Open Source Programming: Lab-3

Output:

Line Graph:
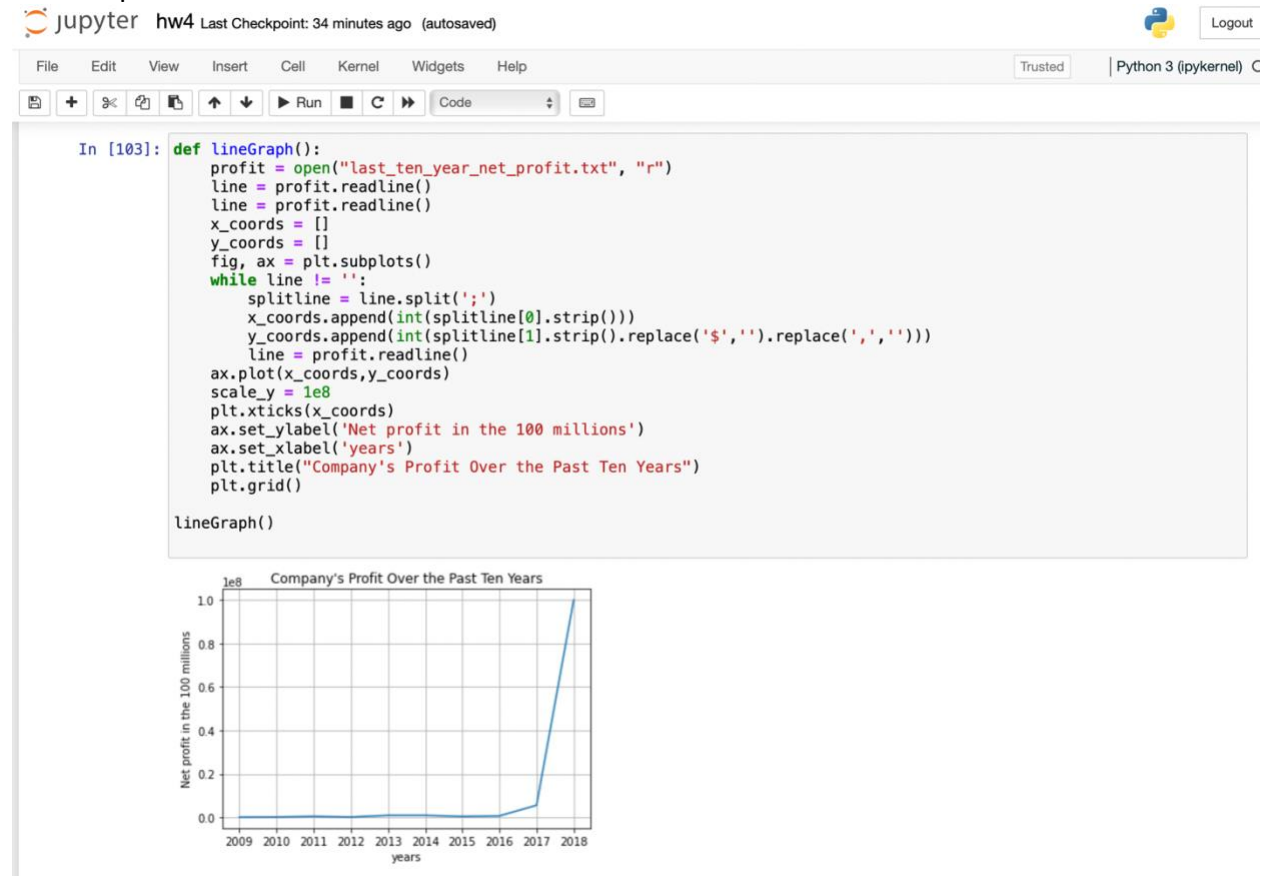
Bar Graph:
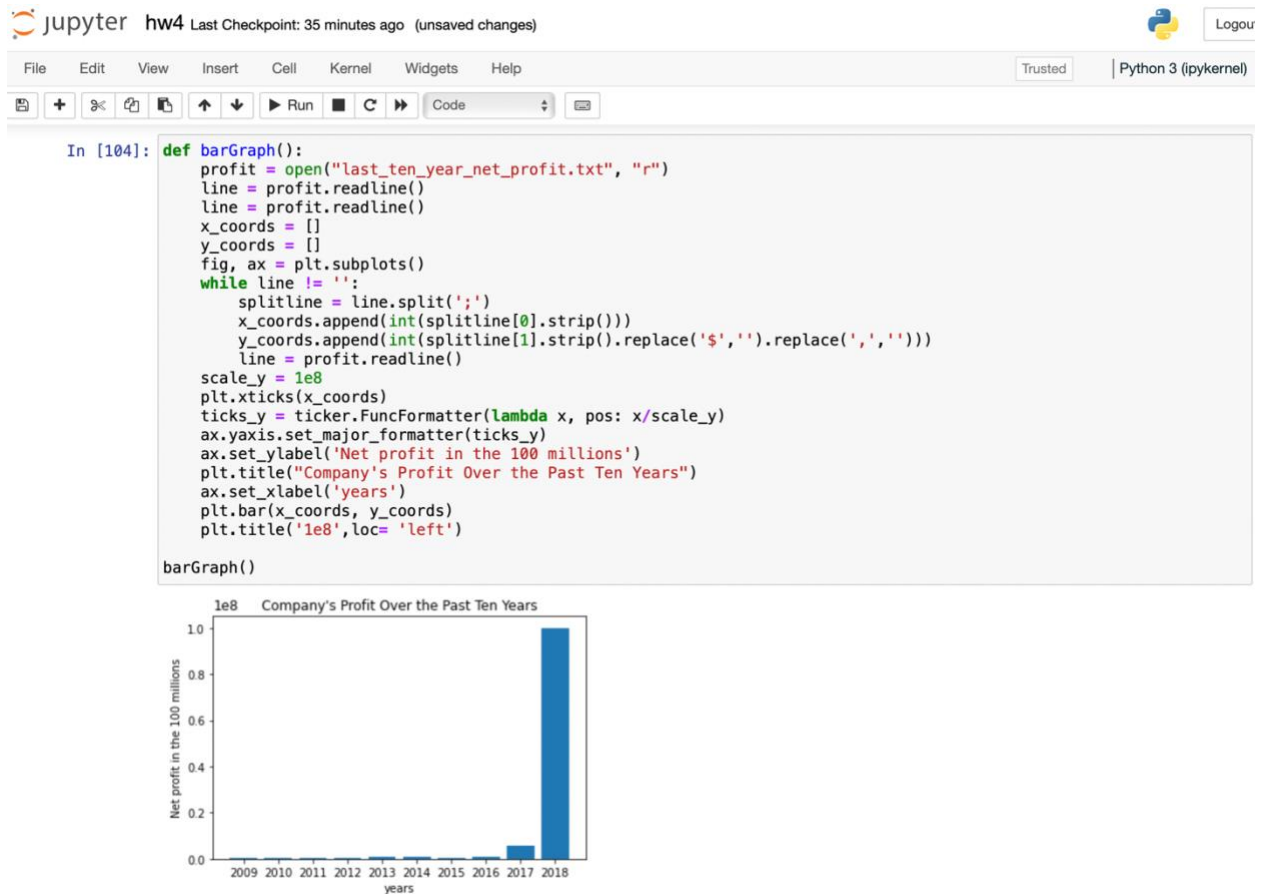
```python
In [104]: def barGraph():
              profit = open("last_ten_year_net_profit.txt", "r")
              line = profit.readline()
              line = profit.readline()
              x_coords = []
              y_coords = []
              fig, ax = plt.subplots()
              while line != '':
                  splitline = line.split(';')
                  x_coords.append(int(splitline[0].strip()))
                  y_coords.append(int(splitline[1].strip().replace('$','').replace(',','')))
                  line = profit.readline()
              scale_y = 1e8
              plt.xticks(x_coords)
              ticks_y = ticker.FuncFormatter(lambda x, pos: x/scale_y)
              ax.yaxis.set_major_formatter(ticks_y)
              ax.set_ylabel('Net profit in the 100 millions')
              plt.title("Company's Profit Over the Past Ten Years")
              ax.set_xlabel('years')
              plt.bar(x_coords, y_coords)
              plt.title('1e8',loc= 'left')

          barGraph()
```

Pie chart:

paste cells below

years

```python
In [105]: def pieChart():
              employee = open("employee_count_by_department.txt", "r")
              line = employee.readline()
              line = employee.readline()
              x_coords = []
              y_coords = []
              while line != '':
                  splitline = line.split(',')
                  x_coords.append(splitline[0].strip())
                  y_coords.append(int(splitline[1].strip()))
                  line = employee.readline()
              def absolute_value(val):
                  return '{:.1f}%'.format(val, round(val, 1))
              plt.pie(y_coords, labels = x_coords, autopct = absolute_value)
              plt.title('Employees per department')
              plt.show()

          pieChart()
```

Employees per department