**Description:**

There are many problems in scientific computing where you want to do arithmetic on multiple arrays of numbers (matrix manipulation, Fourier transformation, convolution, etc.). This project is in two parts:

1. Multiply two arrays together using OpenCL: D[gid] = A[gid]\*B[gid]; Benchmark it against both input array size (i.e., the global work size) and the local work size (i.e., number of work-items per work-group).
2. Multiply two arrays together and add a third using OpenCL: D[gid] = A[gid]\*B[gid] + C[gid]; Benchmark it against both input array size (i.e., the global work size) and the local work size (i.e., number of work-items per work-group).
3. Perform the same array multiply as in #1, but this time with a reduction: Sum = summation{ A[:]\*B[:] }; Benchmark that against input array size (i.e., the global work size). You can pick a local work size and hold that constant.