

```
#P13-PRANAV V RAJ-27-12A
```

```
menu = '''
```

```
1) append lines to IPL file
```

```
2) read and display text file and also display no of characters
```

```
3) display no of upper,lower alphabets, digts and spcl chars
```

```
4) display no of upper,lower consonants,vowels,whitespaces
```

```
0) exit from the menu
```

```
'''
```

```
def append():
```

```
    lines = [
```

```
        'On 30-Jan-2021, the BCCI announced that they were confident\n',
```

```
        'to host the tournament in India. The BCCI were considering\n',
```

```
        'to host the tournament in a few shortlisted cities, which\n',
```

```
        'included Kolkata, Delhi, Bangalore, Ahmedabad and Chennai,\n',
```

```
        'with Mumbai as an additional option.\n']
```

```
f=open('IPL2021.TXT','a')
```

```
rec=f.writelines(lines)
```

```
print('lines have been appended')
```

```
f.close()
```

```
def display():
```

```
    f=open('IPL2021.TXT')
```

```
    data=f.read()
```

```
    print(data)
```

```
    print('no of chars=',len(data))
```

```
def disinfo():
```

```
    f = open("IPL2021.txt")
```

```
    data = f.read()
```

```
    c= g = d = a = 0
```

```

for char in data:

    if 'A'<=char<='Z':

        c += 1

    elif 'a'<=char<='z':

        g += 1

    elif '0'<=char<='9':

        d += 1

    else: a+= 1

print("No of uppercase letters: ",c)
print("No of lowercase letters: ",g)
print("No of digits: ",d)
print("No of special characters: ",a)

f.close()

def disall():

    f = open("IPL2021.txt")

    data = f.read()

    uc = uv = lc = lv= d = sp= sc = 0

    for c in data:

        if 'A'<=c<='Z':

            if c in 'AEIOU': uv += 1

            else: uc += 1

        elif 'a'<=c<='z':

            if c in 'aeiou': lv += 1

            else: lc += 1

        else:

            if '0'<=c<='9':

                d += 1

            elif c == ' ':

```

```

        sp += 1

    else: sc +=1

print("No of uppercase consonants: ",uc)
print("No of uppercase vowels: ",uv)
print("No of lowercase consonants: ",lc)
print("No of lowercase vowels: ",lv)
print("No of digits: ",d)
print("No of spaces: ",sp)
print("No of Special Characters: ",sc)

f.close()

while True:

    print(menu)

    op = int(input("enter your option: "))

    if op == 1:

        append()

    elif op == 2:

        display()

    elif op == 3:

        disinfo()

    elif op == 4:

        disall()

    elif op == 0:

        break

'''

```

SAMPLE OUTPUT

- 1) append lines to IPL file
- 2) read and display text file and also display no of characters
- 3) display no of upper,lower alphabets, digts and spcl chars

- 4) display no of upper,lower consonants,vowels,whitespaces
- 0) exit from the menu

enter your option: 1

lines have been appended

- 1) append lines to IPL file
- 2) read and display text file and also display no of characters
- 3) display no of upper,lower alphabets, digts and spcl chars
- 4) display no of upper,lower consonants,vowels,whitespaces
- 0) exit from the menu

enter your option: 2

On 30-Jan-2021, the BCCI announced that they were confident to host the tournament in India. The BCCI were considering to host the tournament in a few shortlisted cities, which included Kolkata, Delhi, Bangalore, Ahmedabad and Chennai, with Mumbai as an additional option.

no of chars= 273

- 1) append lines to IPL file
- 2) read and display text file and also display no of characters
- 3) display no of upper,lower alphabets, digts and spcl chars
- 4) display no of upper,lower consonants,vowels,whitespaces
- 0) exit from the menu

enter your option: 3

No of uppercase letters: 18

No of lowercase letters: 197

No of digits: 6

No of special characters: 52

1) append lines to IPL file

2) read and display text file and also display no of characters

3) display no of upper,lower alphabets, digts and spcl chars

4) display no of upper,lower consonants,vowels,whitespaces

0) exit from the menu

enter your option: 4

No of uppercase consonants: 13

No of uppercase vowels: 5

No of lowercase consonants: 117

No of lowercase vowels: 80

No of digits: 6

No of spaces: 37

No of Special Characters: 15

'''

#P14-PRANAV V RAJ-12A-27

```
menu = '''

1) display IPL text file, no of words
2) no of times a,an,the appears
3) display no of words starting with a vowel
4) display no of words containing with two vowels
5) display no of words containing at most 6 characters
0) Quit from the menu
'''

def display():

    f = open("IPL2021.txt")

    print("no of words: ",len(f.read().split()))

    f.close()

def articles():

    f = open("IPL2021.txt")

    data = f.read().split()

    f.close()

    a,an,the = 0,0,0

    for word in data:

        if word.lower() == 'a':

            a+=1

        elif word.lower() == 'an':

            an+=1

        elif word.lower() == 'the':

            the+=1

    print("No of a's: ",a)

    print("No of an's: ",an)
```

```
print("No of the's: ",the)

def onevowel():

    f = open("IPL2021.txt")

    data = f.read().split()

    f.close()

    count = 0

    for word in data:

        if word[0].lower() in 'aeiou':

            count +=1

    print("No of words starting with a vowel: ",count)

def twovowels():

    f = open("IPL2021.txt")

    rec=f.read()

    data = rec.split()

    f.close()

    count = 0

    for word in data:

        for r in word:

            if len(word)>=2:

                if r.lower() in 'aeiou':

                    count +=1

    print("No of words containing with two vowels: ",count)

def sixchars():

    f = open("IPL2021.txt")

    data = f.read().split()

    f.close()

    h = 0
```

```

for word in data:

    if len(word) <= 6:

        h +=1

print("no of words with at most 6 chars: ",h)
while True:

    print(menu)

    op = int(input("enter your option: "))

    if op == 1:

        display()

    elif op == 2:

        articles()

    elif op == 3:

        onevowel()

    elif op == 4:

        twovowels()

    elif op == 5:

        sixchars()

    elif op == 0:

        break
'''

```

SAMPLE OUTPUT

- 1) display IPL text file, no of words
- 2) no of times a,an,the appears
- 3) display no of words starting with a vowel
- 4) display no of words containing with two vowels
- 5) display no of words containing at most 6 characters
- 0) Quit from the menu

enter your option: 1

no of words: 42

- 1) display IPL text file, no of words
- 2) no of times a,an,the appears
- 3) display no of words starting with a vowel
- 4) display no of words containing with two vowels
- 5) display no of words containing at most 6 characters
- 0) Quit from the menu

enter your option: 2

No of a's: 1

No of an's: 1

No of the's: 4

- 1) display IPL text file, no of words
- 2) no of times a,an,the appears
- 3) display no of words starting with a vowel
- 4) display no of words containing with two vowels
- 5) display no of words containing at most 6 characters
- 0) Quit from the menu

enter your option: 3

No of words starting with a vowel: 13

- 1) display IPL text file, no of words
- 2) no of times a,an,the appears
- 3) display no of words starting with a vowel
- 4) display no of words containing with two vowels
- 5) display no of words containing at most 6 characters

0) Quit from the menu

enter your option: 4

No of words containing with two vowels: 84

1) display IPL text file, no of words

2) no of times a,an,the appears

3) display no of words starting with a vowel

4) display no of words containing with two vowels

5) display no of words containing at most 6 characters

0) Quit from the menu

enter your option: 5

no of words with at most 6 chars: 27

1) display IPL text file, no of words

2) no of times a,an,the appears

3) display no of words starting with a vowel

4) display no of words containing with two vowels

5) display no of words containing at most 6 characters

0) Quit from the menu

enter your option: 0

'''

#P15-PRANAV V RAJ-12A-27

```
menu = '''

1) display IPL text file,no of lines
2) display no of lines not starting with vowel
3) display no of alphabets in every line
4) display no of spcl chars in every line
5) display no of words in every line
0) Quit
'''

def lines():
    f = open("IPL2021.txt")

    data = f.read()

    print(data)

    print("no of lines: ",data.count('\n'))

    f.close()

def vowels():
    f = open("IPL2021.txt")

    data = f.readlines()

    f.close()

    count = 0

    for line in data:
        if line[0].lower() not in 'aeiou':
            count += 1

    print("No of lines not starting with vowel: ",count)

def alpha():
    f = open("IPL2021.txt")
```

```

data = f.read()

f.close()

c=d=0

for char in data:

    if 'A'<=char<='Z':

        d += 1

    elif 'a'<=char<='z':

        c+=1

print("No of alphabets: ",c+d)

def sp():

    f = open("IPL2021.txt")

    data = f.read()

    f.close()

    y = 0

    for char in data:

        if not char.isalnum():

            y+= 1

    print("No of special characters: ",y)

def words():

    f = open("IPL2021.txt")

    count = f.read().count(' ')

    print("No of words: ",count)

while True:

    print(menu)

    op = int(input("Enter option no: "))

    if op == 1:

        lines()

    elif op == 2:

```

```

        vowels()
    elif op == 3:
        alpha()
    elif op == 4:
        sp()
    elif op == 5:
        words()
    elif op == 0:
        break
'''

