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Running instructions:
Run this program with 3 arguments on the command line: the input file, output file for flow direction and output file for flow accumulation

g++ -Wall -o flow flow.cpp grid.cpp
./flow [grid-file-to-read] [FD-file-to-write] [FA-file-to-write]

How to compile and run your code:

Running on dover:
g++ -std=c++11 -Wall -o flow flow.cpp grid.cpp
./flow [grid-file-to-read] [FD-file-to-write] [FA-file-to-write]

List of files in your project with a brief description of what they do:

Flow.cpp: The main file for the project. Read in a grid in ascii format and compute its flow direction and flow accumulation. Write each computation to a new file whose names are specified by the user.

Grid.cpp: Class file for class Grid. Storing information and data of grid, as well as implement grid's functionality

Grid.h: Header file for the Grid class

Does your code give the correct output on test2.asc: YES

Please run your code on the datasets below and record the running time. You can use your laptop, one of the public linux machines, or the desktops in the labs.

DATASET	compute FA without dynamic programming (time in seconds)	compute FA with dynamic programming (time in seconds)
brunsdem (200K)	0.111301	0.069984
kaweah.asc (1M)	2.00967	0.885783
sierra.asc (6M)	15.9293	7.4233
portland_me (120M)	534.885	168.992
usadem2 (250M)	99.5561	66.0427

Comments: