Project Euler #82 - Path sum: three ways

Submit Assignment

Due Monday by 6pm **Points** 100 **Submitting** a file upload **File Types** zip

Solve Project Euler #82 - Path sum: three ways.

- Write your solution in Python, C, C++, or Java and submit PathSumThreeWays.java.
- Source code must be commented. (In a real contest we don't have time to comment, but we want to learn techniques in this course that we revisit and reuse.)
- Your program must be able to read in a square matrix of non-negative integers of any arbitrary size of up to and including 100x100.
- Make sure your solution reads a file named "matrix.txt". You do not need to process command line arguments or prompt the user for the file name. The format of the file matches the one given on Project Euler.
- The output should state the minimum sum on one line and the values on the next. The labels and spacing should be identical. See below for an example.
- Create 5 test cases. For the test cases, the smallest matrix should be 1x1 and the largest 8x8. For some test cases, you might want to make a path of 0s in your matrices, as you know that path will have the minimum sum.

You should work in your normal teams. Be sure to include each person's name at the top of the file as well as the pledge. One person from the team must submit on Canvas.

Upload a single zip file called pathsumthreeways.zip with the source code and test cases inside.

Output (for the example on the Project Euler description page):

Min sum: 994 Values: [201, 96, 342, 234, 103, 18]

Note:

If you cannot get the solution, you should also submit a PDF in your zip file explaining:

- What type of error you are getting.
- What you tried to do in coding the algorithm.
- What test cases you ran locally and what is wrong with the output. If you see nothing wrong with any test cases locally, double check corner cases.
- How you went about tracing/debugging your code.

The more information you provide, the easier it is for someone to help you correct your problem.