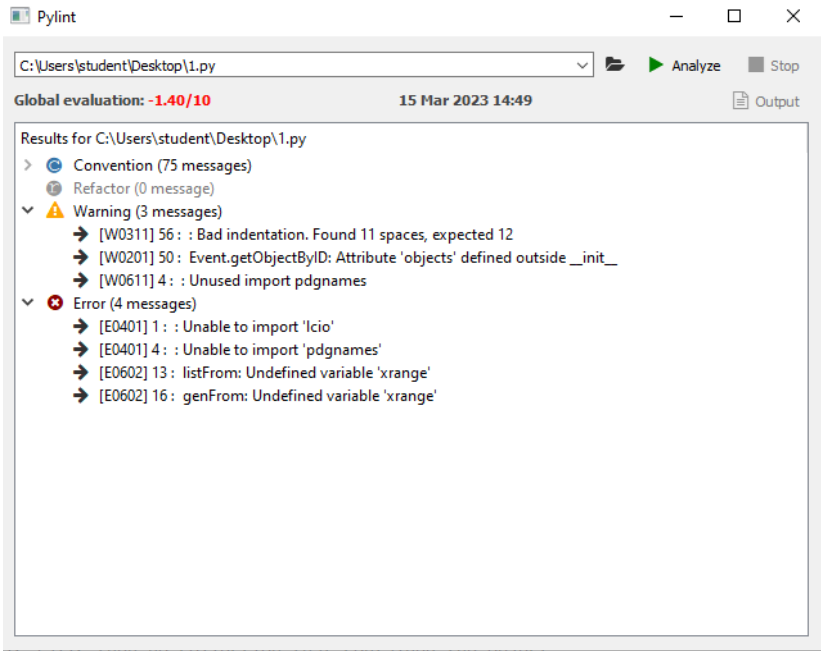
Dhirubhai Ambani
Institute of Information and Communication Technology

Name - **Kavish Shah**
Student ID - **202001114**
Course - **Software Engineering (IT314)**

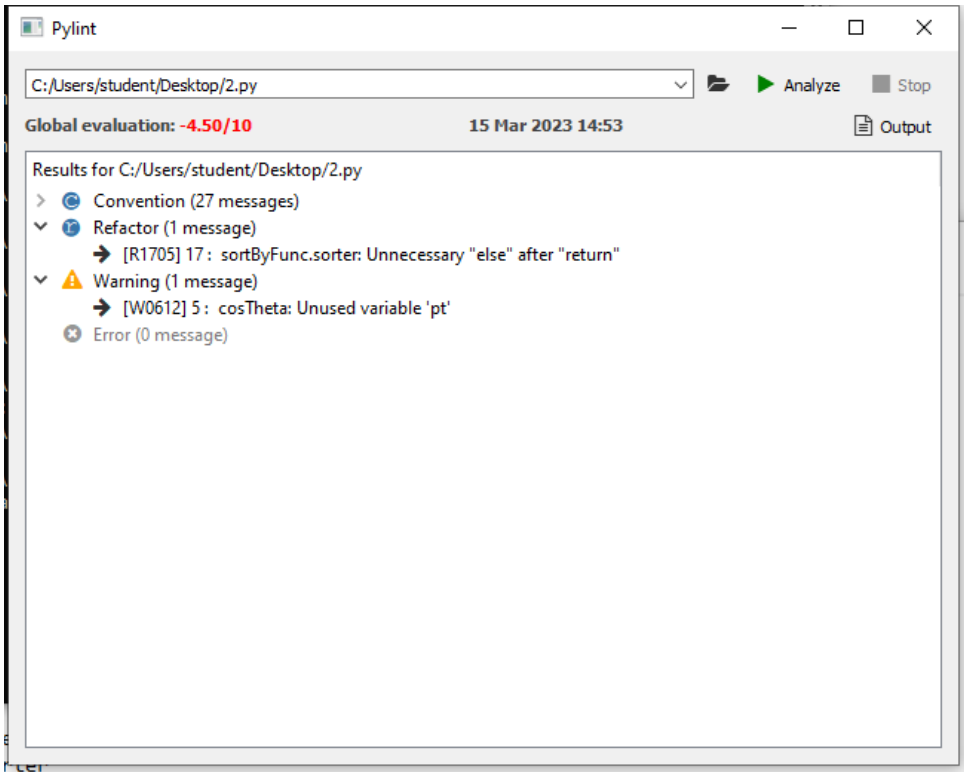
Lab 5

Link of the github repository whose files analyzed: https://github.com/benjeffery/lciotools

