

## 6) a. top

```

top - 20:16:47 up 2:17, 1 user, load average: 1.75, 1.71, 1.60
Tasks: 281 total, 1 running, 279 sleeping, 0 stopped, 1 zombie
%Cpu(s): 5.3 us, 2.8 sy, 0.0 ni, 91.1 id, 0.0 wa, 0.4 hi, 0.3 si, 0.0 st
MiB Mem : 15792.6 total, 4651.4 free, 8013.0 used, 4586.2 buff/cache
MiB Swap: 4096.0 total, 4067.5 free, 28.5 used, 7779.6 avail Mem

  PID USER      PR  NI    VIRT    RES    SHR     %CPU  %MEM    TIME+  COMMAND
 1162 tetroner  20   0 2132144 238960 165704   5 16.2   1.5   3:07.37 kwin_x11
  741 root      20   0   24.9g 158904  96288   5 13.2   1.0   3:14.51 Xorg
 1824 tetroner  20   0 1132.3g 586116 146664   5  6.3   3.1   3:15.90 Discord
 4234 tetroner  20   0 3735664 339544 156712   5  6.3   2.1   0:13.35 spotify
 1281 tetroner  20   0 3597896 458256 212936   5  5.0   2.8   1:28.24 plasmashell
 4321 tetroner  20   0   50.0g 311576 116996   5  4.3   1.9   0:22.89 spotify
 1741 tetroner  20   0   32.7g 238448 158744   5  3.0   1.5   0:35.42 Discord
 4591 tetroner  20   0 762128 177408 124524   5  3.0   1.1   0:01.66 kitty
 1056 tetroner  9 -11 128628 32456  8612   5  2.3   0.2   0:13.06 pipewire-pulse
 2449 tetroner  20   0   32.8g 525704 213368   5  0.7   3.3   3:55.28 brave
 2643 tetroner  20   0 1131.3g 170256 107300   5  0.7   1.1   0:12.39 brave
 3280 root      0 -20   0   0   0   0  0.1   0.7   0:01.84 kworker/u17:1-1915_flip
 4265 tetroner  20   0 2055400 257100 158088   5  0.7   1.6   0:06.93 spotify
 4991 tetroner  20   0 12344  6012  3836   5  0.7   0.0   0:00.10 top
  689 root      20   0 2166368 69660  30184   5  0.3   0.4   0:27.72 containerd
 1054 tetroner  9 -11 115572 22192  8808   5  0.3   0.1   0:04.89 pipewire
 1363 tetroner  20   0 962704 219936 164432   5  0.3   1.4   0:00.94 firewall-applet
 1675 root      20   0   0   0   0   0  0.1   0.3   0:05.79 kworker/7:0-events
 1693 tetroner  20   0 1122.2g 345076 219588   5  0.3   2.1   0:18.35 Discord
 2515 tetroner  20   0   32.8g 248600 119908   5  0.3   1.5   4:40.67 brave
 2520 tetroner  20   0   32.4g 153412 182288   5  0.3   0.9   0:20.74 brave
 4483 tetroner  20   0 1131.3g 233608 126852   5  0.3   1.4   0:18.34 brave
   1 root      20   0 23120 13728  9968   5  0.0   0.1   0:02.13 systemd
   2 root      20   0   0   0   0   0  0.5   0.0   0:00.00 kthread
   3 root      20   0   0   0   0   0  0.5   0.0   0:00.00 pool_workqueue_release
   4 root      0 -20   0   0   0   0  0.1   0.0   0:00.00 kworker/R-rcu_g
   5 root      0 -20   0   0   0   0  0.1   0.0   0:00.00 kworker/R-rcu_p
   6 root      0 -20   0   0   0   0  0.1   0.0   0:00.00 kworker/R-slab_
   7 root      0 -20   0   0   0   0  0.1   0.0   0:00.00 kworker/R-netns
   9 root      0 -20   0   0   0   0  0.1   0.0   0:00.00 kworker/0:0H-events_highpri
  10 root      20   0   0   0   0   0  0.1   0.0   0:00.57 kworker/0:1-events
  12 root      0 -20   0   0   0   0  0.1   0.0   0:00.00 kworker/R-mm_pe
  14 root      20   0   0   0   0   0  0.1   0.0   0:00.00 rcu_tasks_kthread
  15 root      20   0   0   0   0   0  0.1   0.0   0:00.00 rcu_tasks_rude_kthread
  16 root      20   0   0   0   0   0  0.1   0.0   0:00.00 rcu_tasks_trace_kthread
  17 root      20   0   0   0   0   0  0.5   0.0   0:00.03 ksoftirqd/0
  18 root      -2   0   0   0   0   0  0.1   0.0   0:00.67 rcu_preempt
  19 root      -2   0   0   0   0   0  0.5   0.0   0:00.00 rcub/0
  20 root      rt   0   0   0   0   0   0  0.5   0.0   0:00.01 migration/0
  21 root      -51  0   0   0   0   0  0.5   0.0   0:00.00 idle_inject/0
  22 root      20   0   0   0   0   0  0.5   0.0   0:00.00 cpuhp/0
  23 root      20   0   0   0   0   0  0.5   0.0   0:00.00 cpuhp/1

