

LIST OF ALL THE QUERIES

Question 1: Total payment made by cid='0123'

Sql Query:

```
SELECT CID, ((R3.TOTALCOST * (100-R4.DISCOUNT))/100) AS FINALPAYMENT FROM
(SELECT CID, (P1+P2) AS TOTALCOST FROM
(SELECT SUM ((DATEDIFF(CHECKOUT,CHECKIN) + 1) * PRICE) AS P1, CID FROM
(SELECT * FROM RESERVATION JOIN ROOM ON RESERVATION.RNO=ROOM.RNO AND
ROOM.HOTELID=RESERVATION.HOTELID WHERE CID=0123)) AS R1
JOIN
(SELECT SUM (PRICE * QUANTITY) AS P2, CID FROM (SELECT * FROM ORDER JOIN ITEM ON
ORDER.ITEMID=ITEM.ITEMID WHERE CID=0123)) AS R2
ON R1.CID=R2.CID) AS R3
JOIN
(SELECT CID, DISCOUNT FROM OFFER WHERE CID=0123)AS R4
WHERE R3.CID=R4.CID
```

Question 2: Find total no. of vacant room of type 'SUITE' in hotel where HOTELID='012'

Sql Query:

```
SELECT COUNT(R1) FROM(SELECT RNO AS R1 FROM ROOM WHERE ((HOTELID=012) AND
(ROOMTYPE='SUITE'))
EXCEPT SELECT RNO FROM RESERVATION WHERE HOTELID=012)
```

Question 3: Find total no. of bills generated on a particular date

Sql Query:

```
SELECT DATE,COUNT(BILLID) FROM BILL GROUP BY DATE HAVING(DATE='2016-4-4');
```

Question 4: Find total income from residential area of a hotel '0125' in the month of March of current year

Sql Query:

```
SELECT SUM((DATEDIFF(CHECKOUT,CHECKIN) + 1) * PRICE) FROM  
  
(SELECT CID FROM BILL WHERE (DATEDIFF(day, BILL.DATE, '2016-3-1') <=0 AND  
DATEDIFF(day,BILL.DATE, '2016-3-31')>=0))AS R1  
  
JOIN reservation AS R2 ON R1.CID=R2.CID AND R2.HOTELID=0125);
```

Question 5: Find total no. of customers staying in a particular hotel currently.

Sql Query:

```
SELECT (COUNT(DISTINCT CID) +COUNT(RELATIVE_NAME)) AS REL FROM  
  
RESERVATION JOIN RELATIVES ON RESERVATION.CID=RELATIVES.CID WHERE  
  
HOTELID=1002 AND DATEDIFF(day, CHECKOUT,CURDATE())<=0;
```

Question 6: List all the customers who stayed in a particular hotel during a particular duration

Sql Query:

```
SELECT CID FROM RESERVATION WHERE HOTELID=1002 AND CHECK-IN BETWEEN DATE '2016-03-20' TO  
DATE '2016-06-22';
```

Question 7: A particular customer in a hotel gets which offer

Sql Query:

```
SELECT OFFERID FROM OFFER WHERE CID= 1002 AND HOTELID=1002 ;
```

Question 8: Most sold item in a particular hotel

Sql Query:

SELECT ITEMID,R2.R1 from

(SELECT ITEMID, SUM(QUANTITY) AS R1 FROM orders

GROUP BY ITEMID ORDER BY R1 DESC) as R2 WHERE R1 IN (SELECT SUM(QUANTITY) AS R1 FROM
ORDERS

GROUP BY ITEMID ORDER BY R1 DESC LIMIT 1)

Question 9: Give all the hotel names in a particular zip area

Sql Query:

SELECT NAME FROM HOTEL WHERE ZIP= 335051;

Question 10: All the items ordered by a customer

Sql Query:

SELECT I.ITEMNAME FROM ITEM I NATURAL JOIN ORDER O WHERE CID=1001;

Question 11: Names all the waiters in a particular city.

Sql Query:

SELECT WAITERNAME FROM WAITER WHERE HOTELID IN

(SELECT HOTELID FROM HOTEL NATURAL JOIN CITY WHERE ZIP=335051);

Question 12: Give count of empty rooms on a floor in a particular hotel

Sql Query:

SELECT COUNT(RNO) FROM ROOM WHERE HOTELID=1005 AND Floor=1

EXCEPT

SELECT COUNT(RNO) FROM ROOM NATURAL JOIN RESERVATION WHERE HOTELID=1005 AND FLOOR=1;

Question 13: Find Income Of Hotels In a Year.

Sql Query:

```

SELECT SUM (FINALPAYMENT)
FROM (
SELECT CID,((R3.TOTALCOST * (100-R4.(DISCOUNT)))/100) AS FINALPAYMENT FROM
(SELECT CID,(P1+P2) AS TOTALCOST FROM
(SELECT SUM(((CHECKOUT-CHECKIN) + 1) * PRICE) AS P1, CID FROM
(SELECT * FROM RESERVATION JOIN ROOM ON RESERVATION.RNO=ROOM.RNO AND
ROOM.HOTELID=RESERVATION.HOTELID )
where CHECKIN>date'2016-01-01'and CHECKOUT<date '2016-12-31') AS R1
JOIN
(SELECT SUM (PRICE * QUANTITY) AS P2, CID FROM (SELECT * FROM ORDER JOIN ITEM ON
ORDER.ITEMID=ITEM.ITEMID )) AS R2
ON R1.CID=R2.CID)AS R3
JOIN
(SELECT CID,DISCOUNT FROM OFFER )AS R4
WHERE R3.CID=R4.CID )

```

Question 14. Give the name of customers who paid by cash.

Sql Query:

```

SELECT FNAME FROM
( SELECT CID FROM BILL WHERE PAYMENTMODE='CASH') AS R1
NATURAL JOIN CUSTOMER ) AS R2

```

Question 15. Most costly item of the hotel.

Sql Query:

```

SELECT ITEMID,MAX(PRICE) FROM ITEM GROUP BY ITEMID.

```

Question 16. Current running offer in hotelid ='1005'.

Sql Query:

```

SELECT OFFERID,OFFERNAME FROM OFFER WHERE HOTELID='1005' AND CURRENTDATE BETWEEN
STARTDATE TO ENDDATE.

```