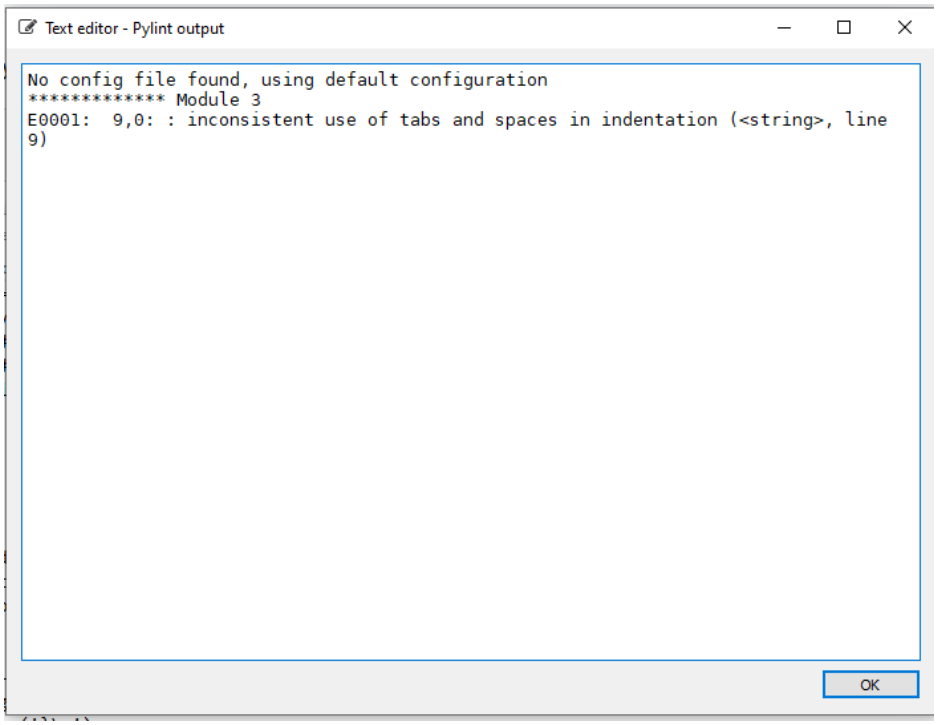
Screenshot of static analysis of the file https://github.com/benjeffery/lciotools/blob/master/lciotools.py:



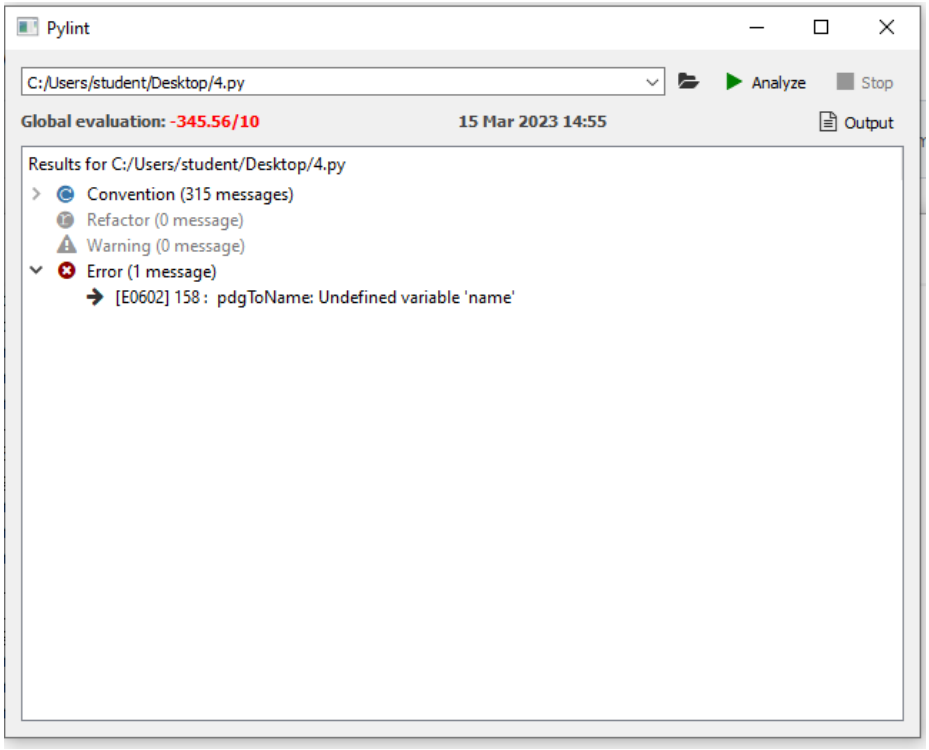
Screenshot of static analysis of the file https://github.com/benjeffery/lciotools/blob/master/math_utils.py:



