

Problem Statement

Assume $f(x)$ is a function defined for the domain $X \sim \mathbb{R} - \{0\}$ as:

$$F(x) = \sin(x)/x;$$

Where x is the value of the angle in degree.

Write a program to calculate the value of the function for well-defined values of x .

The language of submission for code is python. The solution should not use any of the existing python libraries.

Submission Format

Three files are expected from you put together in a .zip file, for it to be qualified as a valid submission. See details for the files and their extensions. Please ensure that these files are actually zipped directly, and not any folder which contain these files.

You shall submit the following files as a zip file for this submission:

- Q7_Explanation.docx
- Q7.py.
- The updated SampleSubmission.csv which was provided with this problem with your predictions in the format mentioned below as Q7.csv. The file will contain results for the eight input test cases in the first column.

0.2
-0.43
0.86

A sample python file with the format has been provided to you as Q7.py, you need to fill your logic in the function `generate_result`.

Evaluation Criteria

We shall measure submissions on the criteria:

Accuracy metric as the evaluation criteria.

Primarily we shall use the provided test cases for test to form a cutoff.

We shall use extra out-of-sample input test cases not provided to you for final scoring.