

```
In [38]: print("\nproduct_details\n",Product_details,end="")
    print("\ncustomer_details\n",Customer_details,end="")
    print("\supplier_details\n",supplier_details,end="")
```

```
product_details
['Lenovo Laptop', 'Samsung M31', 'Realmi 10pro', 'Oppo F21', 'Lenovo Laptop', 'Samsung M31', '"LG TV 32"""', 'Oppo F21', 'Lenovo Laptop', 'Samsung M31', '"LG TV 32"""', 'Lenovo Laptop', 'Samsung M31', '"LG TV 32"""']

customer_details
('Kaustubh Mahajan', 'Siddhi Kiwale', 'Sanket Kandalkar', 'Yash Mali', 'Yash Bagul', 'Siddhi Kiwale', 'Sanket Kandalkar', 'Kaustubh Mahajan', 'Yash Mali', 'Siddhi Kiwale', 'Sanket Kandalkar', 'Kaustubh Mahajan', 'Yash Mali', 'Siddhi Kiwale', 'Siddhi Kiwale', 'Sanket Kandalkar', 'Kaustubh Mahajan', 'Yash Mali', 'Siddhi Kiwale', 'Siddhi Kiwale', 'Kaustubh Mahajan', 'Yash Mali')\supplier_details
{'Lenovo Laptop': 'Raka Ele.', 'Samsung M31': 'Deshmukh sales', 'Realmi 10pro': 'Raka Ele.', 'Oppo F21': 'Vijay Sales', '"LG T V 32""": 'Gada Ele.'}
```

2. Find the most popular product for sales.

3. Find the best supplier for sales

```
In [40]: frequency = {}
           # iterating over the list
           for item in Supplier_details.values():
              # checking the element in dictionary
              if item in frequency:
                  # incrementing the counter
                  frequency[item] += 1
              else:
                  # initializing the count
                  frequency[item] = 1
           # printing the frequency
           print(frequency)
           marklist = sorted(frequency.items(), key=lambda x:x[1],reverse=True)
sortdict = dict(marklist)
           print(sortdict)
           {'Raka Ele.': 6, 'Vijay Sales': 3, 'Gada Ele.': 5, 'Surya Ele.': 4, 'Deshmukh sales': 2} {'Raka Ele.': 6, 'Gada Ele.': 5, 'Surya Ele.': 4, 'Vijay Sales': 3, 'Deshmukh sales': 2} The most popular Supplier for sales Raka Ele. sold 6 Items
```

4. Find the customer who buys most of the products.

```
In [16]: frequency = {}
        # iterating over the list
        for item in Customer_details:
           # checking the element in dictionary
           if item in frequency:
             # incrementing the counter
             frequency[item] += 1
           else:
             # initializing the count
             frequency[item] = 1
        # printing the frequency
        print("Frequenct is as below:\n",frequency)
        marklist = sorted(frequency.items(), key=lambda x:x[1],reverse=True)
        sortdict = dict(marklist)
        print("\nSorted dict is as below:\n",sortdict)
        Frequenct is as below:
         {'Kaustubh Mahajan\n': 5, 'Siddhi Kiwale\n': 6, 'Sanket Kandalkar\n': 4, 'Yash Mali\n': 4, 'Yash Bagul\n': 1}
        Sorted dict is as below:
         {'Siddhi Kiwale\n': 6, 'Kaustubh Mahajan\n': 5, 'Sanket Kandalkar\n': 4, 'Yash Mali\n': 4, 'Yash Bagul\n': 1}
        The customer who buys most of the products Siddhi Kiwale
          buy 6 Items
```

5. Find the number of customer who are 'Female'

```
In [49]: # Identify Unique Customer
         from collections import Counter
         counter = dict(Counter(Customer_details))
         names=list(counter.keys())
         print(names)
         male=0
         female=0
         for name in names:
             if gender[name]=="Male":
                male=male+1
             if gender[name] == "Female":
                 female+=1
         print("Total no of Male=",male)
         print("Total no of Female=",female)
         ['Kaustubh Mahajan', 'Siddhi Kiwale', 'Sanket Kandalkar', 'Yash Mali', 'Yash Bagul'] Total no of Male= 0
         Total no of Female= 0
In [43]: d1={"A":10,"B":9,"C":8}
Out[43]: {'A': 10, 'B': 9, 'C': 8}
In [44]: newlist=sorted(d1.items(), key=lambda x:x[0],reverse=False)
In [45]: dict11=dict(newlist)
In [46]: dict11
Out[46]: {'A': 10, 'B': 9, 'C': 8}
```