```

SAMPLE OUTPUT

- 1) display IPL text file,no of lines
- 2) display no of lines not starting with vowel
- 3) display no of alphabets in every line
- 4) display no of spcl chars in every line
- 5) display no of words in every line
- 0) Quit

Enter option no: 1

On 30-Jan-2021, the BCCI announced that they were confident to host the tournament in India. The BCCI were considering to host the tournament in a few shortlisted cities, which included Kolkata, Delhi, Bangalore, Ahmedabad and Chennai, with Mumbai as an additional option

no of lines: 5

- 1) display IPL text file,no of lines

- 2) display no of lines not starting with vowel
- 3) display no of alphabets in every line
- 4) display no of spcl chars in every line
- 5) display no of words in every line
- 0) Quit

Enter option no: 2

No of lines not starting with vowel: 3

- 1) display IPL text file,no of lines
- 2) display no of lines not starting with vowel
- 3) display no of alphabets in every line
- 4) display no of spcl chars in every line
- 5) display no of words in every line
- 0) Quit

Enter option no: 3

No of alphabets: 215

- 1) display IPL text file,no of lines
- 2) display no of lines not starting with vowel
- 3) display no of alphabets in every line
- 4) display no of spcl chars in every line
- 5) display no of words in every line
- 0) Quit

Enter option no: 4

No of special characters: 52

- 1) display IPL text file,no of lines
- 2) display no of lines not starting with vowel
- 3) display no of alphabets in every line
- 4) display no of spcl chars in every line
- 5) display no of words in every line
- 0) Quit

Enter option no: 5

No of words: 37

- 1) display IPL text file,no of lines
- 2) display no of lines not starting with vowel
- 3) display no of alphabets in every line
- 4) display no of spcl chars in every line
- 5) display no of words in every line
- 0) Quit

Enter option no: 0

'''

```
#P16-PRANAV V RAJ-12A-27
```

```
st=[]

def push(ele):
    st.append(ele)

def pop():
    if st==[]:
        print('stack underflow')
    else:
        print(st.pop())
        print('popped')

def display():
    if st==[]:
        print('stack is empty')
    else:
        for i in st[::-1]:
            print(ele,end='')
        print()

menu=''

1.insert billing data in stock
2.delete billing data in stack
3.display content of stack
4.exit from menu
'''

while True:

    print(menu)

    op=int(input('enter your option:'))

    if op==1:
```



```

mb=int(input('enter the mobile no:'))

nm=input('enter the name:')

amt=float(input('enter the amount :'))

di=0

if amt<=2000:

    di=0

elif 2000<amt<=5000:

    di=(5/100)*amt

elif 5000<amt<=10000:

    di=(10/100)*amt

else:

    di=(15/100)*amt

na=amt-di

ele=[mb,nm,amt,di,na]

push(ele)

elif op==2:

    pop()

elif op==3:

    display()

else:

    break

'''

```

SAMPLE OUTPUT

- 1.insert billing data in stock
- 2.delete billing data in stack
- 3.display content of stack
- 4.exit from menu

```
enter your option:1
enter the mobile no:98726451
enter the name:AYUSHMAN
enter the amount :6000
```

```
1.insert billing data in stock
2.delete billing data in stack
3.display content of stack
4.exit from menu
```

```
enter your option:3
[98726451, 'AYUSHMAN', 6000.0, 600.0, 5400.0]
```

```
1.insert billing data in stock
2.delete billing data in stack
3.display content of stack
4.exit from menu
```

```
enter your option:2
[98726451, 'AYUSHMAN', 6000.0, 600.0, 5400.0]
```

```
popped
```

```
1.insert billing data in stock
2.delete billing data in stack
3.display content of stack
4.exit from menu
```

```
enter your option:0
```

```
'''
```

#P17-PRANAV V RAJ-27-12A

```
import mysql.connector as c

conn=c.connect(host='localhost',user='root',password='chhayavishva321')

crsr=conn.cursor()

def create():

    jh=int(input('enter the option:'))

    if jh==1:

        crsr.execute('create database EMPDB2021')

        print('database is created')

    elif jh==2:

        crsr.execute('use EMPDB2021')

        table='create table employee(code int,name char(20),bsal float,hra float,mobile int) '

        crsr.execute(table)

        print('table is created')

def insert():

    crsr.execute('use empdb2021')

    crsr.execute("insert into employee values(202023,'SHWETA MATHEW',120000,12000,65932171)")

    crsr.execute("insert into employee values(202014,'MANISH PANDEY',140000,14000,95980168)")

    crsr.execute("insert into employee values(202047,'GURAV KUMAR',170000,17000,55917452)")

    crsr.execute("insert into employee values(202038,'ANUJ CHADHA',180000,18000,55288335)")

    crsr.execute("insert into employee values(202027,'ROBERT GEORGE',150000,15000,95747618)")

    crsr.execute("insert into employee values(202018,'PIYALI DUTT',160000,16000,97211059)")

    crsr.execute("insert into employee values(202045,'AJAY SHRIVASTAVA',145000,14500,66806709)")
```

```

        crsr.execute("insert into employee values(202013,'SAMINA
KHATUN',125000,12500,6806709)")

        crsr.execute("insert into employee values(202140,'PRAKASH
GULATI',135000,13500,55715185)")

        crsr.execute("insert into employee values(202120,'SUMAN
KOTHARI',130000,13000,55437984)")

        crsr.execute("insert into employee values(202110,'PETER
WILLIAMS',175000,17500,98687010)")

        crsr.execute("insert into employee values(202130,'SAGARIKA
GHOSH',155000,15500,96528668)")

        crsr.execute("insert into employee values(202133,'VIVEK
JACOB',140000,14000,67977642)")

        crsr.execute("insert into employee values(202122,'RAKESH
SHARMA',130000,13000,97296186)")

        crsr.execute("insert into employee values(202139,'ANJALI
SHARMA',150000,15000,57123987)")

        crsr.execute("insert into employee values(202111,'KUNAL
JAIN',165000,16500,68908012)")

    conn.commit()

def display():

    ty=input('enter the option:')

    if ty=='a':

        crsr.execute('use empdb2021')

        crsr.execute('select * from employee')

        rows=crsr.fetchall()

        gap=' '*5

heading=f"{'CODE':8s}{gap}{'NAME':20s}{gap}{'BSAL':6s}{gap}{'HRA':10s}{gap}{'
MOBILE':14s}"

        print('='*100)

        print(heading)

        print('='*100)

        for rec in rows:

```

```
r=f"{rec[0]:8d}{gap}{rec[1]:20s}{gap}{rec[2]:3f}{gap}{rec[3]:<2.2f}{rec[4]:15d}"
```

```
    print(r)
```

```
    print('='*100)
```

```
elif ty=='b':
```

```
    crsr.execute('use empdb2021')
```

```
    crsr.execute('select * from employee order by code')
```

```
    data=crsr.fetchall()
```

```
    gap=' '*5
```

```
heading=f"{ 'CODE':8s}{gap}{ 'NAME':20s}{gap}{ 'BSAL':6s}{gap}{ 'HRA':10s}{gap}{ 'MOBILE':14s}"
```

```
    print('='*100)
```

```
    print(heading)
```

```
    print('='*100)
```

```
    for rec in data:
```

```
r=f"{rec[0]:8d}{gap}{rec[1]:20s}{gap}{rec[2]:3f}{gap}{rec[3]:<2.2f}{rec[4]:15d}"
```

```
    print(r)
```

```
    print('='*100)
```

```
menu='''
```

```
1.create a database empdb2021
```

```
2.create a table employee
```

```
3.insert values in the table
```

```
4.display table
```

```
5.display table employee sorted on code
```

```
'''
```

```
while True:
```

```
    print(menu)
```

```
op=int(input('enter the option:'))

if op==1:

    create()

elif op==2:

    insert()

elif op==3:

    display()

elif op==0:

    break

else:

    print('invalid option')

'''
```

SAMPLE OUTPUT

- 1.create a database empdb2021
- 2.create a table employee
- 3.insert values in the table
- 4.display table
- 5.display table employee sorted on code

enter the option:1

enter the option:1

database is created

- 1.create a database empdb2021
- 2.create a table employee
- 3.insert values in the table
- 4.display table
- 5.display table employee sorted on code

enter the option:1

enter the option:2

table is created

1.create a database empdb2021

2.create a table employee

3.insert values in the table

4.display table

5.display table employee sorted on code

Enter the option:2

1.create a database empdb2021

2.create a table employee

3.insert values in the table

4.display table

5.display table employee sorted on code

enter the option:3

enter the option:a

=====				
CODE	NAME	BSAL	HRA	MOBILE
=====				
202023	SHWETA MATHEW	120000.000000	12000.00	65932171
202014	MANISH PANDEY	140000.000000	14000.00	95980168
202047	GURAV KUMAR	170000.000000	17000.00	55917452
202038	ANUJ CHADHA	180000.000000	18000.00	55288335

