**Project Name: “Travel And Tourism Management System”**

**Entities and Attributes**

1. **User**
   * **Attributes:**
     + user\_id (Primary Key)
     + Username
     + Email
     + Phone
     + Age
     + Address
     + Gender
     + Country
2. **Account**
   * **Attributes:**
     + user\_id (Primary Key, Foreign Key referencing User)
     + Username
     + Password
     + Security question
     + Security answer
3. **TourPackage**
   * **Attributes:**
     + package\_id (Primary Key)
     + Name
     + Price
     + Duration
     + Start date
     + End date
4. **Destination**
   * **Attributes:**
     + destination\_id (Primary Key)
     + Name
     + Country
     + City
     + Description
5. **Hotel**
   * **Attributes:**
     + hotel\_id (Primary Key)
     + Name
     + Days
     + AC (Air Conditioning)
     + Food
     + Price
6. **Payment**
   * **Attributes:**
     + payment\_id (Primary Key)
     + Date
     + Payment method
     + Status
     + Amount

**Relationships**

1. **User** has an **Account**:
   * A user can have one account, and an account is associated with one user.
2. **TourPackage** has **Destinations**:

(One tour package can have multiple destinations)

* + A tour package can include multiple destinations.

1. **User** can book a **TourPackage**:

(One user can book multiple tour packages)

* + A user can book multiple tour packages, but each booking is associated with one tour package.

1. **TourPackage** has **Hotels**:

(One tour package can have multiple hotels)

* + A tour package can include multiple hotels for accommodation.

1. **TourPackage** has **Payments**:

(One tour package can have multiple payments)

* + A tour package can have multiple payments associated with it.

**Description of Database Related Information**

* **User and Account:**
  + Each user has a corresponding account with a username and password for authentication purposes. The account also includes security questions and answers for added security.
* **Tour Package:**
  + Each tour package has unique attributes such as name, price, duration, start date, and end date. These details help in defining and identifying individual packages.
* **Destinations within Tour Packages:**
  + Destinations are linked to tour packages, indicating the places included in each package. Each destination has attributes like name, country, city, and description.
* **Hotels in Tour Packages:**
  + Hotels are part of tour packages, specifying the accommodation details. Hotel attributes include name, number of days, whether they have air conditioning, food services, and price.
* **Payment Information:**
  + Payments related to tour packages include the payment date, method, status, and amount. This ensures that all financial transactions are tracked and managed.

**Higher-Level Functionalities**

1. **User Management:**
   * Registration, login, and profile management using the User and Account entities.
2. **Package Management:**
   * Creation, updating, and deletion of tour packages, including managing the associated destinations and hotels.
3. **Booking Management:**
   * Users can book tour packages, with their details stored in the relationship between User and TourPackage.
4. **Payment Processing:**
   * Managing and processing payments, ensuring all transactions are recorded in the Payment entity.

**ER Diagram**

