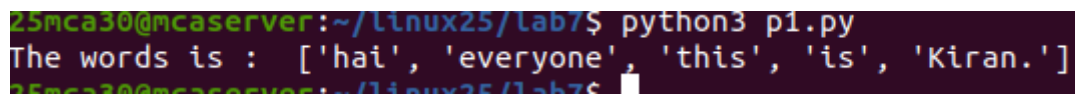Lab 7

1.
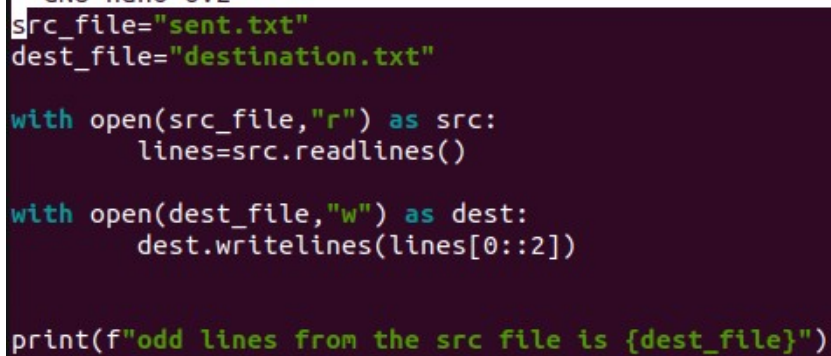```
files="text.txt"
words=[]
with open(files,"r") as file:
      for line in file:
            words.append(line.rstrip("\n"))

print("The words is : ",words)
```



2.



sent.txt

recive.txt

```
i am going to next file.....
2
4
6
8
```
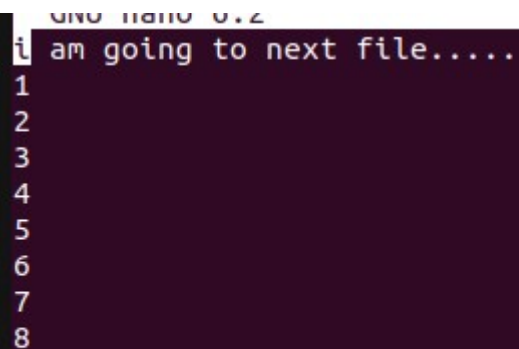
```
25mca30@mcaserver:~/linux25/lab7$ python3 p2.py
odd lines from the src file is destination.txt
```

3.

```
import csv

files="test.csv"

with open(files, newline='')as file:
        reader=csv.reader(file)
        for row in reader:
                print(row)
```

```
25mca30@mcaserver:~/linux25/lab7$ python3 p3.py
['name', 'age', 'city']
['Amit', '25', 'Mumbai']
['Priya', '30', 'Delhi']
['Ravi', '22', 'Bengaluru']
['Sonal', '28', 'Chennai']
['Karan', '35', 'Hyderabad']
```

test.csv
name,age,city
Amit,25,Mumbai
Priya,30,Delhi
Ravi,22,Bengaluru
Sonal,28,Chennai
Karan,35,Hyderabad

4.

```
import csv

csv_file = "test.csv"
columns_to_read = ["name", "city"]

with open(csv_file, newline='') as file:
    reader = csv.DictReader(file)
    for row in reader:
        selected_data = [row[col] for col in columns_to_read]
        print(selected_data)
```

```
25mca30@mcaserver:~/linux25/lab7$ python3 p4.py
['Amit', 'Mumbai']
['Priya', 'Delhi']
['Ravi', 'Bengaluru']
['Sonal', 'Chennai']
['Karan', 'Hyderabad']
```

5.

```
import csv

data_dict = {
    "Name": "Alice",
    "Age": 25,
    "City": "New York"
}

csv_filename = "output.csv"

with open(csv_filename, "w", newline="") as file:
    writer = csv.writer(file)
    writer.writerow(data_dict.keys())
    writer.writerow(data_dict.values())

with open(csv_filename, "r") as file:
    reader = csv.reader(file)
    for row in reader:
        print(row)
```

```
25mca30@mcaserver:~/linux25/lab7$ python3 p5.py
['Name', 'Age', 'City']
['Alice', '25', 'New York']
```

output.csv
Name,Age,City
Alice,25,New York

lab6
1

```python
class RectAngle:
        def __init__(self,l,b):
                self.l=l
                self.b=b
        def area(self):
                return self.l *self.b
        def perimeter(self):
                return  2 *(self.l + self.b)


l1=int(input("Enter the length of 1st Rectangle...."))
b1=int(input("Enter the breadth of 1st Rectangle...."))

l2=int(input("Enter the Length of 2nd Rectangle...."))
b2=int(input("Enter the breadth of 2nd Rectangle..."))