202027	ROBERT GEORGE	150000.000000	15000.00	95747618
202018	PIYALI DUTT	160000.000000	16000.00	97211059
202045	AJAY SHRIVASTAVA	145000.000000	14500.00	66806709
202013	SAMINA KHATUN	125000.000000	12500.00	6806709
202140	PRAKASH GULATI	135000.000000	13500.00	55715185
202120	SUMAN KOTHARI	130000.000000	13000.00	55437984
202110	PETER WILLIAMS	175000.000000	17500.00	98687010
202130	SAGARIKA GHOSH	155000.000000	15500.00	96528668
202133	VIVEK JACOB	140000.000000	14000.00	67977642
202122	RAKESH SHARMA	130000.000000	13000.00	97296186
202139	ANJALI SHARMA	150000.000000	15000.00	57123987
202111	KUNAL JAIN	165000.000000	16500.00	68908012

- 1.create a database empdb2021
- 2.create a table employee
- 3.insert values in the table
- 4.display table
- 5.display table employee sorted on code

enter the option:3

enter the option:b

CODE	NAME	BSAL	HRA	MOBILE
202013	SAMINA KHATUN	125000.000000	12500.00	6806709
202014	MANISH PANDEY	140000.000000	14000.00	95980168
202018	PIYALI DUTT	160000.000000	16000.00	97211059

202023	SHWETA MATHEW	120000.000000	12000.00	65932171
202027	ROBERT GEORGE	150000.000000	15000.00	95747618
202038	ANUJ CHADHA	180000.000000	18000.00	55288335
202045	AJAY SHRIVASTAVA	145000.000000	14500.00	66806709
202047	GURAV KUMAR	170000.000000	17000.00	55917452
202110	PETER WILLIAMS	175000.000000	17500.00	98687010
202111	KUNAL JAIN	165000.000000	16500.00	68908012
202120	SUMAN KOTHARI	130000.000000	13000.00	55437984
202122	RAKESH SHARMA	130000.000000	13000.00	97296186
202130	SAGARIKA GHOSH	155000.000000	15500.00	96528668
202133	VIVEK JACOB	140000.000000	14000.00	67977642
202139	ANJALI SHARMA	150000.000000	15000.00	57123987
202140	PRAKASH GULATI	135000.000000	13500.00	55715185

- ```
=====
```
- 1.create a database empdb2021
  - 2.create a table employee
  - 3.insert values in the table
  - 4.display table
  - 5.display table employee sorted on code

enter the option:0

'''

```
#P18-PRANAV V RAJ-12A-27
```

```
import mysql.connector as c

conn=c.connect(host='localhost',user='root',password='chhayavishva321')

crsr=conn.cursor()

def search():

 mb=int(input('enter the mobile no to be searched:'))

 found=False

 crsr.execute('use empdb2021')

 crsr.execute(f"select * from employee where mobile={mb}")

 field=crsr.fetchall()

 crsr.execute('select * from employee ')

 data=crsr.fetchall()

 for rec in data:

 if rec[4]==mb:

 crsr.execute(f"select * from employee where mobile={mb}")

 gap=' '*5

 found=True

heading=f"{'CODE':8s}{gap}{'NAME':20s}{gap}{'BSAL':17s}{gap}{'HRA':10s}{gap}{'MOBILE':14s}"

 print('='*100)

 print(heading)

 print('='*100)

 for rec in field:

r=f"{rec[0]:8d}{gap}{rec[1]:20s}{gap}{rec[2]:3f}{gap}{rec[3]:<2.2f}{rec[4]:15d}"

 print(r)

 print('='*100)
```

```

 else:

 pass

 if not found:

 print('mobile no do not exist')

def display():

 crsr.execute('use empdb2021')

 crsr.execute('select * from employee where bsal>135000 and bsal<160000')

 rows=crsr.fetchall()

 gap=' '*5

 heading=f"{'CODE':8s}{gap}{'NAME':20s}{gap}{'BSAL':17s}{gap}{'HRA':10s}{gap}{'MOBILE':14s}"

 print('='*100)

 print(heading)

 print('='*100)

 for rec in rows:

 r=f"{rec[0]:8d}{gap}{rec[1]:20s}{gap}{rec[2]:3f}{gap}{rec[3]:<2.2f}{rec[4]:15d}"

 print(r)

 print('='*100)

def update():

 crsr.execute('use empdb2021')

 crsr.execute('update employee set hra=(15/100)*bsal')

 crsr.execute('select * from employee')

 flce=crsr.fetchall()

 gap=' '*5

 heading=f"{'CODE':8s}{gap}{'NAME':20s}{gap}{'BSAL':17s}{gap}{'HRA':10s}{gap}{'MOBILE':14s}"

 print('='*100)

```

```

 print(heading)

 print('='*100)

 for rec in flee:

r=f"{rec[0]:8d}{gap}{rec[1]:20s}{gap}{rec[2]:3f}{gap}{rec[3]:<2.2f}{rec[4]:15
if

 print(r)

 print('='*100)

def code():
 crsr.execute('use empdb2021')

 cd=int(input('Enter code of the record to be deleted: '))

 sql=f"select * from employee where code={cd}"

 crsr.execute(sql)

 data=crsr.fetchall()

 if data==[]:

 print("Record not found")

 else:

 print(data[0])

 confirm=input("Sure to delete (y/n)?")

 if confirm in 'yY':

 d=f"delete from employee where code={cd}"

 crsr.execute(d)

 print("Deleted")

 conn.commit()

menu=''

1.search for emplyee by mobile

2.display details where bsal>135000 and bsal<160000

3.increase hra of every employee by 15%

4.delete employee record from table from code

```

```

0.exit the program
'''
while True:
 print(menu)
 op=int(input('enter the option:'))
 if op==1:
 search()
 elif op==2:
 display()
 elif op==3:
 update()
 elif op==4:
 delete()
 elif op==0:
 break
 else:
 print('invalid option')
'''

```

#### SAMPLE OUTPUT

```

1.search for emplyee by mobile
2.display details where bsal>135000 and bsal<160000
3.increase hra of every employee by 15%
4.delete employee record from table from code
0.exit the program

```

```

enter the option:1

```

```

enter the mobile no to be searched:97211059

```

```

=====

```

| CODE   | NAME        | BSAL          | HRA      | MOBILE   |
|--------|-------------|---------------|----------|----------|
| 202018 | PIYALI DUTT | 160000.000000 | 16000.00 | 97211059 |

- 1.search for emplyee by mobile
- 2.display details where bsal>135000 and bsal<160000
- 3.increase hra of every employee by 15%
- 4.delete employee record from table from code
- 0.exit the program

enter the option:2

| CODE   | NAME             | BSAL          | HRA      | MOBILE   |
|--------|------------------|---------------|----------|----------|
| 202014 | MANISH PANDEY    | 140000.000000 | 14000.00 | 95980168 |
| 202027 | ROBERT GEORGE    | 150000.000000 | 15000.00 | 95747618 |
| 202045 | AJAY SHRIVASTAVA | 145000.000000 | 14500.00 | 66806709 |
| 202130 | SAGARIKA GHOSH   | 155000.000000 | 15500.00 | 96528668 |
| 202133 | VIVEK JACOB      | 140000.000000 | 14000.00 | 67977642 |
| 202139 | ANJALI SHARMA    | 150000.000000 | 15000.00 | 57123987 |

- 1.search for employee by mobile
- 2.display details where bsal>135000 and bsal<160000
- 3.increase hra of every employee by 15%
- 4.delete employee record from table from code
- 0.exit the program

enter the option:3

| CODE   | NAME             | BSAL          | HRA      | MOBILE   |
|--------|------------------|---------------|----------|----------|
| 202023 | SHWETA MATHEW    | 120000.000000 | 18000.00 | 65932171 |
| 202014 | MANISH PANDEY    | 140000.000000 | 21000.00 | 95980168 |
| 202047 | GURAV KUMAR      | 170000.000000 | 25500.00 | 55917452 |
| 202038 | ANUJ CHADHA      | 180000.000000 | 27000.00 | 55288335 |
| 202027 | ROBERT GEORGE    | 150000.000000 | 22500.00 | 95747618 |
| 202018 | PIYALI DUTT      | 160000.000000 | 24000.00 | 97211059 |
| 202045 | AJAY SHRIVASTAVA | 145000.000000 | 21750.00 | 66806709 |
| 202013 | SAMINA KHATUN    | 125000.000000 | 18750.00 | 6806709  |
| 202140 | PRAKASH GULATI   | 135000.000000 | 20250.00 | 55715185 |
| 202120 | SUMAN KOTHARI    | 130000.000000 | 19500.00 | 55437984 |
| 202110 | PETER WILLIAMS   | 175000.000000 | 26250.00 | 98687010 |
| 202130 | SAGARIKA GHOSH   | 155000.000000 | 23250.00 | 96528668 |
| 202133 | VIVEK JACOB      | 140000.000000 | 21000.00 | 67977642 |
| 202122 | RAKESH SHARMA    | 130000.000000 | 19500.00 | 97296186 |
| 202139 | ANJALI SHARMA    | 150000.000000 | 22500.00 | 57123987 |
| 202111 | KUNAL JAIN       | 165000.000000 | 24750.00 | 68908012 |