```

## b. ps

```

~ ● 20:17:36
$ ps -l
 F S   UID        PID  PPID  C PRI  NI ADDR SZ WCHAN  TTY          TIME CMD
 0 S 1000        4602    4591  0 80   0 - 2744 sigsus pts/1  00:00:02 zsh
 4 R 1000        5109    4602 99 80   0 - 2707 -          pts/1  00:00:00 ps

~ ● 20:17:39
$ ps
  PID TTY          TIME CMD
 4602 pts/1    00:00:02 zsh
 5120 pts/1    00:00:00 ps

~ ● 20:17:40
$ ps -f
 UID        PID  PPID  C STIME TTY          TIME CMD
tetroner   4602    4591  0 20:13 pts/1    00:00:02 /bin/zsh
tetroner   5133    4602 99 20:17 pts/1    00:00:00 ps -f

~ ● 20:17:51
$ |

```

## c. kill

```
➤ 20:19:15
$ pskill Discord

➤ 20:19:23
$ pidsOf Discord
5558 5557 5502 5433 5432 5391 5389 5388 5384

➤ 20:19:36
$ kill 5558
kill: kill 5558 failed: no such process

➤ 20:19:43
$ pidsOf Discord
5557 5502 5433 5432 5391 5389 5388 5384

➤ 20:19:47
$ kill 5557

➤ 20:19:52
$ |
```

## d. nice

```
➤ 20:25:48
$ nice -n 18 discord
[Vencord] Starting up...
[Vencord] Loading original Discord app.asar
Discord 0.0.42
Quitting secondary instance.
blackbox: 2024-02-08T14:55:55.384Z 0

-----
blackbox: 2024-02-08T14:55:55.404Z 1 Discord starting: {"releaseChannel":"stable","version":"0.0.42"}, modulepath: /home/tetroner/.config/discord/0.0.42/modules

➤ 20:25:56
$ |
```

## e. renice

```
➜ 20:27:41
$ sudo renice 7 6600
[sudo] password for tetroner:
6600 (process ID) old priority 13, new priority 7
```

```
[6537:0288/202450.483648:ERROR:shared_image_factory.cc(575)] Could not find SharedImageBackingFactory with params: usage: Gles2|Raster|DisplayRead|Scanout, format: BGRA_8888, share_between_threads: 0, gmb_type: shared_memory
[6537:0288/202450.484985:ERROR:shared_image_factory.cc(575)] Could not find SharedImageBackingFactory with params: usage: Gles2|Raster|DisplayRead|Scanout, format: BGRA_8888, share_between_threads: 0, gmb_type: shared_memory
top - 20:26:54 up 2:27, 1 user, load average: 1.14, 1.33, 1.42
Tasks: 288 total, 2 running, 285 sleeping, 0 stopped, 1 zombie
Rcpu(s): 2.0 us, 1.7 sy, 3.6 ni, 92.1 id, 0.1 wa, 0.3 hi, 0.2 si, 0.0 st
MiB Mem : 15792.6 total, 4582.4 free, 8816.6 used, 4524.2 buff/cache
MiB Swap: 4096.0 total, 4086.0 free, 10.0 used, 7776.0 avail Mem
```

