```
pip install mysql-connector-python #install the connector package
In [47]:
         Requirement already satisfied: mysql-connector-python in c:\users\aniwa\anaconda3
         \lib\site-packages (8.1.0)
         Requirement already satisfied: protobuf<=4.21.12,>=4.21.1 in c:\users\aniwa\anacon
         da3\lib\site-packages (from mysql-connector-python) (4.21.12)
         Note: you may need to restart the kernel to use updated packages.
         import mysql.connector
In [80]:
         db = mysql.connector.connect(
           host="localhost",
           user="root",
           password="Onajourney123#",
           database="db3" #must have this expression to enable whatever action written to to
         mycursor = db.cursor()
         print(db)
```

<mysql.connector.connection cext.CMySQLConnection object at 0x000001CD7066E1D0>

#### 1. How much is the total donation?

```
mycursor.execute("SELECT sum(donation) FROM donation_data")
In [53]:
         total donations = mycursor.fetchall()
         print(total_donations)
         [(Decimal('249085'),)]
```

### 2. What is the total donation by Gender?

```
mycursor.execute("SELECT gender, sum(donation) FROM donation data GROUP BY gender"
In [54]:
         donationbygender = mycursor.fetchall()
         print(donationbygender)
         [('Male', Decimal('127628')), ('Female', Decimal('121457'))]
```

### 3. Show the total donation and number of donations by Gender

```
mycursor.execute("SELECT gender, count(donation), sum(donation) FROM donation data
In [56]:
         donationcounterandsum = mycursor.fetchall()
         print(donationcounterandsum)
         [('Male', 492, Decimal('127628')), ('Female', 508, Decimal('121457'))]
```

#### 4. Total donation made by frequency of donation

```
mycursor.execute("SELECT donation data.donation, donor data.donation frequency FROM
In [58]:
         donationfreq = mycursor.fetchall()
         print(donationfreq)
```

```
[(28, 'Daily'), (292, 'Yearly')]
```

# 5. Total donation and number of donation by Job field

```
mycursor.execute("SELECT job_field, count(donation), sum(donation) FROM donation_da
In [63]:
         donationnumberandtotal = mycursor.fetchall()
         for x in donationnumberandtotal:
             print(x)
         ('Human Resources', 93, Decimal('23060'))
         ('Engineering', 93, Decimal('21968'))
         ('Sales', 83, Decimal('19009'))
         ('Business Development', 94, Decimal('22266'))
         ('Legal', 66, Decimal('17309'))
         ('Marketing', 74, Decimal('18255'))
         ('Services', 80, Decimal('19858'))
         ('Accounting', 80, Decimal('20504'))
         ('Research and Development', 84, Decimal('22862'))
         ('Training', 84, Decimal('21721'))
         ('Support', 79, Decimal('19475'))
         ('Product Management', 90, Decimal('22798'))
```

## 6. Total donation and number of donations above 200USD

```
In [67]: mycursor.execute("SELECT sum(donation), count(donation) FROM donation_data WHERE donationabove200 = mycursor.fetchall()
print(donationabove200)

[(Decimal('205892'), 586)]
```

## 7. Total donation and number of donations below 200USD

```
In [68]: mycursor.execute("SELECT sum(donation), count(donation) FROM donation_data WHERE do
donationbelow200 = mycursor.fetchall()
print(donationbelow200)

[(Decimal('42593'), 411)]
```

## 8. Which top 10 states contributes the highest donations

```
In [75]: mycursor.execute("SELECT state, sum(donation) FROM donation_data GROUP BY state ORI
donationbystate = mycursor.fetchall()
for x in donationbystate:
    print(x)
```

```
('California', Decimal('30264'))
('Texas', Decimal('24097'))
('Florida', Decimal('20562'))
('New York', Decimal('14759'))
('Virginia', Decimal('10750'))
('Illinois', Decimal('8674'))
('District of Columbia', Decimal('8376'))
('Tennessee', Decimal('8316'))
('Georgia', Decimal('8046'))
('Ohio', Decimal('6876'))
```

## 9. Which top 10 states contributes the least donations

```
mycursor.execute("SELECT state, sum(donation) FROM donation_data GROUP BY state ORI
In [85]:
         least10donations = mycursor.fetchall()
         for x in least10donations:
             print(x)
         ('Wyoming', Decimal('232'))
         ('Maine', Decimal('258'))
         ('South Dakota', Decimal('401'))
         ('North Dakota', Decimal('651'))
         ('Alaska', Decimal('734'))
         ('West Virginia', Decimal('793'))
         ('South Carolina', Decimal('819'))
         ('New Hampshire', Decimal('841'))
         ('Hawaii', Decimal('875'))
         ('Montana', Decimal('1009'))
 In [ ]:
```