1.Search using mobile number

2.Display where 135000<BSAL<160000

3.Increase HRA by 15%

4.Delete an employee using code

0.Exit

Enter your option from menu: 4

Enter code of the record to be deleted: 202133

(202133, 'VIVEK JACOB', 140000.0, 16100.0, 67977642)

Sure to delete (y/n)?y

Deleted

1.Search using mobile number

2.Display where 135000<BSAL<160000

3.Increase HRA by 15%

4.Delete an employee using code

0.Exit

Enter your option from menu: 0'''

'''



## SQL QUESTIONS

1)

```
mysql> insert into employee
```

```
values(1016,'SURESH','M','FINANCE','FAHAHEEL','2011-05-25',86000,64547281);
```

```
Query OK, 1 row affected (0.01 sec)
```

```
mysql> insert into employee values(1024,'SUNITA','F','ADMIN','SHIRQ','2013-07-13',54000,94010245);
```

```
Query OK, 1 row affected (0.01 sec)
```

```
mysql> insert into employee
```

```
values(1036,'PRATAP','M','PERSONNEL','SALMIYA','2013-09-13',77000,54628090);
```

```
Query OK, 1 row affected (0.01 sec)
```

```
mysql> insert into employee values(1047,'SUNITA','F','SALES','HAWALLY','2016-03-19',65000,65789340);
```

```
Query OK, 1 row affected (0.01 sec)
```

2)

```
select * from employee;
```

| ENO  | NAME   | SEX | DEPT      | BRANCH   | DOJ        | BSAL  | MOB      |
|------|--------|-----|-----------|----------|------------|-------|----------|
| 1034 | ADITI  | F   | PERSONNEL | FAHAHEEL | 2010-02-26 | 79000 | 62561240 |
| 1019 | ARUN   | M   | FINANCE   | SALMIYA  | 2012-04-23 | 81000 | 98123478 |
| 1023 | BADSHA | M   | SALES     | SHIRQ    | 2014-06-17 | 63000 | 53902146 |
| 1055 | CHETAN | M   | PERSONNEL | HAWALLY  | 2016-08-06 | 77000 | 66004572 |
| 1041 | DEEPA  | F   | ADMIN     | SHIRQ    | 2011-11-02 | 51000 | 55987423 |
| 1063 | ERIKA  | F   | SALES     | SALMIYA  | 2013-09-13 | 63000 | 96873484 |
| 1078 | GAURAV | M   | FINANCE   | SALMIYA  | 2015-07-20 | 84000 | 54116295 |
| 1070 | JEEVAN | M   | SALES     | HAWALLY  | 2017-05-22 | 61000 | 69335876 |
| 1013 | KUNAL  | M   | PERSONNEL | SALMIYA  | 2010-03-26 | 72000 | 97702040 |
| 1029 | RUPA   | F   | ADMIN     | SHIRQ    | 2011-11-02 | 55000 | 69569316 |
| 1046 | MANOJ  | M   | SALES     | HAWALLY  | 2014-06-17 | 67000 | 51312171 |
| 1066 | NAMITA | F   | FINANCE   | SHIRQ    | 2012-04-23 | 85000 | 92837456 |
| 1037 | PRATAP | M   | SALES     | FAHAHEEL | 2014-11-23 | 66000 | 68458705 |
| 1048 | GUARI  | F   | PERSONNEL | SALMIYA  | 2016-08-24 | 74000 | 55873429 |
| 1057 | HITESH | M   | SALES     | HAWALLY  | 2012-09-14 | 68000 | 98123461 |

|      |        |   |           |          |            |       |          |
|------|--------|---|-----------|----------|------------|-------|----------|
| 1015 | ARUN   | M | PERSONNEL | FAHAHEEL | 2013-09-13 | 77000 | 56123490 |
| 1022 | ERIKA  | F | FINANCE   | SALMIYA  | 2016-05-24 | 84000 | 95652310 |
| 1031 | DILIP  | M | SALES     | SHIRQ    | 2015-10-12 | 68000 | 69674234 |
| 1059 | NUPUR  | F | ADMIN     | SALMIYA  | 2014-01-30 | 55000 | 94233277 |
| 1065 | MANOJ  | M | PERSONNEL | SALMIYA  | 2013-11-15 | 76000 | 67349830 |
| 1075 | RAKESH | M | FINANCE   | SHIRQ    | 2015-03-28 | 86000 | 55983420 |
| 1016 | SURESH | M | FINANCE   | FAHAHEEL | 2011-05-25 | 86000 | 64547281 |
| 1024 | SUNITA | F | ADMIN     | SHIRQ    | 2013-07-13 | 54000 | 94010245 |
| 1036 | PRATAP | M | PERSONNEL | SALMIYA  | 2013-09-13 | 77000 | 54628090 |
| 1047 | SUNITA | F | SALES     | HAWALLY  | 2016-03-19 | 65000 | 65789340 |

3)

```
select ENO, NAME, DEPT, BRANCH, BSAL from employee;
```

| ENO  | NAME   | DEPT      | BRANCH   | BSAL  |
|------|--------|-----------|----------|-------|
| 1034 | ADITI  | PERSONNEL | FAHAHEEL | 79000 |
| 1019 | ARUN   | FINANCE   | SALMIYA  | 81000 |
| 1023 | BADSHA | SALES     | SHIRQ    | 63000 |
| 1055 | CHETAN | PERSONNEL | HAWALLY  | 77000 |
| 1041 | DEEPA  | ADMIN     | SHIRQ    | 51000 |
| 1063 | ERIKA  | SALES     | SALMIYA  | 63000 |
| 1078 | GAURAV | FINANCE   | SALMIYA  | 84000 |
| 1070 | JEEVAN | SALES     | HAWALLY  | 61000 |
| 1013 | KUNAL  | PERSONNEL | SALMIYA  | 72000 |
| 1029 | RUPA   | ADMIN     | SHIRQ    | 55000 |
| 1046 | MANOJ  | SALES     | HAWALLY  | 67000 |
| 1066 | NAMITA | FINANCE   | SHIRQ    | 85000 |
| 1037 | PRATAP | SALES     | FAHAHEEL | 66000 |
| 1048 | GUARI  | PERSONNEL | SALMIYA  | 74000 |
| 1057 | HITESH | SALES     | HAWALLY  | 68000 |
| 1015 | ARUN   | PERSONNEL | FAHAHEEL | 77000 |
| 1022 | ERIKA  | FINANCE   | SALMIYA  | 84000 |
| 1031 | DILIP  | SALES     | SHIRQ    | 68000 |
| 1059 | NUPUR  | ADMIN     | SALMIYA  | 55000 |
| 1065 | MANOJ  | PERSONNEL | SALMIYA  | 76000 |
| 1075 | RAKESH | FINANCE   | SHIRQ    | 86000 |
| 1016 | SURESH | FINANCE   | FAHAHEEL | 86000 |
| 1024 | SUNITA | ADMIN     | SHIRQ    | 54000 |
| 1036 | PRATAP | PERSONNEL | SALMIYA  | 77000 |
| 1047 | SUNITA | SALES     | HAWALLY  | 65000 |

25 rows in set (0.00 sec)

4)

```
select NAME, DEPT, DOJ, BSAL*0.8 as BONUS from employee;
```

| NAME   | DEPT      | DOJ        | BONUS   |
|--------|-----------|------------|---------|
| ADITI  | PERSONNEL | 2010-02-26 | 63200.0 |
| ARUN   | FINANCE   | 2012-04-23 | 64800.0 |
| BADSHA | SALES     | 2014-06-17 | 50400.0 |

|  |        |  |           |  |            |  |         |  |
|--|--------|--|-----------|--|------------|--|---------|--|
|  | CHETAN |  | PERSONNEL |  | 2016-08-06 |  | 61600.0 |  |
|  | DEEPA  |  | ADMIN     |  | 2011-11-02 |  | 40800.0 |  |
|  | ERIKA  |  | SALES     |  | 2013-09-13 |  | 50400.0 |  |
|  | GAURAV |  | FINANCE   |  | 2015-07-20 |  | 67200.0 |  |
|  | JEEVAN |  | SALES     |  | 2017-05-22 |  | 48800.0 |  |
|  | KUNAL  |  | PERSONNEL |  | 2010-03-26 |  | 57600.0 |  |
|  | RUPA   |  | ADMIN     |  | 2011-11-02 |  | 44000.0 |  |
|  | MANOJ  |  | SALES     |  | 2014-06-17 |  | 53600.0 |  |
|  | NAMITA |  | FINANCE   |  | 2012-04-23 |  | 68000.0 |  |
|  | PRATAP |  | SALES     |  | 2014-11-23 |  | 52800.0 |  |
|  | GUARI  |  | PERSONNEL |  | 2016-08-24 |  | 59200.0 |  |
|  | HITESH |  | SALES     |  | 2012-09-14 |  | 54400.0 |  |
|  | ARUN   |  | PERSONNEL |  | 2013-09-13 |  | 61600.0 |  |
|  | ERIKA  |  | FINANCE   |  | 2016-05-24 |  | 67200.0 |  |
|  | DILIP  |  | SALES     |  | 2015-10-12 |  | 54400.0 |  |
|  | NUPUR  |  | ADMIN     |  | 2014-01-30 |  | 44000.0 |  |
|  | MANOJ  |  | PERSONNEL |  | 2013-11-15 |  | 60800.0 |  |
|  | RAKESH |  | FINANCE   |  | 2015-03-28 |  | 68800.0 |  |
|  | SURESH |  | FINANCE   |  | 2011-05-25 |  | 68800.0 |  |
|  | SUNITA |  | ADMIN     |  | 2013-07-13 |  | 43200.0 |  |
|  | PRATAP |  | PERSONNEL |  | 2013-09-13 |  | 61600.0 |  |
|  | SUNITA |  | SALES     |  | 2016-03-19 |  | 52000.0 |  |