r1=RectAngle(l1,b1)

r2=RectAngle(l2,b2)


print("Area of Rectangle 1 is.....",r1.area())

print("Area of Rectangle 2 is.....",r2.area())

print("Perimeter of Rectangle 1 is.....",r1.perimeter())

print("Perimeter of Rectangle 2 is.....",r2.perimeter())

if r1.area()>r2.area():
        print("Rectangel 1 have larger area...")
elif r1.area()<r2.area():
        print("Rectangle 2 have larger area....")
else:
        print("Both have equal area...")
```

```
25mca30@mcaserver:~/linux25/lab6$ python3 rect.py
Enter the length of 1st Rectangle....2
Enter the breadth of 1st Rectangle....4
Enter the Length of 2nd Rectangle....5
Enter the breadth of 2nd Rectangle...8
Area of Rectangle 1 is..... 8
Area of Rectangle 2 is..... 40
Perimeter of Rectangle 1 is..... 12
Perimeter of Rectangle 2 is..... 26
Rectangle 2 have larger area....
25mca30@mcaserver:~/linux25/lab6$
```

2.

```python
import sys
class Bank_Account:
    def __init__(self,name,accno,acc_type,bal):
        self.name=name
        self.accno=accno
        self.acc_type=acc_type
        self.bal=bal
    def deposit(self, amount):
        self.bal+=amount
        print(f"{amount} deposited successfully :)")
        print(f"current balance is {self.bal}")
    def withdraw(self,amount):
        if amount> self.bal:
            print("insufficent balance..")
        else:
            self.bal-=amount
            print(f"{amount} withdrawn")
            print(f"Current balance is {self.bal}")

    def display(self):
        print(f"Name : {self.name}")
        print(f"Account Number : {self.accno}")
        print(f"Account Type : {self.acc_type}")
        print(f"Balance : {self.bal}")


name =input("Enter the account Name....")
accno=int(input("Enter the account number...."))
acc_type=input("Enter the account type....")
bal=float(input("Enter the initial balance...."))


account=Bank_Account(name,accno,acc_type,bal)
while(1):
    print("....Please select an Option....")
    print("1.Deposit")
    print("2.Withdraw")
    print("3.Display")
    print("4.Exit.")

    ch=int(input("Your  choice please...."))

    if ch==1:
        amt=int(input("Enter the amount to deposit..."))
        account.deposit(amt)
    elif ch==2:
        amt=int(input("Enter the amount to withdraw..."))
        account.withdraw(amt)
```

```python
        elif ch==3:
            account.display()
        elif ch==4:   print("Exiting......")
            sys.exit(0)
        else:
            print("Invalid input......")
```

```
25mca30@mcaserver:~/linux25/lab6$ python3 bank.py
Enter the account Name....Bruce Wayne
Enter the account number....1231243542
Enter the account type....Savings
Enter the initial balance....120000
....Please select an Option....
1.Deposit
2.Withdraw
3.Display
4.Exit.
Your  choice please....1
Enter the amount to deposit...10000
10000 deposited successfully :)
current balance is 130000.0
....Please select an Option....
1.Deposit
2.Withdraw
3.Display
4.Exit.
Your  choice please....2
Enter the amount to withdraw...10000
10000 withdrawn
Current balance is 120000.0
....Please select an Option....
1.Deposit
2.Withdraw
3.Display
4.Exit.
Your  choice please....3
Name : Bruce Wayne
Account Number : 1231243542
Account Type : Savings
Balance : 120000.0
....Please select an Option....
1.Deposit
2.Withdraw
3.Display
4.Exit.
Your  choice please....4
Exiting......
```

3.

```python
class Publisher:
    def __init__(self):
        self.pid=None
        self.pname=None
    def getdata(self):
        self.pid=input("enter the publisher id: ")
        self.pname=input("Enter the publisher name : ")

    def display(self):
        print(f"Publisher id : {self.pid}")
        print(f"Publisher Name :{self.pname}")

class  Book(Publisher):
    def __init__(self):
        super().__init__()
        self.title=None
        self.author=None
    def getdata(self):
        super().getdata()
        self.title=input("Enter the book title :")
        self.author=input("Enter author name : ")
    def display(self):
        super().display()
        print(f"Book title : {self.title}")
        print(f"Author Name : {self.author}")
class Python(Book):
    def __init__(self):
        super().__init__()
        self.price=None
        self.pages=None
    def getdata(self):
        super().getdata()
        self.price=input("Enter the price : ")
        self.pages=input("Enter no of pages : ")
    def display(self):
        super().display()
        print(f"Price : {self.price}")
        print(f"No of Pages :{self.pages}")

book1=Python()

book1.getdata()

book1.display()
```

```
25mca30@mcaserver:~/linux25/lab6$ python3 book.py
enter the publisher id: 23
Enter the publisher name : J K Rowling
Enter the book title :Harry Potter
Enter author name : J K Rowling
Enter the price : 450
Enter no of pages : 750
Publisher id : 23
Publisher Name :J K Rowling
Book title : Harry Potter
Author Name : J K Rowling
Price : 450
No of Pages :750
```