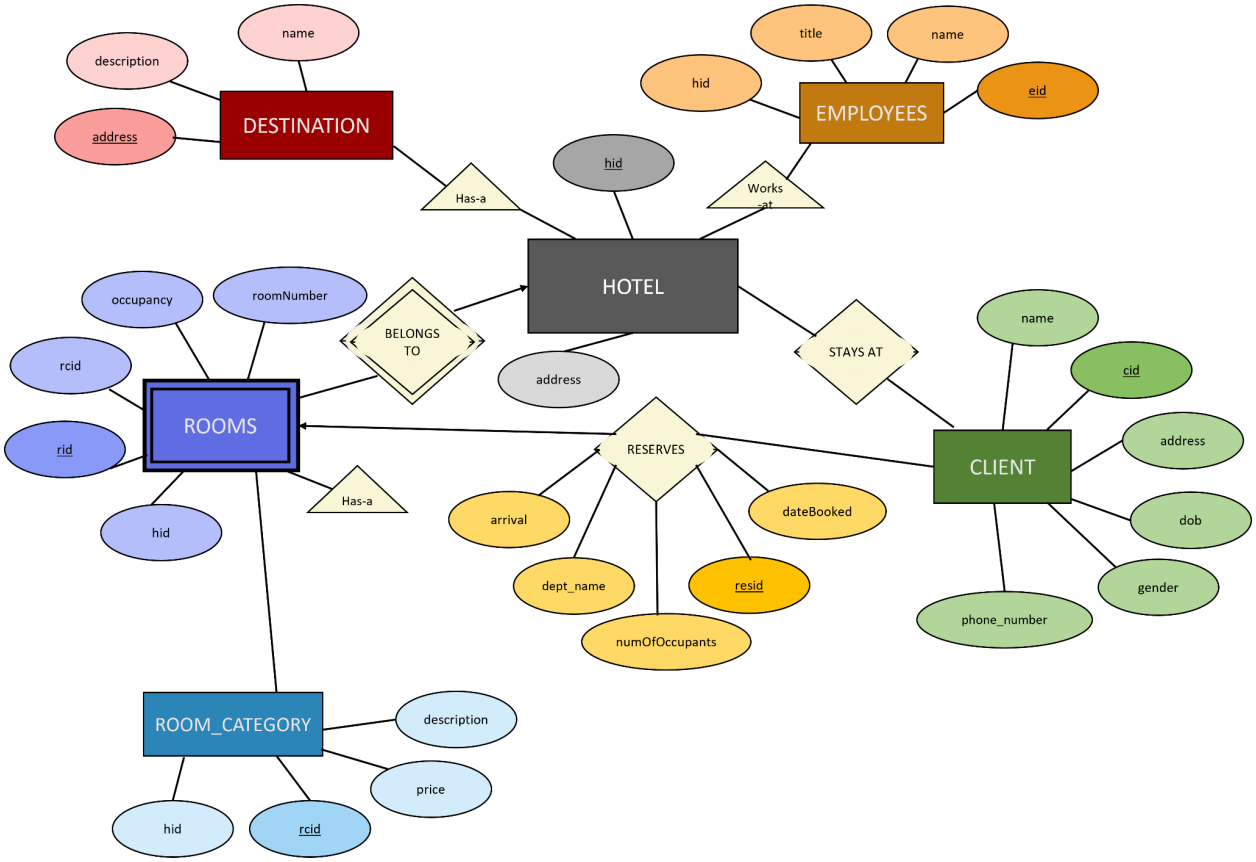
Employees(hid, eid, title, name)
PRIMARY KEY (eid)
FOREIGN KEY (hid) REFERENCES Hotel(hid)

Room_Category(rcid, hid, price, desc)
PRIMARY KEY (rcid)
FOREIGN KEY (hid) REFERENCES Hotel(hid)

Rooms(hid, rid, rcid, occupancy, number)
PRIMARY KEY (rid)
FOREIGN KEY (hid) REFERENCES Hotel(hid)
FOREIGN KEY (rcid) REFERENCES Room_Category (rcid)

Clients(cid, name, address, dob, gender, phone_number)
PRIMARY KEY (cid)

