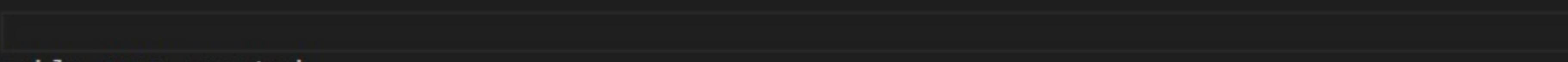


```
1 CREATE DATABASE SALES;
2
3 USE SALES;
4
5 CREATE TABLE Cus
6 (
7     CustomerID int PRIMARY KEY,
8     FirstName varchar(255) NOT NULL,
9     LastName varchar(255) NOT NULL,
10    DOB date NOT NULL,
11    Email varchar(255) NOT NULL,
12    Password varchar(255) NOT NULL,
13    Contact varchar(255) NOT NULL
14 );
15
16 CREATE TABLE Coun
17 (
18     CountryID int PRIMARY KEY,
19     CountryName varchar(255) NOT NULL
20 );
21
22 CREATE TABLE Pro
23 (
24     ProvinceID int PRIMARY KEY,
25     ProvinceName varchar(255) NOT NULL
26 );
27
28 CREATE TABLE Town
29 (
30     CityID int PRIMARY KEY,
31     CityName varchar(255) NOT NULL
32 );
33
34 CREATE TABLE Cat
35 (
36     CategoryID int PRIMARY KEY,
37     CategoryName varchar(255) NOT NULL
```

```
56     CategoryID int PRIMARY KEY,
57     CategoryName varchar(255) NOT NULL
58 );
59
60
61 CREATE TABLE Cour
62 (
63     CourierID int PRIMARY KEY,
64     Name varchar(255) NOT NULL,
65     Contact varchar(255) NOT NULL
66 );
67 INSERT INTO Cus (CustomerID, FirstName, LastName, DOB, Email, Password, Contact) VALUES
68 (1, 'Ravi', 'Kumar', TO_DATE('1990-03-15', 'YYYY-MM-DD'), 'ravi.kumar@example.com', 'pass123', '9876543210'),
69 (2, 'Priya', 'Sharma', TO_DATE('1992-07-20', 'YYYY-MM-DD'), 'priya.sharma@example.com', 'pass456', '9876543211'),
70 (3, 'Amit', 'Verma', TO_DATE('1985-11-02', 'YYYY-MM-DD'), 'amit.verma@example.com', 'pass789', '9876543212');
71 INSERT INTO Coun (CountryID, CountryName) VALUES
72 (1, 'India'),
73 (2, 'USA'),
74 (3, 'Canada');
75 INSERT INTO Pro (ProvinceID, ProvinceName) VALUES
76 (1, 'Tamil Nadu'),
77 (2, 'California'),
78 (3, 'Ontario');
79 INSERT INTO Town (CityID, CityName) VALUES
80 (1, 'Chennai'),
81 (2, 'San Francisco'),
82 (3, 'Toronto');
83 INSERT INTO Cat (CategoryID, CategoryName) VALUES
84 (1, 'Electronics'),
85 (2, 'Clothing'),
86 (3, 'Home Appliances');
87 INSERT INTO Cour (CourierID, Name, Contact) VALUES
88 (1, 'BlueDart', '1800101010'),
89 (2, 'FedEx', '1800202020'),
90 (3, 'Delhivery', '1800303030');
```

```
72  SELECT * FROM Cus;
73
74  SELECT * FROM Cus
75  WHERE DOB > TO_DATE('1990-01-01', 'YYYY-MM-DD');
76
77
78  SELECT * FROM Cus
79  ORDER BY FirstName;
80
81  SELECT EXTRACT(YEAR FROM DOB) AS BirthYear, COUNT(*) AS TotalCustomers
82  FROM Cus
83  GROUP BY EXTRACT(YEAR FROM DOB)
84  ORDER BY BirthYear;
85
86  SELECT Town.CityName, Pro.ProvinceName
87  FROM Town
88  INNER JOIN Pro ON Town.CityID = Pro.ProvinceID;
89
90
91  SELECT Town.CityName, Pro.ProvinceName
92  FROM Town
93  LEFT JOIN Pro ON Town.CityID = Pro.ProvinceID;
94
95  SELECT ROUND(AVG(TRUNC(MONTHS_BETWEEN(SYSDATE, DOB)/12))) AS AvgAge FROM Cus;
96
97
98  SELECT COUNT(*) AS TotalCouriers FROM Cour;
99
100
101  SELECT MIN(DOB) AS Youngest, MAX(DOB) AS Oldest FROM Cus;
102
103  SELECT * FROM Cus
104  WHERE TRUNC(MONTHS_BETWEEN(SYSDATE, DOB)/12) > (
105  |  SELECT AVG(TRUNC(MONTHS_BETWEEN(SYSDATE, DOB)/12)) FROM Cus
106  );
107
108  CREATE OR REPLACE VIEW CustomerSummary AS
```

```
108 CREATE OR REPLACE VIEW CustomerSummary AS
109 SELECT FirstName || ' ' || LastName AS FullName, Email, Contact
110 FROM Cus;
111
112 SELECT * FROM CustomerSummary;
113
114 CREATE INDEX idx_email ON Cus(Email);
115
116 CREATE INDEX idx_dob ON Cus(DOB);
```

```
1  Table CUS created.  
2  
3  Elapsed: 00:00:00.019  
4  
5  
6  Table COUN created.  
7  
8  Elapsed: 00:00:00.010  
9  
10  
11  Table PRO created.  
12  
13  Elapsed: 00:00:00.010  
14  
15  
16  Table TOWN created.  
17  
18  Elapsed: 00:00:00.009  
19  
20  
21  Table CAT created.  
22  
23  Elapsed: 00:00:00.012  
24  
25    
26  Table COUR created.  
27  
28  Elapsed: 00:00:00.012  
29  
30  
31  3 rows inserted.  
