

# CSC423 Python Tutorial for Final Project

Following are instructions for working with Python in the final project.

## Prerequisites

Please install the following on your machine. Click on the text to follow hyperlinks.

1. Make sure you have an editor like Sublime Text/Visual Studio Code to edit code with (or vim/emacs if you're groovy).
2. Python 3
3. cx\_Oracle 8. Can be installed using `pip` or `pip3`:

```
python -m pip install cx_Oracle --upgrade
```

4. Oracle Instant Client
5. pandas. Can be installed using `pip` or `pip3`.

```
pip install pandas
```

For additional instructions on cx\_Oracle 8, please see the following:

- [https://cx-oracle.readthedocs.io/en/latest/user\\_guide/installation.html](https://cx-oracle.readthedocs.io/en/latest/user_guide/installation.html)

## Steps

It is assumed that you have placed the contents of the tutorial ZIP you downloaded from Blackboard in a directory you can access. That directory should have the following files: (1) `connect_oracle.py` and (2) this PDF.

1. Unzip the contents of the Oracle Instant Client and place it in the same directory.
2. Open `connect_oracle.py` in an editor. Look for the TODO's in the file and modify accordingly.
3. You should be able to run the Python file as follows:

```
python3 connect_oracle.py
```

4. A print out of a `pandas` dataframe with employee info should result.
5. You will use `pandas` to manipulate the contents of the returned query. Please consult the following quick start guide for help with `pandas`: [https://pandas.pydata.org/pandas-docs/stable/user\\_guide/10min.html](https://pandas.pydata.org/pandas-docs/stable/user_guide/10min.html)

## Notes

If you have any questions, please feel free to reach out to the instructor and/or the TAs.