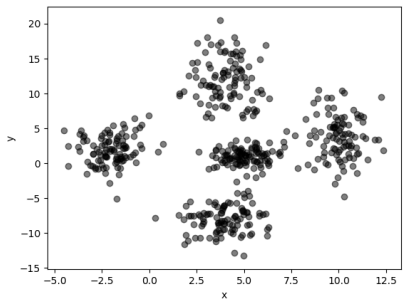
Homework3

Give the training set $T = \{(x_i, y_i)\}$, $0 \leq i \leq 999$. Please use k-means clustering to cluster these points into 5 clusters.



Basic Requirement

1. You must use **k-means clustering** to cluster these points into 5 clusters.
2. **Draw different clusters with different color.**

Program Requirement

1. If you use some program libraries which contain the algorithm logic about the homework, your score will be a lower than others.
2. Please attaching a readme.doc file which describes the progam langauge you used, e.g. the name, the version, the enviroment, the IDE etc.

Attaching .zip file

1. The program file (if more than one, put them in a folder).
2. A readme.doc file which describes the progam langauge you used.
3. A homework3.doc file which must contain the program execution screenshot and a simple description of your implementation.
4. A picture with the training set points with different colors which represent different clusters.
5. Compress above 4 items into a ZIP file using the same name as your student NO. Upload this compressed file to Moodle.

Resource

The training set is attached on moodle. Its file name is **hw3_data.csv**. The first column represents x_i. The second column represents y_i. The first row is the name of each column.

Notice

The score is based on the degree of your program implementation which written by yourself.