32  
33  Elapsed: 00:00:00.015  
34  
35  
36  3 rows inserted.  
37
```

```
25
26 Table COUR created.
27
28 Elapsed: 00:00:00.012
29
30
31 3 rows inserted.
32
33 Elapsed: 00:00:00.015
34
35
36 3 rows inserted.
37
38 Elapsed: 00:00:00.012
39
40
41 3 rows inserted.
42
43 Elapsed: 00:00:00.013
44
45
46 3 rows inserted.
47
48 Elapsed: 00:00:00.015
49
50
51 3 rows inserted.
52
53 Elapsed: 00:00:00.014
54
55
56 3 rows inserted.
57
58 Elapsed: 00:00:00.013
59 CUSTOMERID FIRSTNAME LASTNAME DOB           EMAIL          PASSWORD CONTACT
60 -----
61 1       Ravi      Kurian    07/15/1999 05:20:00 AM ravi_kurian@example.com  pass123  0876543210
```

```

59 CUSTOMERID FIRSTNAME LASTNAME DOB           EMAIL          PASSWORD CONTACT
60 -----
61 1      Ravi     Kumar    03/15/1990, 05:30:00 AM ravi.kumar@example.com pass123 9876543210
62 2      Priya    Sharma   07/20/1992, 05:30:00 AM priya.sharma@example.com pass456 9876543211
63 3      Amit     Verma    11/02/1985, 05:30:00 AM amit.verma@example.com  pass789 9876543212
64
65 Elapsed: 00:00:00.073
66 3 rows selected.

67
68 CUSTOMERID FIRSTNAME LASTNAME DOB           EMAIL          PASSWORD CONTACT
69 -----
70 1      Ravi     Kumar    03/15/1990, 05:30:00 AM ravi.kumar@example.com pass123 9876543210
71 2      Priya    Sharma   07/20/1992, 05:30:00 AM priya.sharma@example.com pass456 9876543211
72
73 Elapsed: 00:00:00.006
74 2 rows selected.

75
76 CUSTOMERID FIRSTNAME LASTNAME DOB           EMAIL          PASSWORD CONTACT
77 -----
78 3      Amit     Verma    11/02/1985, 05:30:00 AM amit.verma@example.com  pass789 9876543212
79 2      Priya    Sharma   07/20/1992, 05:30:00 AM priya.sharma@example.com pass456 9876543211
80 1      Ravi     Kumar    03/15/1990, 05:30:00 AM ravi.kumar@example.com  pass123 9876543210
81
82 Elapsed: 00:00:00.003
83 3 rows selected.

84
85 BIRTHYEAR TOTALCUSTOMERS
86 -----
87 1985      1
88 1990      1
89 1992      1
90
91 Elapsed: 00:00:00.004
92 3 rows selected.

93
94 CITYNAME      PROVINCENAME

```

```
93
94  CITYNAME          PROVINCENAME
95  -----
96  Chennai           Tamil Nadu
97  San Francisco     California
98  Toronto           Ontario
99
100 Elapsed: 00:00:00.010
101 3 rows selected.
102
103 CITYNAME          PROVINCENAME
104 -----
105 Chennai           Tamil Nadu
106 San Francisco     California
107 Toronto           Ontario
108
109 Elapsed: 00:00:00.004
110 3 rows selected.
111
112 AVGAGE
113 -----
114 35
115
116 Elapsed: 00:00:00.002
117 1 rows selected.
118
119 TOTALCOURIERS
120 -----
121 3
122
123 Elapsed: 00:00:00.003
124 1 rows selected.
125
126 YOUNGEST          OLDEST
127 -----
128 11/02/1985, 05:30:00 AM 07/20/1992, 05:30:00 AM
129
```

```
125  
126 YOUNGEST          OLDEST  
127 -----  
128 11/02/1985, 05:30:00 AM 07/20/1992, 05:30:00 AM  
129  
130 Elapsed: 00:00:00.003  
131 1 rows selected.  
132  
133 CUSTOMERID FIRSTNAME LASTNAME DOB           EMAIL           PASSWORD CONTACT  
134 -----  
135 3          Amit      Verma    11/02/1985, 05:30:00 AM amit.verma@example.com pass789 9876543212  
136  
137 Elapsed: 00:00:00.004  
138 1 rows selected.  
139  
140  
141  
142 View CUSTOMERSUMMARY created.  
143  
144 Elapsed: 00:00:00.005  
145 FULLNAME          EMAIL           CONTACT  
146 -----  
147 Ravi Kumar        ravi.kumar@example.com 9876543210  
148 Priya Sharma       priya.sharma@example.com 9876543211  
149 Amit Verma         amit.verma@example.com 9876543212  
150  
151 Elapsed: 00:00:00.003  
152 3 rows selected.  
153  
154  
155  
156 Index IDX_EMAIL created.  
157  
158 Elapsed: 00:00:00.012  
159
```

154  
155  
156 Index IDX\_EMAIL created.  
157  
158 Elapsed: 00:00:00.012  
159  
160  
161 Index IDX\_DOB created.  
162  
163 Elapsed: 00:00:00.012  
164