+-----+-----+-----+-----+

25 rows in set (0.00 sec)

5)

select \* from employee where SEX='F';

|  |      |  |        |  |     |  |           |  |          |  |            |  |       |  |          |  |
|--|------|--|--------|--|-----|--|-----------|--|----------|--|------------|--|-------|--|----------|--|
|  | ENO  |  | NAME   |  | SEX |  | DEPT      |  | BRANCH   |  | DOJ        |  | BSAL  |  | MOB      |  |
|  | 1034 |  | ADITI  |  | F   |  | PERSONNEL |  | FAHAHEEL |  | 2010-02-26 |  | 79000 |  | 62561240 |  |
|  | 1041 |  | DEEPA  |  | F   |  | ADMIN     |  | SHIRQ    |  | 2011-11-02 |  | 51000 |  | 55987423 |  |
|  | 1063 |  | ERIKA  |  | F   |  | SALES     |  | SALMIYA  |  | 2013-09-13 |  | 63000 |  | 96873484 |  |
|  | 1029 |  | RUPA   |  | F   |  | ADMIN     |  | SHIRQ    |  | 2011-11-02 |  | 55000 |  | 69569316 |  |
|  | 1066 |  | NAMITA |  | F   |  | FINANCE   |  | SHIRQ    |  | 2012-04-23 |  | 85000 |  | 92837456 |  |
|  | 1048 |  | GUARI  |  | F   |  | PERSONNEL |  | SALMIYA  |  | 2016-08-24 |  | 74000 |  | 55873429 |  |
|  | 1022 |  | ERIKA  |  | F   |  | FINANCE   |  | SALMIYA  |  | 2016-05-24 |  | 84000 |  | 95652310 |  |
|  | 1059 |  | NUPUR  |  | F   |  | ADMIN     |  | SALMIYA  |  | 2014-01-30 |  | 55000 |  | 94233277 |  |
|  | 1024 |  | SUNITA |  | F   |  | ADMIN     |  | SHIRQ    |  | 2013-07-13 |  | 54000 |  | 94010245 |  |
|  | 1047 |  | SUNITA |  | F   |  | SALES     |  | HAWALLY  |  | 2016-03-19 |  | 65000 |  | 65789340 |  |

+-----+-----+-----+-----+

10 rows in set (0.00 sec)

6)

select \* from employee where DEPT="FINANCE";

|  |      |  |        |  |     |  |         |  |          |  |            |  |       |  |          |  |
|--|------|--|--------|--|-----|--|---------|--|----------|--|------------|--|-------|--|----------|--|
|  | ENO  |  | NAME   |  | SEX |  | DEPT    |  | BRANCH   |  | DOJ        |  | BSAL  |  | MOB      |  |
|  | 1019 |  | ARUN   |  | M   |  | FINANCE |  | SALMIYA  |  | 2012-04-23 |  | 81000 |  | 98123478 |  |
|  | 1078 |  | GAURAV |  | M   |  | FINANCE |  | SALMIYA  |  | 2015-07-20 |  | 84000 |  | 54116295 |  |
|  | 1066 |  | NAMITA |  | F   |  | FINANCE |  | SHIRQ    |  | 2012-04-23 |  | 85000 |  | 92837456 |  |
|  | 1022 |  | ERIKA  |  | F   |  | FINANCE |  | SALMIYA  |  | 2016-05-24 |  | 84000 |  | 95652310 |  |
|  | 1075 |  | RAKESH |  | M   |  | FINANCE |  | SHIRQ    |  | 2015-03-28 |  | 86000 |  | 55983420 |  |
|  | 1016 |  | SURESH |  | M   |  | FINANCE |  | FAHAHEEL |  | 2011-05-25 |  | 86000 |  | 64547281 |  |

+-----+-----+-----+-----+-----+-----+-----+-----+

6 rows in set (0.00 sec)

7)

select \* from employee where BSAL>75000;

+-----+-----+-----+-----+-----+-----+-----+-----+

| ENO  | NAME   | SEX | DEPT      | BRANCH   | DOJ        | BSAL  | MOB      |
|------|--------|-----|-----------|----------|------------|-------|----------|
| 1034 | ADITI  | F   | PERSONNEL | FAHAHEEL | 2010-02-26 | 79000 | 62561240 |
| 1019 | ARUN   | M   | FINANCE   | SALMIYA  | 2012-04-23 | 81000 | 98123478 |
| 1055 | CHETAN | M   | PERSONNEL | HAWALLY  | 2016-08-06 | 77000 | 66004572 |
| 1078 | GAURAV | M   | FINANCE   | SALMIYA  | 2015-07-20 | 84000 | 54116295 |
| 1066 | NAMITA | F   | FINANCE   | SHIRQ    | 2012-04-23 | 85000 | 92837456 |
| 1015 | ARUN   | M   | PERSONNEL | FAHAHEEL | 2013-09-13 | 77000 | 56123490 |
| 1022 | ERIKA  | F   | FINANCE   | SALMIYA  | 2016-05-24 | 84000 | 95652310 |
| 1065 | MANOJ  | M   | PERSONNEL | SALMIYA  | 2013-11-15 | 76000 | 67349830 |
| 1075 | RAKESH | M   | FINANCE   | SHIRQ    | 2015-03-28 | 86000 | 55983420 |
| 1016 | SURESH | M   | FINANCE   | FAHAHEEL | 2011-05-25 | 86000 | 64547281 |
| 1036 | PRATAP | M   | PERSONNEL | SALMIYA  | 2013-09-13 | 77000 | 54628090 |

+-----+-----+-----+-----+-----+-----+-----+-----+

11 rows in set (0.00 sec)

8)

select \* from employee where Branch='salmiya' or Branch='fahaheel';

+-----+-----+-----+-----+-----+-----+-----+-----+

| ENO  | NAME   | SEX | DEPT      | BRANCH   | DOJ        | BSAL  | MOB      |
|------|--------|-----|-----------|----------|------------|-------|----------|
| 1034 | ADITI  | F   | PERSONNEL | FAHAHEEL | 2010-02-26 | 79000 | 62561240 |
| 1019 | ARUN   | M   | FINANCE   | SALMIYA  | 2012-04-23 | 81000 | 98123478 |
| 1063 | ERIKA  | F   | SALES     | SALMIYA  | 2013-09-13 | 63000 | 96873484 |
| 1078 | GAURAV | M   | FINANCE   | SALMIYA  | 2015-07-20 | 84000 | 54116295 |
| 1013 | KUNAL  | M   | PERSONNEL | SALMIYA  | 2010-03-26 | 72000 | 97702040 |
| 1037 | PRATAP | M   | SALES     | FAHAHEEL | 2014-11-23 | 66000 | 68458705 |
| 1048 | GUARI  | F   | PERSONNEL | SALMIYA  | 2016-08-24 | 74000 | 55873429 |
| 1015 | ARUN   | M   | PERSONNEL | FAHAHEEL | 2013-09-13 | 77000 | 56123490 |
| 1022 | ERIKA  | F   | FINANCE   | SALMIYA  | 2016-05-24 | 84000 | 95652310 |
| 1059 | NUPUR  | F   | ADMIN     | SALMIYA  | 2014-01-30 | 55000 | 94233277 |
| 1065 | MANOJ  | M   | PERSONNEL | SALMIYA  | 2013-11-15 | 76000 | 67349830 |
| 1016 | SURESH | M   | FINANCE   | FAHAHEEL | 2011-05-25 | 86000 | 64547281 |
| 1036 | PRATAP | M   | PERSONNEL | SALMIYA  | 2013-09-13 | 77000 | 54628090 |

+-----+-----+-----+-----+-----+-----+-----+-----+

13 rows in set (0.00 sec)

9)

select \* from employee where Branch in ('Hawally','Shirq');

