

All times in processor cycles as reported by clock() for files with 5000 random values

	No-zero	Early-zero	mid-zero	Late-zero
Linear Search	59	1	30	59
Bubble sort	656926	687407	727809	652851
Binary Search	1	1	1	1

I think that the only thing that surprised me was how fast the binary search was. I wasn't expecting it to be one cycle... maybe more like 10-20 cycles? I'm not surprised that they are all the same... because the 0 should end up in the same place.

It makes sense that my linear search grows as the zero gets later in the file. It also makes sense that my bubble sort takes a loooooonnnnggg time. I would have thought the late-zero file would have a longer sort time, but maybe the variance isn't big enough to have reliable data without lots of samples.

I think a one time sort would change my consideration of what algorithm to use. You obviously want a more performant algorithm if you are going to be running it a lot. If you only have to run it once on a dataset, you could probably code whatever will get the job done in a reasonable amount of time.