

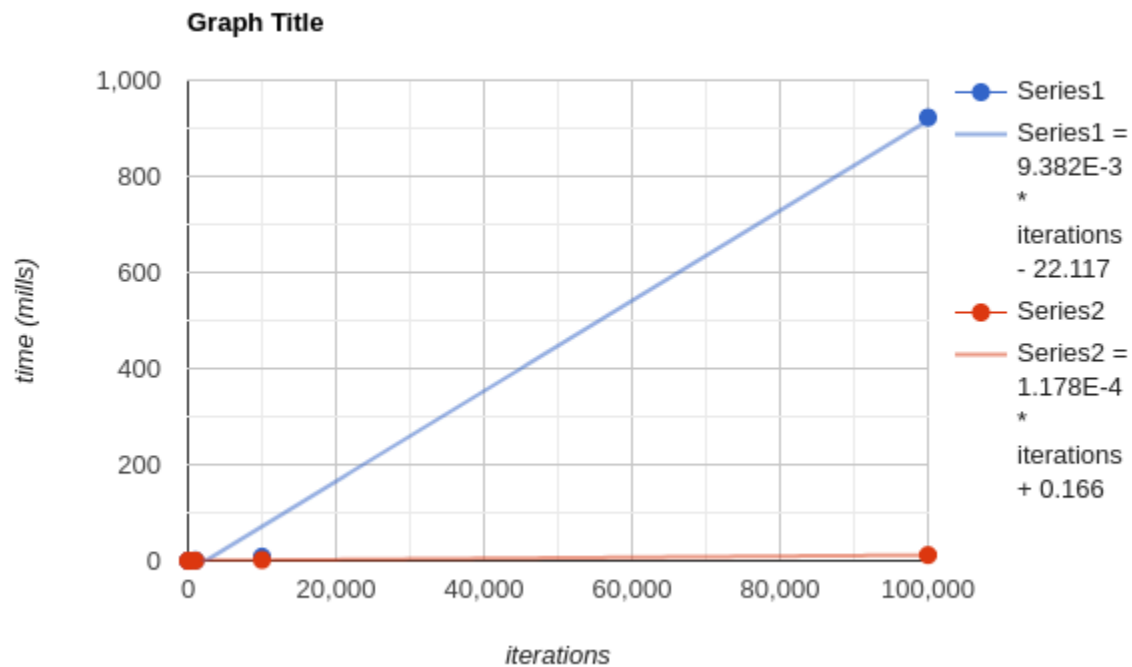
Loops\Programs	Normal C Tlme (nano sec)	Bpf C Time (nano sec)
10 (ten)	33623	7882
100	109546	43703
1000	927175	194450
10000	8542908	1768125
100000	922254358	11907917
150000		(does not work)
200000		(does not work)
1000000 (million)		(does not work)
10000000		(does not work)
100000000		(does not work)
1000000000 (billion)		(does not work)
10000000000		(does not work)

Loops\Programs	Normal C Tlme (milli sec)	Bpf C Time (milli sec)
10 (ten)	0.033623	0.007882
100	0.109546	0.043703
1000	0.927175	0.19445
10000	8.542908	1.768125
100000	922.254358	11.907917

<https://www.rapidtables.com/tools/scatter-plot.html>

Normal c: 10 **0.033623** 100 **0.109546** 1000 **0.927175** 10000 **8.542908** 100000 **922.254358**

BPF: 10 0.007882 100 0.043703 1000 0.19445 10000 1.768125 100000 11.907917



BPF version is much faster!

If, I don't do new line printing, it put those character in buffer and when buffer gets filled up, that is when it flush and during that flush, it calls syscall. That is why I put `\n`

Also, `getpid()` is VDSO (Virtual Dynamic Shared Object) optimized by modern CPU.

How VDSO work?

- (i) the kernel maps a portion of memory into the address space of the process, which is calling `getcpu()`
- (i) next time, When any process calls `getcpu()`, the CPU determines that the system call is implemented in the VDSO page. Instead of transitioning to kernel mode, the process executes the `getcpu()` function directly from the VDSO page in user-space.

the kernel maps the VDSO page into the address space of each process during each individual process initialization