+-----+-----+-----+-----+-----+-----+-----+-----+

| ENO  | NAME   | SEX | DEPT      | BRANCH  | DOJ        | BSAL  | MOB      |
|------|--------|-----|-----------|---------|------------|-------|----------|
| 1023 | BADSHA | M   | SALES     | SHIRQ   | 2014-06-17 | 63000 | 53902146 |
| 1055 | CHETAN | M   | PERSONNEL | HAWALLY | 2016-08-06 | 77000 | 66004572 |
| 1041 | DEEPA  | F   | ADMIN     | SHIRQ   | 2011-11-02 | 51000 | 55987423 |
| 1070 | JEEVAN | M   | SALES     | HAWALLY | 2017-05-22 | 61000 | 69335876 |
| 1029 | RUPA   | F   | ADMIN     | SHIRQ   | 2011-11-02 | 55000 | 69569316 |
| 1046 | MANOJ  | M   | SALES     | HAWALLY | 2014-06-17 | 67000 | 51312171 |

|      |        |   |         |         |            |       |          |
|------|--------|---|---------|---------|------------|-------|----------|
| 1066 | NAMITA | F | FINANCE | SHIRQ   | 2012-04-23 | 85000 | 92837456 |
| 1057 | HITESH | M | SALES   | HAWALLY | 2012-09-14 | 68000 | 98123461 |
| 1031 | DILIP  | M | SALES   | SHIRQ   | 2015-10-12 | 68000 | 69674234 |
| 1075 | RAKESH | M | FINANCE | SHIRQ   | 2015-03-28 | 86000 | 55983420 |
| 1024 | SUNITA | F | ADMIN   | SHIRQ   | 2013-07-13 | 54000 | 94010245 |
| 1047 | SUNITA | F | SALES   | HAWALLY | 2016-03-19 | 65000 | 65789340 |

+-----+-----+-----+-----+-----+-----+-----+-----+

12 rows in set (0.00 sec)

10)

select \* from employee where Bsal>=55000 and bsal<=70000;

+-----+-----+-----+-----+-----+-----+-----+-----+

| ENO  | NAME   | SEX | DEPT  | BRANCH   | DOJ        | BSAL  | MOB      |
|------|--------|-----|-------|----------|------------|-------|----------|
| 1023 | BADSHA | M   | SALES | SHIRQ    | 2014-06-17 | 63000 | 53902146 |
| 1063 | ERIKA  | F   | SALES | SALMIYA  | 2013-09-13 | 63000 | 96873484 |
| 1070 | JEEVAN | M   | SALES | HAWALLY  | 2017-05-22 | 61000 | 69335876 |
| 1029 | RUPA   | F   | ADMIN | SHIRQ    | 2011-11-02 | 55000 | 69569316 |
| 1046 | MANOJ  | M   | SALES | HAWALLY  | 2014-06-17 | 67000 | 51312171 |
| 1037 | PRATAP | M   | SALES | FAHAHEEL | 2014-11-23 | 66000 | 68458705 |
| 1057 | HITESH | M   | SALES | HAWALLY  | 2012-09-14 | 68000 | 98123461 |
| 1031 | DILIP  | M   | SALES | SHIRQ    | 2015-10-12 | 68000 | 69674234 |
| 1059 | NUPUR  | F   | ADMIN | SALMIYA  | 2014-01-30 | 55000 | 94233277 |
| 1047 | SUNITA | F   | SALES | HAWALLY  | 2016-03-19 | 65000 | 65789340 |

+-----+-----+-----+-----+-----+-----+-----+-----+

10 rows in set (0.00 sec)

12)

select \* from employee where doj between '2014-12-31' and '2016-01-01';

+-----+-----+-----+-----+-----+-----+-----+-----+

| ENO  | NAME   | SEX | DEPT    | BRANCH  | DOJ        | BSAL  | MOB      |
|------|--------|-----|---------|---------|------------|-------|----------|
| 1078 | GAURAV | M   | FINANCE | SALMIYA | 2015-07-20 | 84000 | 54116295 |
| 1031 | DILIP  | M   | SALES   | SHIRQ   | 2015-10-12 | 68000 | 69674234 |
| 1075 | RAKESH | M   | FINANCE | SHIRQ   | 2015-03-28 | 86000 | 55983420 |

+-----+-----+-----+-----+-----+-----+-----+-----+

3 rows in set (0.00 sec)

13)

select \* from employee order by bsal desc;

+-----+-----+-----+-----+-----+-----+-----+-----+

| ENO  | NAME   | SEX | DEPT      | BRANCH   | DOJ        | BSAL  | MOB      |
|------|--------|-----|-----------|----------|------------|-------|----------|
| 1075 | RAKESH | M   | FINANCE   | SHIRQ    | 2015-03-28 | 86000 | 55983420 |
| 1016 | SURESH | M   | FINANCE   | FAHAHEEL | 2011-05-25 | 86000 | 64547281 |
| 1066 | NAMITA | F   | FINANCE   | SHIRQ    | 2012-04-23 | 85000 | 92837456 |
| 1078 | GAURAV | M   | FINANCE   | SALMIYA  | 2015-07-20 | 84000 | 54116295 |
| 1022 | ERIKA  | F   | FINANCE   | SALMIYA  | 2016-05-24 | 84000 | 95652310 |
| 1019 | ARUN   | M   | FINANCE   | SALMIYA  | 2012-04-23 | 81000 | 98123478 |
| 1034 | ADITI  | F   | PERSONNEL | FAHAHEEL | 2010-02-26 | 79000 | 62561240 |
| 1055 | CHETAN | M   | PERSONNEL | HAWALLY  | 2016-08-06 | 77000 | 66004572 |
| 1015 | ARUN   | M   | PERSONNEL | FAHAHEEL | 2013-09-13 | 77000 | 56123490 |
| 1036 | PRATAP | M   | PERSONNEL | SALMIYA  | 2013-09-13 | 77000 | 54628090 |
| 1065 | MANOJ  | M   | PERSONNEL | SALMIYA  | 2013-11-15 | 76000 | 67349830 |

|  |      |  |        |  |   |  |           |  |          |  |            |  |       |  |          |  |
|--|------|--|--------|--|---|--|-----------|--|----------|--|------------|--|-------|--|----------|--|
|  | 1048 |  | GUARI  |  | F |  | PERSONNEL |  | SALMIYA  |  | 2016-08-24 |  | 74000 |  | 55873429 |  |
|  | 1013 |  | KUNAL  |  | M |  | PERSONNEL |  | SALMIYA  |  | 2010-03-26 |  | 72000 |  | 97702040 |  |
|  | 1057 |  | HITESH |  | M |  | SALES     |  | HAWALLY  |  | 2012-09-14 |  | 68000 |  | 98123461 |  |
|  | 1031 |  | DILIP  |  | M |  | SALES     |  | SHIRQ    |  | 2015-10-12 |  | 68000 |  | 69674234 |  |
|  | 1046 |  | MANOJ  |  | M |  | SALES     |  | HAWALLY  |  | 2014-06-17 |  | 67000 |  | 51312171 |  |
|  | 1037 |  | PRATAP |  | M |  | SALES     |  | FAHAHEEL |  | 2014-11-23 |  | 66000 |  | 68458705 |  |
|  | 1047 |  | SUNITA |  | F |  | SALES     |  | HAWALLY  |  | 2016-03-19 |  | 65000 |  | 65789340 |  |
|  | 1023 |  | BADSHA |  | M |  | SALES     |  | SHIRQ    |  | 2014-06-17 |  | 63000 |  | 53902146 |  |
|  | 1063 |  | ERIKA  |  | F |  | SALES     |  | SALMIYA  |  | 2013-09-13 |  | 63000 |  | 96873484 |  |
|  | 1070 |  | JEEVAN |  | M |  | SALES     |  | HAWALLY  |  | 2017-05-22 |  | 61000 |  | 69335876 |  |
|  | 1029 |  | RUPA   |  | F |  | ADMIN     |  | SHIRQ    |  | 2011-11-02 |  | 55000 |  | 69569316 |  |
|  | 1059 |  | NUPUR  |  | F |  | ADMIN     |  | SALMIYA  |  | 2014-01-30 |  | 55000 |  | 94233277 |  |
|  | 1024 |  | SUNITA |  | F |  | ADMIN     |  | SHIRQ    |  | 2013-07-13 |  | 54000 |  | 94010245 |  |
|  | 1041 |  | DEEPA  |  | F |  | ADMIN     |  | SHIRQ    |  | 2011-11-02 |  | 51000 |  | 55987423 |  |

25 rows in set (0.00 sec)

14)

```
select * from employee where dept='personnel' order by name;
```

|  |      |  |        |  |     |  |           |  |          |  |            |  |       |  |          |  |
|--|------|--|--------|--|-----|--|-----------|--|----------|--|------------|--|-------|--|----------|--|
|  | ENO  |  | NAME   |  | SEX |  | DEPT      |  | BRANCH   |  | DOJ        |  | BSAL  |  | MOB      |  |
|  | 1034 |  | ADITI  |  | F   |  | PERSONNEL |  | FAHAHEEL |  | 2010-02-26 |  | 79000 |  | 62561240 |  |
|  | 1015 |  | ARUN   |  | M   |  | PERSONNEL |  | FAHAHEEL |  | 2013-09-13 |  | 77000 |  | 56123490 |  |
|  | 1055 |  | CHETAN |  | M   |  | PERSONNEL |  | HAWALLY  |  | 2016-08-06 |  | 77000 |  | 66004572 |  |
|  | 1048 |  | GUARI  |  | F   |  | PERSONNEL |  | SALMIYA  |  | 2016-08-24 |  | 74000 |  | 55873429 |  |
|  | 1013 |  | KUNAL  |  | M   |  | PERSONNEL |  | SALMIYA  |  | 2010-03-26 |  | 72000 |  | 97702040 |  |
|  | 1065 |  | MANOJ  |  | M   |  | PERSONNEL |  | SALMIYA  |  | 2013-11-15 |  | 76000 |  | 67349830 |  |
|  | 1036 |  | PRATAP |  | M   |  | PERSONNEL |  | SALMIYA  |  | 2013-09-13 |  | 77000 |  | 54628090 |  |

