Reading Data

If the file that you are going to read is saved in your working directory, you do not need to specify the whole path to the file.

Reading from .txt file
Getting help

> ?read.table
read.table reads a file and create a data frame from it. By default it doesn't have a header.

> our.data = read.table("Data/CData.txt", header = TRUE)
> head(our.data)

```
      x         y
1 5.1756426 1.4663523
2 8.3717110 3.8488988
3 0.3805756 1.3589665
4 4.3884145 4.5357171
5 1.9780963 0.5158695
6 0.5544184 0.4695551
```

Reading from .csv file
Getting help
> ?read.csv

csv stands for comma-separated values. read.csv reads a file and create a data frame from it. By default it has a header and the values are separated sep by ,.

> pokemon = read.csv("Data/pokemon.csv")
> head(pokemon)

Number	Name	Type_1	Type_2	Total	HP	Attack	Defense	Sp_Atk	Sp_Def	Speed
1	1 Bulbasaur	Grass	Poison	318	45	49	49	65	65	45
2	2 Ivysaur	Grass	Poison	405	60	62	63	80	80	60
3	3 Venusaur	Grass	Poison	525	80	82	83	100	100	80
4	4 Charmander	Fire		309	39	52	43	60	50	65
5	5 Charmeleon	Fire		405	58	64	58	80	65	80
6	6 Charizard	Fire	Flying	534	78	84	78	109	85	100

	Generation	isLegendary	Color	hasGender	Pr_Male	Egg_Group_1	Egg_Group_2
1	1	False	Green	True	0.875	Monster	Grass
2	1	False	Green	True	0.875	Monster	Grass
3	1	False	Green	True	0.875	Monster	Grass
4	1	False	Red	True	0.875	Monster	Dragon
5	1	False	Red	True	0.875	Monster	Dragon
6	1	False	Red	True	0.875	Monster	Dragon

	hasMegaEvolution	Height_m	Weight_kg	Catch_Rate	Body_Style
1	False	0.71	6.9	45	quadruped
2	False	0.99	13.0	45	quadruped
3	True	2.01	100.0	45	quadruped
4	False	0.61	8.5	45	bipedal_tailed
5	False	1.09	19.0	45	bipedal_tailed
6	True	1.70	90.5	45	bipedal_tailed

```
> titanic = read.csv("Data/titanic.csv")
> head(titanic)
  PassengerId Survived Pclass
1           1        0      3
2           2        1      1
3           3        1      3
4           4        1      1
5           5        0      3
6           6        0      3
                                                   Name    Sex Age SibSp Parch
1                                Braund, Mr. Owen Harris   male  22     1     0
2 Cumings, Mrs. John Bradley (Florence Briggs Thayer) female  38     1     0
3                                 Heikkinen, Miss. Laina female  26     0     0
4         Futrelle, Mrs. Jacques Heath (Lily May Peel) female  35     1     0
5                               Allen, Mr. William Henry   male  35     0     0
6                                       Moran, Mr. James   male  NA     0     0
            Ticket    Fare Cabin Embarked
1        A/5 21171  7.2500              S
2         PC 17599 71.2833   C85        C
3 STON/O2. 3101282  7.9250              S
4           113803 53.1000  C123        S
5           373450  8.0500              S
6           330877  8.4583              Q
```

Sources
[1] Monika Petkova's notes on R programming language @ FMI, Sofia University