```
In [2]: # Open files in python -arguments
         # 'r' read-only opening
         # 'w' write, will destroy the file if it already exists
         # 'a' append, will add data to end of file
         # always remember to close a file once finished working on it
         file = open('Wk4_modules.csv', 'r')
         print(file)
         file.close()
         <_io.TextIOWrapper name='Wk4_modules.csv' mode='r' encoding='cp1252'>
In [13]: # the file object is an iterator which returns the next line in the file until the
         file = open('Wk4_modules.csv', 'r')
         # file = open('Wk4_modules.json.txt', 'r') works with json
         # file = open('Wk4_modules.xml.txt', 'r') works with xml
         for line in file:
             print(line)
         file.close()
         i»¿module_name,module_number,module_code,semester
         Prof Software Development 1. 2017-18.,46135,COM648,1
         Professional Dev Software 2. 2017-18.,46136,COM651,1
         Data Structures. 2018-19.,60440,COM657,2
         Database Systems. 2018-19.,60441,COM655,2
         Cloud Development for Employability. 2018-19.,60442,COM673,2
         Data Science Foundations. 2018-19.,60443,COM659,3
```

Project. 2018-19.,60445,COM658,4

```
In [16]: # The with statement automatically closes a file upon exiting the code block, eve
         # The basic structure is as follows:
         with open('Wk4_modules.csv', 'r') as file:
             for line in file:
                 print(line)
         i»¿module_name,module_number,module_code,semester
         Prof Software Development 1. 2017-18.,46135,COM648,1
         Professional Dev Software 2. 2017-18.,46136,COM651,1
         Data Structures. 2018-19.,60440,COM657,2
         Database Systems. 2018-19.,60441,COM655,2
         Cloud Development for Employability. 2018-19.,60442,COM673,2
```

Data Science Foundations. 2018-19.,60443,COM659,3

Project. 2018-19.,60445,COM658,4