Homework 12 – OpenACC Monocolor Image

Jarod Klion

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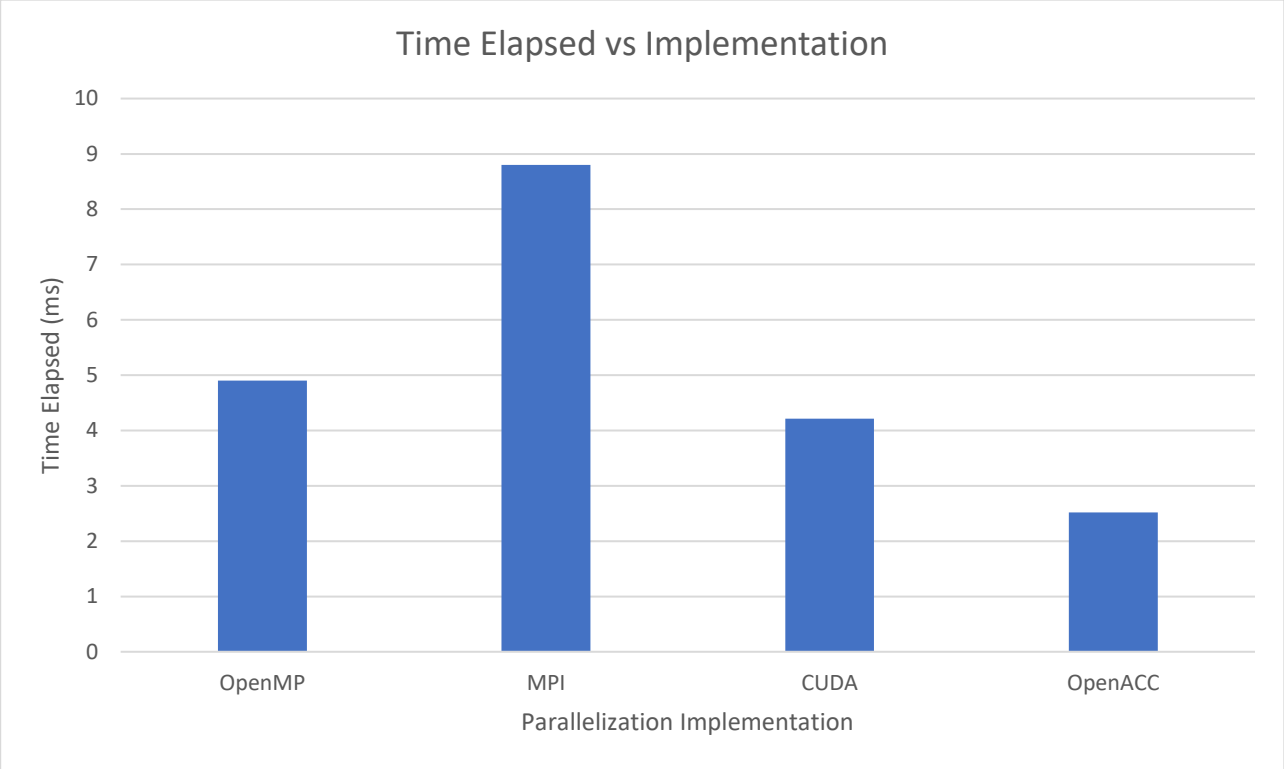
1. Object of the project:
    a. Use OpenACC to redo the previous projects of turning a colored image monocolor.
2. Details:
    a. Use OpenACC pragmas, similarly to OpenMP, to augment pre-existing code in order to turn a colored image monocolor. This was achieved by wrapping the main loop in a *kernels copy* pragma for parallelization.
3. Results:
    a. Implementation: [OpenMP, MPI, CUDA, OpenACC]
    b. Time Elapsed (ms): [4.9, 8.8, 4.2140, 2.521]



4. Performance Improvements:
    a. When I had the verbose output for pgc++, it did list that some parallelization was prevented because loops carried dependence of dataBuf or carried dependence due to exposed use of dataBuf, so addressing those errors should lead to further performance improvements.