Rooms_reserved(cid, rid)
FOREIGN KEY (cid) REFERENCES Client(cid)
FOREIGN KEY (rid) REFERENCES Rooms(rid)


name
description
address
DESTINATION
Has-a
hid
HOTEL
title
name
hid
EMPLOYEES
eid
Works at
occupancy
roomNumber
BELONGS TO
rcid
rid
ROOMS
hid
Has-a
address
STAYS AT
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cid
address
dob
gender
phone_number
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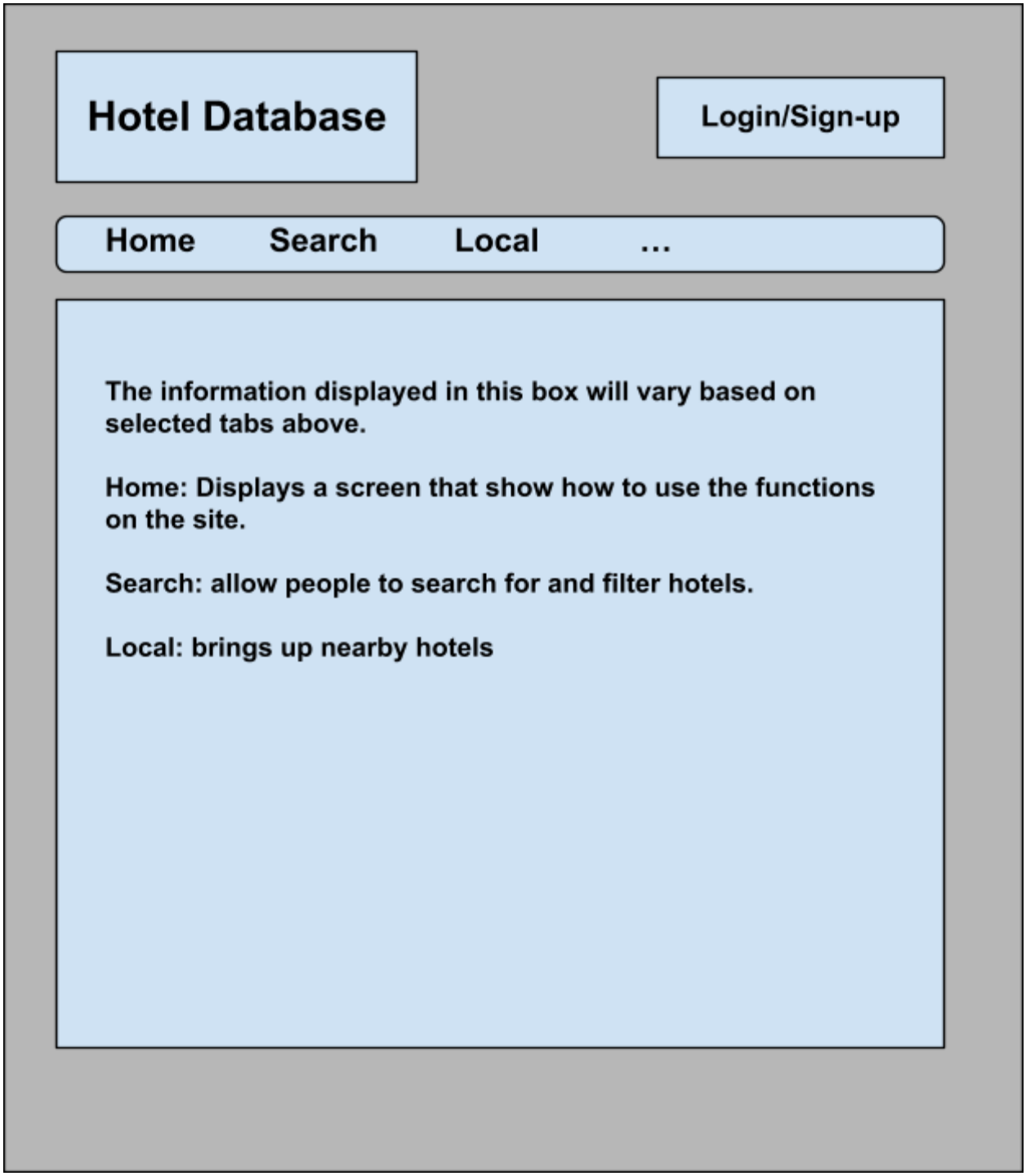
dept_name
numOfOccupants
resid
dateBooked
ROOM_CATEGORY
description
price
hid
rcid

ER Diagram



Website Mock-up