**The entity relation diagram:**

1. Hotel ( H\_ID, H\_name , H\_Loc , H\_Policy , H\_email , H\_phone , H\_website )

FDs: H\_ID -> H\_name , H\_Loc , H\_Policy , H\_email , H\_phone , H\_website

NORMAL FORM: BCNF

1. Airline ( Air\_ID, Air\_name , Air\_Policy , Air\_email , Air\_website , Air\_phone)

FDs: Air\_ID -> Air\_name , Air\_Policy , Air\_email , Air\_website , Air\_phone

NORMAL FORM: BCNF

1. Car\_Comp ( Comp\_id, Comp\_name , Comp\_Policy , Comp\_Email , Pickup\_Loc , Dropoff\_Loc , Comp\_website , Comp\_phone )

FDs: comp\_ID -> Comp\_name , Comp\_Policy , Comp\_Email , Pickup\_Loc , Dropoff\_Loc , Comp\_website , Comp\_phone

NORMAL FORM: BCNF

1. Orders (Ord\_id, Booking\_status , Products , SalesDept\_Empl , Cust\_Pref , Ord\_Date , Ord\_App , Cust\_ID)

FDs:Ord\_ID -> Booking\_status , Products , SalesDept\_Empl , Cust\_Pref , Ord\_Date , Ord\_App , Cust\_ID

NORMAL FORM: BCNF

1. Customer (Cust\_ID , Cust\_Name , Cust\_email , Cust\_phone , Cust\_address , nationality , Bank\_acc , Date\_Birth , Credit\_Worthiness )

FDs:Cust\_ID-> Cust\_Name , Cust\_email , Cust\_phone , Cust\_address , nationality , Bank\_acc , Date\_Birth , Credit\_Worthiness

NORMAL FORM: BCNF

**The weak entities:**

1. Room (H\_ID , Room\_ID , R\_Number , R\_Type , R\_Price , R\_availability , R\_Ameneties)

FDs: {H\_ID,Room\_ID}->, R\_Number , R\_Type , R\_Price , R\_availability , R\_Ameneties

NORMAL FORM: BCNF

1. ticket (Air\_ID , Ticket\_ID , flight\_num ,Seat\_Num , dept\_Loc , Arr\_loc , Availability , Arr\_time\_stamp , dept\_time\_stamp , class , price )

FDs: {Air\_ID,Ticket\_ID} -> flight\_num ,Seat\_Num , dept\_Loc , Arr\_loc , Availability , Arr\_time\_stamp , dept\_time\_stamp , class , price

NORMAL FORM: BCNF

1. Car ( Comp\_ID , Car\_ID , License\_Num , Model , Make , C\_Type , C\_Year , Trans\_Type , Num\_Seats , Features , Fuel\_Type , Rental\_Price )

FDs: {Comp\_ID,Car\_ID} -> License\_Num , Model , Make , C\_Type , C\_Year , Trans\_Type , Num\_Seats , Features , Fuel\_Type , Rental\_Price

NORMAL FORM: BCNF

1. Payment (Cust\_ID , Pay\_RefNum , Paid\_Amount , Status , Discount , Conditions )

FDs:{Cust\_ID,Pay\_RefNum}-> Paid\_Amount , Status , Discount , Conditions

NORMAL FORM: BCNF

**Ternary relationships:**

1. Room\_booked (Ord\_ID , Cust\_ID , H\_ID , Room\_ID)

NORMAL FORM: BCNF

1. Car\_rented (Ord\_ID , Cust\_ID , Comp\_ID , car\_ID )

NORMAL FORM: BCNF

1. ticket\_reserved ( Ord\_ID , cust\_ID , Air\_ID , ticket\_ID ,)

NORMAL FORM: BCNF