7 rows in set (0.01 sec)

15)

```
select * from employee order by dept, eno;
```

|  |      |  |        |  |     |  |           |  |          |  |            |  |       |  |          |  |
|--|------|--|--------|--|-----|--|-----------|--|----------|--|------------|--|-------|--|----------|--|
|  | ENO  |  | NAME   |  | SEX |  | DEPT      |  | BRANCH   |  | DOJ        |  | BSAL  |  | MOB      |  |
|  | 1024 |  | SUNITA |  | F   |  | ADMIN     |  | SHIRQ    |  | 2013-07-13 |  | 54000 |  | 94010245 |  |
|  | 1029 |  | RUPA   |  | F   |  | ADMIN     |  | SHIRQ    |  | 2011-11-02 |  | 55000 |  | 69569316 |  |
|  | 1041 |  | DEEPA  |  | F   |  | ADMIN     |  | SHIRQ    |  | 2011-11-02 |  | 51000 |  | 55987423 |  |
|  | 1059 |  | NUPUR  |  | F   |  | ADMIN     |  | SALMIYA  |  | 2014-01-30 |  | 55000 |  | 94233277 |  |
|  | 1016 |  | SURESH |  | M   |  | FINANCE   |  | FAHAHEEL |  | 2011-05-25 |  | 86000 |  | 64547281 |  |
|  | 1019 |  | ARUN   |  | M   |  | FINANCE   |  | SALMIYA  |  | 2012-04-23 |  | 81000 |  | 98123478 |  |
|  | 1022 |  | ERIKA  |  | F   |  | FINANCE   |  | SALMIYA  |  | 2016-05-24 |  | 84000 |  | 95652310 |  |
|  | 1066 |  | NAMITA |  | F   |  | FINANCE   |  | SHIRQ    |  | 2012-04-23 |  | 85000 |  | 92837456 |  |
|  | 1075 |  | RAKESH |  | M   |  | FINANCE   |  | SHIRQ    |  | 2015-03-28 |  | 86000 |  | 55983420 |  |
|  | 1078 |  | GAURAV |  | M   |  | FINANCE   |  | SALMIYA  |  | 2015-07-20 |  | 84000 |  | 54116295 |  |
|  | 1013 |  | KUNAL  |  | M   |  | PERSONNEL |  | SALMIYA  |  | 2010-03-26 |  | 72000 |  | 97702040 |  |
|  | 1015 |  | ARUN   |  | M   |  | PERSONNEL |  | FAHAHEEL |  | 2013-09-13 |  | 77000 |  | 56123490 |  |
|  | 1034 |  | ADITI  |  | F   |  | PERSONNEL |  | FAHAHEEL |  | 2010-02-26 |  | 79000 |  | 62561240 |  |
|  | 1036 |  | PRATAP |  | M   |  | PERSONNEL |  | SALMIYA  |  | 2013-09-13 |  | 77000 |  | 54628090 |  |
|  | 1048 |  | GUARI  |  | F   |  | PERSONNEL |  | SALMIYA  |  | 2016-08-24 |  | 74000 |  | 55873429 |  |
|  | 1055 |  | CHETAN |  | M   |  | PERSONNEL |  | HAWALLY  |  | 2016-08-06 |  | 77000 |  | 66004572 |  |
|  | 1065 |  | MANOJ  |  | M   |  | PERSONNEL |  | SALMIYA  |  | 2013-11-15 |  | 76000 |  | 67349830 |  |

|      |        |   |       |          |            |       |          |
|------|--------|---|-------|----------|------------|-------|----------|
| 1023 | BADSHA | M | SALES | SHIRQ    | 2014-06-17 | 63000 | 53902146 |
| 1031 | DILIP  | M | SALES | SHIRQ    | 2015-10-12 | 68000 | 69674234 |
| 1037 | PRATAP | M | SALES | FAHAHEEL | 2014-11-23 | 66000 | 68458705 |
| 1046 | MANOJ  | M | SALES | HAWALLY  | 2014-06-17 | 67000 | 51312171 |
| 1047 | SUNITA | F | SALES | HAWALLY  | 2016-03-19 | 65000 | 65789340 |
| 1057 | HITESH | M | SALES | HAWALLY  | 2012-09-14 | 68000 | 98123461 |
| 1063 | ERIKA  | F | SALES | SALMIYA  | 2013-09-13 | 63000 | 96873484 |
| 1070 | JEEVAN | M | SALES | HAWALLY  | 2017-05-22 | 61000 | 69335876 |

25 rows in set (0.00 sec)

16)

```
select sex,count(*) from employee group by sex;
```

| sex | count(*) |
|-----|----------|
| F   | 10       |
| M   | 15       |

2 rows in set (0.01 sec)

17)

```
select branch,count(*) from employee group by branch;
```

| branch   | count(*) |
|----------|----------|
| FAHAHEEL | 4        |
| SALMIYA  | 9        |
| SHIRQ    | 7        |
| HAWALLY  | 5        |

4 rows in set (0.00 sec)

18)

```
select dept,count(*) from employee group by dept;
```

| dept      | count(*) |
|-----------|----------|
| PERSONNEL | 7        |
| FINANCE   | 6        |
| SALES     | 8        |
| ADMIN     | 4        |

4 rows in set (0.00 sec)

19)

```
update employee set bsal=bsal+5000 where dept='sales';
```

Query OK, 8 rows affected (0.01 sec)

Rows matched: 8 Changed: 8 Warnings: 0

```
select * from employee;
```

| ENO  | NAME   | SEX | DEPT      | BRANCH   | DOJ        | BSAL  | MOB      |
|------|--------|-----|-----------|----------|------------|-------|----------|
| 1034 | ADITI  | F   | PERSONNEL | FAHAHEEL | 2010-02-26 | 79000 | 62561240 |
| 1019 | ARUN   | M   | FINANCE   | SALMIYA  | 2012-04-23 | 81000 | 98123478 |
| 1023 | BADSHA | M   | SALES     | SHIRQ    | 2014-06-17 | 68000 | 53902146 |
| 1055 | CHETAN | M   | PERSONNEL | HAWALLY  | 2016-08-06 | 77000 | 66004572 |
| 1041 | DEEPA  | F   | ADMIN     | SHIRQ    | 2011-11-02 | 51000 | 55987423 |
| 1063 | ERIKA  | F   | SALES     | SALMIYA  | 2013-09-13 | 68000 | 96873484 |
| 1078 | GAURAV | M   | FINANCE   | SALMIYA  | 2015-07-20 | 84000 | 54116295 |
| 1070 | JEEVAN | M   | SALES     | HAWALLY  | 2017-05-22 | 66000 | 69335876 |
| 1013 | KUNAL  | M   | PERSONNEL | SALMIYA  | 2010-03-26 | 72000 | 97702040 |
| 1029 | RUPA   | F   | ADMIN     | SHIRQ    | 2011-11-02 | 55000 | 69569316 |
| 1046 | MANOJ  | M   | SALES     | HAWALLY  | 2014-06-17 | 72000 | 51312171 |
| 1066 | NAMITA | F   | FINANCE   | SHIRQ    | 2012-04-23 | 85000 | 92837456 |
| 1037 | PRATAP | M   | SALES     | FAHAHEEL | 2014-11-23 | 71000 | 68458705 |
| 1048 | GUARI  | F   | PERSONNEL | SALMIYA  | 2016-08-24 | 74000 | 55873429 |
| 1057 | HITESH | M   | SALES     | HAWALLY  | 2012-09-14 | 73000 | 98123461 |
| 1015 | ARUN   | M   | PERSONNEL | FAHAHEEL | 2013-09-13 | 77000 | 56123490 |
| 1022 | ERIKA  | F   | FINANCE   | SALMIYA  | 2016-05-24 | 84000 | 95652310 |
| 1031 | DILIP  | M   | SALES     | SHIRQ    | 2015-10-12 | 73000 | 69674234 |
| 1059 | NUPUR  | F   | ADMIN     | SALMIYA  | 2014-01-30 | 55000 | 94233277 |
| 1065 | MANOJ  | M   | PERSONNEL | SALMIYA  | 2013-11-15 | 76000 | 67349830 |
| 1075 | RAKESH | M   | FINANCE   | SHIRQ    | 2015-03-28 | 86000 | 55983420 |
| 1016 | SURESH | M   | FINANCE   | FAHAHEEL | 2011-05-25 | 86000 | 64547281 |
| 1024 | SUNITA | F   | ADMIN     | SHIRQ    | 2013-07-13 | 54000 | 94010245 |
| 1036 | PRATAP | M   | PERSONNEL | SALMIYA  | 2013-09-13 | 77000 | 54628090 |
| 1047 | SUNITA | F   | SALES     | HAWALLY  | 2016-03-19 | 70000 | 65789340 |

