**Project - Programming for Data Analysis**

Potential Datasets

Employment and Disability

[1] Central Statistics Office, People with a disability, (2021) <https://data.cso.ie/table/APD05>

[2] Towards Data Science, How to read CSV File into Python using Pandas, (25th May, 2020) <https://towardsdatascience.com/how-to-read-csv-file-using-pandas-ab1f5e7e7b58?gi=df516eec2150>

[3] W3 Schools, Pandas Read CSV, (1999 - 2021) <https://www.w3schools.com/python/pandas/pandas_csv.asp>

[4] Data Independent, Pandas Head – Preview Data – DataFrame.head(), (13th Sept, 2020) <https://www.dataindependent.com/pandas/pandas-head/>

[5] Towards Data Science, Pandas for People In A Hurry (23th May, 2019) <https://towardsdatascience.com/pandas-for-people-in-a-hurry-59d966630ae0#:~:text=df.,Example%3A%20df>.

[6] Additional CSO Data Review:

- <https://www.cso.ie/en/releasesandpublications/ep/p-cp9hdc/p8hdc/>

- <https://www.cso.ie/en/releasesandpublications/ep/p-cp9hdc/p8hdc/p9d/>

- <https://www.cso.ie/en/releasesandpublications/ep/p-cp9hdc/p8hdc/p9chs/>

Crime and Justice

[1] Central Statistics Office, Crime and Justice, (2021) <https://www.cso.ie/en/statistics/crimeandjustice/>

[2] Centra Statistics Office, Recorded Crime Offences Under Reservation, (2021) <https://data.cso.ie/table/CJQ05>

[3] Towards Data Science, 8 Ways to Filter Pandas Dataframes (5th Feb, 2021) <https://towardsdatascience.com/8-ways-to-filter-pandas-dataframes-d34ba585c1b8>

[4] Geeks for Geeks, How to Filter DataFrame Rows Based on the Date in Pandas?, (11th Dec, 2020) <https://www.geeksforgeeks.org/how-to-filter-dataframe-rows-based-on-the-date-in-pandas/>

[5] CMD Line Tips, How to Split Column into two Columns in Pandas? ( 10th Nov, 2018) <https://cmdlinetips.com/2018/11/how-to-split-a-text-column-in-pandas/>

[6] Data Science Parichay, Pandas – split column by Delimier, (1st Sept, 2021) <https://datascienceparichay.com/article/pandas-split-column-by-delimiter/>

[7] Towards Data Science, Pandas for People in a Hurry, (23rd May, 2019) <https://towardsdatascience.com/pandas-for-people-in-a-hurry-59d966630ae0>

[8] Shane Lynn, Use Pandas Groupby to Group and Summarise DataFrames, (No Date) <https://www.shanelynn.ie/summarising-aggregation-and-grouping-data-in-python-pandas/>

[9] Geeks for Geeks, Ways to filter Pandas DataFrame by column values, (1st Oct, 2020) <https://www.geeksforgeeks.org/ways-to-filter-pandas-dataframe-by-column-values/>

[10] Additional CSO Data Review:

- <https://www.cso.ie/en/releasesandpublications/ep/p-rc/recordedcrimeq32021/>

- <https://www.cso.ie/en/releasesandpublications/ep/p-rc/recordedcrimeq22021/>

Births

[1] Central Statistics Office, Births, (2021) <https://data.cso.ie/table/VSA19>

[2] Pandas, pandas.DataFrame.info (2008 – 2021) <https://pandas.pydata.org/docs/reference/api/pandas.DataFrame.info.html>

[3] Pandas Pydata, How do I select a subset of a DataFrame?, (2008 - 2021) <https://pandas.pydata.org/docs/getting_started/intro_tutorials/03_subset_data.html>

[4] Stack Overflow, Renaming column names in Pandas, (2012) <https://stackoverflow.com/questions/11346283/renaming-column-names-in-pandas>