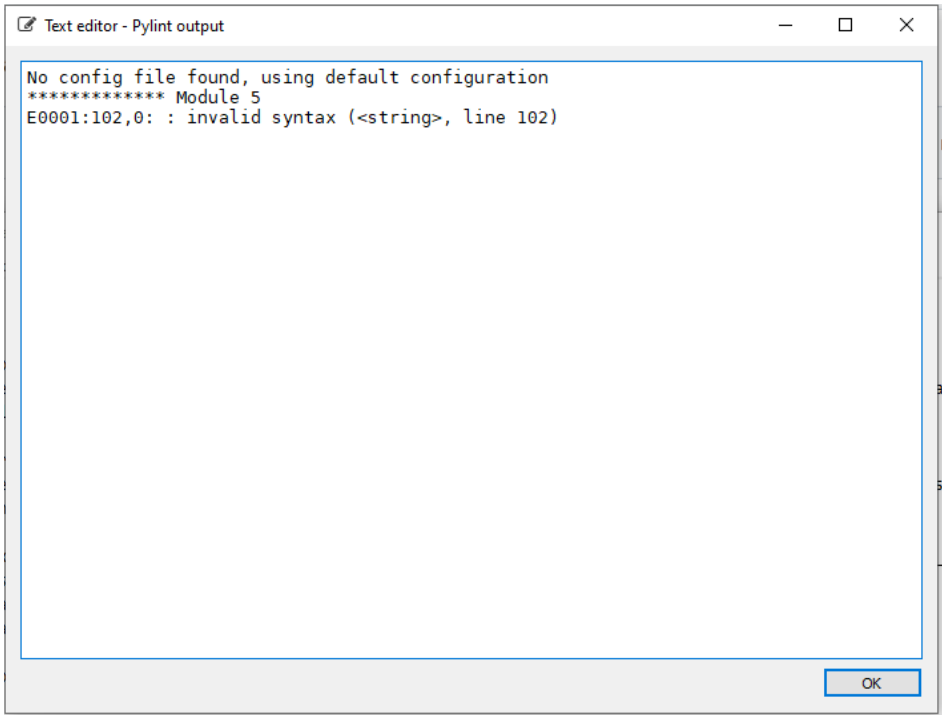
Screenshot of static analysis of the file https://github.com/benjeffery/lciotools/blob/master/mcana.py:



Screenshot of static analysis of the file https://github.com/benjeffery/lciotools/blob/master/pdgnames.py:



Screenshot of static analysis of the file https://github.com/benjeffery/lciotools/blob/master/vertexanalysis.py:



General analysis and understanding of the above static analysis using pylint:

In the repository selected, there aren't many errors. Some errors are due to importing unavailable files while some errors are because the variable name is used without being defined. Some errors are due to invalid syntax as well.

Some of the above mentioned errors might not be displayed by a compiler and a general error message might be displayed by which the user might not understand what the error is.

There are certain warnings as well along with the above mentioned errors. Some warnings were because of unused 'else' statements and unused variables. Few were because of bad indentation and a few due to unused imported variables.

Most of the above mentioned warnings are also detected by the compiler.

There may also be some false positives i.e. which are shown as errors or warnings shown by the static analysis tool might actually not be real errors.

Overall majority of errors and warnings were discovered during the static analysis.