25 rows in set (0.00 sec)

20)

```
select min(bsal), max(bsal) from employee;
```

| min(bsal) | max(bsal) |
|-----------|-----------|
| 51000     | 86000     |

1 row in set (0.01 sec)

21)

```
alter table employee add HRA float;
```

Query OK, 0 rows affected (0.03 sec)

Records: 0 Duplicates: 0 Warnings: 0

```
select * from employee;
```

| ENO  | NAME  | SEX | DEPT      | BRANCH   | DOJ        | BSAL  | MOB      | HRA  |
|------|-------|-----|-----------|----------|------------|-------|----------|------|
| 1034 | ADITI | F   | PERSONNEL | FAHAHEEL | 2010-02-26 | 79000 | 62561240 | NULL |



|      |        |   |           |          |            |       |          |      |
|------|--------|---|-----------|----------|------------|-------|----------|------|
| 1019 | ARUN   | M | FINANCE   | SALMIYA  | 2012-04-23 | 81000 | 98123478 | NULL |
| 1023 | BADSHA | M | SALES     | SHIRQ    | 2014-06-17 | 68000 | 53902146 | NULL |
| 1055 | CHETAN | M | PERSONNEL | HAWALLY  | 2016-08-06 | 77000 | 66004572 | NULL |
| 1041 | DEEPA  | F | ADMIN     | SHIRQ    | 2011-11-02 | 51000 | 55987423 | NULL |
| 1063 | ERIKA  | F | SALES     | SALMIYA  | 2013-09-13 | 68000 | 96873484 | NULL |
| 1078 | GAURAV | M | FINANCE   | SALMIYA  | 2015-07-20 | 84000 | 54116295 | NULL |
| 1070 | JEEVAN | M | SALES     | HAWALLY  | 2017-05-22 | 66000 | 69335876 | NULL |
| 1013 | KUNAL  | M | PERSONNEL | SALMIYA  | 2010-03-26 | 72000 | 97702040 | NULL |
| 1029 | RUPA   | F | ADMIN     | SHIRQ    | 2011-11-02 | 55000 | 69569316 | NULL |
| 1046 | MANOJ  | M | SALES     | HAWALLY  | 2014-06-17 | 72000 | 51312171 | NULL |
| 1066 | NAMITA | F | FINANCE   | SHIRQ    | 2012-04-23 | 85000 | 92837456 | NULL |
| 1037 | PRATAP | M | SALES     | FAHAHEEL | 2014-11-23 | 71000 | 68458705 | NULL |
| 1048 | GUARI  | F | PERSONNEL | SALMIYA  | 2016-08-24 | 74000 | 55873429 | NULL |
| 1057 | HITESH | M | SALES     | HAWALLY  | 2012-09-14 | 73000 | 98123461 | NULL |
| 1015 | ARUN   | M | PERSONNEL | FAHAHEEL | 2013-09-13 | 77000 | 56123490 | NULL |
| 1022 | ERIKA  | F | FINANCE   | SALMIYA  | 2016-05-24 | 84000 | 95652310 | NULL |
| 1031 | DILIP  | M | SALES     | SHIRQ    | 2015-10-12 | 73000 | 69674234 | NULL |
| 1059 | NUPUR  | F | ADMIN     | SALMIYA  | 2014-01-30 | 55000 | 94233277 | NULL |
| 1065 | MANOJ  | M | PERSONNEL | SALMIYA  | 2013-11-15 | 76000 | 67349830 | NULL |
| 1075 | RAKESH | M | FINANCE   | SHIRQ    | 2015-03-28 | 86000 | 55983420 | NULL |
| 1016 | SURESH | M | FINANCE   | FAHAHEEL | 2011-05-25 | 86000 | 64547281 | NULL |
| 1024 | SUNITA | F | ADMIN     | SHIRQ    | 2013-07-13 | 54000 | 94010245 | NULL |
| 1036 | PRATAP | M | PERSONNEL | SALMIYA  | 2013-09-13 | 77000 | 54628090 | NULL |
| 1047 | SUNITA | F | SALES     | HAWALLY  | 2016-03-19 | 70000 | 65789340 | NULL |

25 rows in set (0.00 sec)

22)

update employee set hra=bsal\*0.2;

Query OK, 25 rows affected (0.01 sec)

Rows matched: 25 Changed: 25 Warnings: 0

select \* from employee;

| ENO  | NAME   | SEX | DEPT      | BRANCH   | DOJ        | BSAL  | MOB      | HRA   |
|------|--------|-----|-----------|----------|------------|-------|----------|-------|
| 1034 | ADITI  | F   | PERSONNEL | FAHAHEEL | 2010-02-26 | 79000 | 62561240 | 15800 |
| 1019 | ARUN   | M   | FINANCE   | SALMIYA  | 2012-04-23 | 81000 | 98123478 | 16200 |
| 1023 | BADSHA | M   | SALES     | SHIRQ    | 2014-06-17 | 68000 | 53902146 | 13600 |
| 1055 | CHETAN | M   | PERSONNEL | HAWALLY  | 2016-08-06 | 77000 | 66004572 | 15400 |
| 1041 | DEEPA  | F   | ADMIN     | SHIRQ    | 2011-11-02 | 51000 | 55987423 | 10200 |
| 1063 | ERIKA  | F   | SALES     | SALMIYA  | 2013-09-13 | 68000 | 96873484 | 13600 |
| 1078 | GAURAV | M   | FINANCE   | SALMIYA  | 2015-07-20 | 84000 | 54116295 | 16800 |
| 1070 | JEEVAN | M   | SALES     | HAWALLY  | 2017-05-22 | 66000 | 69335876 | 13200 |
| 1013 | KUNAL  | M   | PERSONNEL | SALMIYA  | 2010-03-26 | 72000 | 97702040 | 14400 |
| 1029 | RUPA   | F   | ADMIN     | SHIRQ    | 2011-11-02 | 55000 | 69569316 | 11000 |
| 1046 | MANOJ  | M   | SALES     | HAWALLY  | 2014-06-17 | 72000 | 51312171 | 14400 |
| 1066 | NAMITA | F   | FINANCE   | SHIRQ    | 2012-04-23 | 85000 | 92837456 | 17000 |
| 1037 | PRATAP | M   | SALES     | FAHAHEEL | 2014-11-23 | 71000 | 68458705 | 14200 |
| 1048 | GUARI  | F   | PERSONNEL | SALMIYA  | 2016-08-24 | 74000 | 55873429 | 14800 |
| 1057 | HITESH | M   | SALES     | HAWALLY  | 2012-09-14 | 73000 | 98123461 | 14600 |
| 1015 | ARUN   | M   | PERSONNEL | FAHAHEEL | 2013-09-13 | 77000 | 56123490 | 15400 |

|                                                         |      |  |        |  |   |  |           |  |          |  |            |  |       |  |          |  |       |  |
|---------------------------------------------------------|------|--|--------|--|---|--|-----------|--|----------|--|------------|--|-------|--|----------|--|-------|--|
|                                                         | 1022 |  | ERIKA  |  | F |  | FINANCE   |  | SALMIYA  |  | 2016-05-24 |  | 84000 |  | 95652310 |  | 16800 |  |
|                                                         | 1031 |  | DILIP  |  | M |  | SALES     |  | SHIRQ    |  | 2015-10-12 |  | 73000 |  | 69674234 |  | 14600 |  |
|                                                         | 1059 |  | NUPUR  |  | F |  | ADMIN     |  | SALMIYA  |  | 2014-01-30 |  | 55000 |  | 94233277 |  | 11000 |  |
|                                                         | 1065 |  | MANOJ  |  | M |  | PERSONNEL |  | SALMIYA  |  | 2013-11-15 |  | 76000 |  | 67349830 |  | 15200 |  |
|                                                         | 1075 |  | RAKESH |  | M |  | FINANCE   |  | SHIRQ    |  | 2015-03-28 |  | 86000 |  | 55983420 |  | 17200 |  |
|                                                         | 1016 |  | SURESH |  | M |  | FINANCE   |  | FAHAHEEL |  | 2011-05-25 |  | 86000 |  | 64547281 |  | 17200 |  |
|                                                         | 1024 |  | SUNITA |  | F |  | ADMIN     |  | SHIRQ    |  | 2013-07-13 |  | 54000 |  | 94010245 |  | 10800 |  |
|                                                         | 1036 |  | PRATAP |  | M |  | PERSONNEL |  | SALMIYA  |  | 2013-09-13 |  | 77000 |  | 54628090 |  | 15400 |  |
|                                                         | 1047 |  | SUNITA |  | F |  | SALES     |  | HAWALLY  |  | 2016-03-19 |  | 70000 |  | 65789340 |  | 14000 |  |
| +-----+-----+-----+-----+-----+-----+-----+-----+-----+ |      |  |        |  |   |  |           |  |          |  |            |  |       |  |          |  |       |  |
| +                                                       |      |  |        |  |   |  |           |  |          |  |            |  |       |  |          |  |       |  |
| 25 rows in set (0.00 sec)                               |      |  |        |  |   |  |           |  |          |  |            |  |       |  |          |  |       |  |