Investigation of Dataset

[1] CSO, Births, (2021) <https://data.cso.ie/table/VSA36>

[2] NumPy, NumPy: the absolute basics for beginners, (22nd June, 2021) <https://numpy.org/doc/stable/user/absolute_beginners.html>

[3] maplotlib, Pyplot Tutorial, (2012 - 2021) <https://matplotlib.org/stable/tutorials/introductory/pyplot.html>

[4] Section.io, How to use Seaborn for Data Visualization, (29th Jan, 2021) <https://www.section.io/engineering-education/seaborn-tutorial/>

[5] Data to Fish, Replace NaN Values with Zeros in Pandas DataFrame, (24th June, 2021) <https://datatofish.com/replace-nan-values-with-zeros/>

[6] Stack Overflow, Change column type in pandas, (2013) <https://stackoverflow.com/questions/15891038/change-column-type-in-pandas>

[7] Towards Data Science, 8 Ways to Filter Pandas Dataframes, (5th Feb, 2021) <https://towardsdatascience.com/8-ways-to-filter-pandas-dataframes-d34ba585c1b8>

[8] Ritchie Ng, Multiple Criteria Filtering, (11th Dec, 2021) <https://www.ritchieng.com/pandas-multi-criteria-filtering/>

[9] Ritchie Ng, Filtering rows of a pandas DataFrame by column value, (11th Dec, 2021) <https://www.ritchieng.com/pandas-filtering/>

[10] Stack Overflow, Filtering Multiple Columns Pandas, (2016) <https://stackoverflow.com/questions/35131096/filtering-multiple-columns-pandas>

[11] mode, Creating Histrograms Using Pandas, (2021) <https://mode.com/example-gallery/python_histogram/>

[12] Sharp Sight, How to Make a Seaborn Histogram, (18th Jan, 2018) <https://www.sharpsightlabs.com/blog/seaborn-histogram/>

[13] Seaborn, seaborn.histplot, (2012-2021) <https://seaborn.pydata.org/generated/seaborn.histplot.html>

[14] Stack Overflow, Returning greater than and less than values in pandas, (2021) <https://stackoverflow.com/questions/65955931/returning-greater-than-and-less-than-values-in-pandas>

[15] Seaborn, seaborn.lineplot, (2012-2021) <https://seaborn.pydata.org/generated/seaborn.lineplot.html>

[16] Delft Stack, Rotate Axis Tick Labels of Seaborn Plots, (1st May, 2021) <https://www.delftstack.com/howto/seaborn/rotate-tick-labels-seaborn/>

[17] Geeks for Geeks, seabornlineplot() method in python, (17th July, 2020) <https://www.geeksforgeeks.org/seaborn-lineplot-method-in-python/>

[2] Towards Data Science, 8 Ways to Filter Pandas Dataframes, (5th Feb, 2021) <https://towardsdatascience.com/8-ways-to-filter-pandas-dataframes-d34ba585c1b8>

[3] Stack Overflow, Convert Floats to ints in Pandas, (2014) <https://stackoverflow.com/questions/21291259/convert-floats-to-ints-in-pandas>

[4] Towards Data Science, How To Change Column Type in Pandas DataFrames, (8th July, 2021) <https://towardsdatascience.com/how-to-change-column-type-in-pandas-dataframes-d2a5548888f8>

[]

[]

[]

### Create data

[] NewBedev, pandas new column based on multiple conditions code example, (2021) <https://newbedev.com/python-pandas-new-column-based-on-multiple-conditions-code-example>

[] Towards Data Science, 3 Methods to Crate Conditional Columns with Python Pandas and Numpy, (1st July, 2021) <https://towardsdatascience.com/3-methods-to-create-conditional-columns-with-python-pandas-and-numpy-a6cd4be9da53>

[] Stack Overflow, How to create new column in a df based on multiple conditions? using pandas [duplicate], (2020) <https://stackoverflow.com/questions/61862861/how-to-create-new-column-in-a-df-based-on-multiple-conditions-using-pandas>