PID	USER	PR	NI	VIRT	RES	SHR	S	%CPU	%MEM	TIME+	COMMAND
6600	tetroner	33	13	1131.3g	452536	140344	S	26.8	2.8	0:43.38	Discord
6537	tetroner	33	13	32.7g	221128	150516	S	0.3	1.4	0:09.63	Discord
4234	tetroner	20	0	3738476	340780	156668	S	6.3	2.1	0:49.96	spotify
4321	tetroner	20	0	50.1g	314056	120264	S	5.0	1.9	0:55.90	spotify
1056	tetroner	9	-11	124724	37084	8440	S	3.0	0.2	0:29.44	pipewire-pulse
2449	tetroner	20	0	32.8g	523548	213988	S	1.7	3.2	4:28.67	brave
2865	tetroner	20	0	1131.4g	357264	143196	R	1.7	2.2	1:28.72	brave
741	root	20	0	24.8g	161472	96384	S	1.3	1.0	4:06.68	Xorg
1162	tetroner	20	0	2130088	241420	167912	S	1.3	1.5	4:02.83	kwin_x11
2853	tetroner	20	0	1133.5g	417432	144708	S	1.0	2.6	3:33.59	brave
4265	tetroner	20	0	2050600	261948	162936	S	0.7	1.6	0:13.03	spotify
4591	tetroner	20	0	773820	182644	127596	S	0.7	1.1	0:06.42	kitty
609	root	20	0	2166368	69660	30184	S	0.3	0.4	0:29.47	Containerd
1201	tetroner	20	0	3617816	474268	213316	S	0.3	2.9	1:54.02	plasmashell
2520	tetroner	20	0	32.4g	153280	102176	S	0.3	0.9	0:25.28	brave
4483	tetroner	20	0	1131.3g	243180	128552	S	0.3	1.5	0:48.44	brave
5790	tetroner	20	0	1131.3g	298668	130452	S	0.3	1.8	0:21.13	brave
6482	tetroner	33	13	1122.8g	233344	123360	S	0.2	1.4	0:03.11	Discord
6969	tetroner	20	0	12344	6016	3840	R	0.2	0.0	0:00.21	top
1	root	20	0	23120	13728	9968	S	0.0	0.1	0:02.17	systemd
2	root	20	0	0	0	0	S	0.0	0.0	0:00.00	kthreadd
3	root	20	0	0	0	0	S	0.0	0.0	0:00.00	pool_workqueue_release
4	root	0	-20	0	0	0	I	0.0	0.0	0:00.00	kworker/R-rcu_g
5	root	0	-20	0	0	0	I	0.0	0.0	0:00.00	kworker/R-rcu_p
6	root	0	-20	0	0	0	I	0.0	0.0	0:00.00	kworker/R-slub_
7	root	0	-20	0	0	0	I	0.0	0.0	0:00.00	kworker/R-netns
9	root	0	-20	0	0	0	I	0.0	0.0	0:00.00	kworker/0:0H-events_highpri
10	root	20	0	0	0	0	I	0.0	0.0	0:00.73	kworker/0:1-events
12	root	0	-20	0	0	0	I	0.0	0.0	0:00.00	kworker/R-mm_pg
14	root	20	0	0	0	0	I	0.0	0.0	0:00.00	rcu_tasks_kthreadd
15	root	20	0	0	0	0	I	0.0	0.0	0:00.00	rcu_tasks_rude_kthreadd
16	root	20	0	0	0	0	I	0.0	0.0	0:00.00	rcu_tasks_trace_kthreadd
17	root	20	0	0	0	0	S	0.0	0.0	0:00.04	ksoftirqd/0
18	root	-2	0	0	0	0	I	0.0	0.0	0:00.84	rcu_preempt
19	root	-2	0	0	0	0	S	0.0	0.0	0:00.00	rcub/0
20	root	rt	0	0	0	0	S	0.0	0.0	0:00.01	migration/0
21	root	-51	0	0	0	0	S	0.0	0.0	0:00.00	idle_inject/0
22	root	20	0	0	0	0	S	0.0	0.0	0:00.00	cpuhp/0
23	root	20	0	0	0	0	S	0.0	0.0	0:00.00	cpuhp/1
24	root	-51	0	0	0	0	S	0.0	0.0	0:00.00	idle_inject/1

Flameshot

## f. jobs / g. fg / h. bg / i. sleep

```
➜ 18:37:20
$ jobs
[1] + running sleep 10

➜ 18:37:21
$
[1] + 13841 done sleep 10

➜ 18:37:30
$ sleep 10
^Z
[1] + 13921 suspended sleep 10

➜ 18:37:34
$ bg
[1] + 13921 continued sleep 10

➜ 18:37:36
$
[1] + 13921 done sleep 10

➜ 18:37:42
$ sleep 10 &
[1] 14003

➜ 18:37:46
$ fg
[1] + 14003 running sleep 10

➜ 18:38:00
$
```

## j. pstree

```

$ pstree
systemd├─NetworkManager─3*[{NetworkManager}]
│   └─accounts-daemon─3*[{accounts-daemon}]
│       └─avahi-daemon─avahi-daemon
│           └─containerd─12*[{containerd}]
│               └─dbus-broker-lau─dbus-broker
│                   └─dnsmasq─dnsmasq
│                       └─dockerd─13*[{dockerd}]
│                           └─firewalld─(firewalld)
│                               └─fwupd─5*[{fwupd}]
│                                   └─kwalletd5─4*[{kwalletd5}]
│                                       └─passimind─3*[{passimind}]
│                                           └─polkitd─3*[{polkitd}]
│                                               └─python3
│                                                   └─rtkit-daemon─2*[{rtkit-daemon}]
│                                                       └─sddm─Xorg─7*[{Xorg}]
│                                                           └─sddm-helper─startplasma-x11─(startplasma-x11)
│                                                               └─(sddm)
└─systemd├─(sd-pam)
│   └─Discord─Discord─Discord─19*[{Discord}]
│       └─Discord─Discord
│           └─2*[{Discord}─5*[{Discord}]]
│               └─Discord─46*[{Discord}]
│                   └─29*[{Discord}]
│                       └─DiscoverNotifier─plasma-discover─17*[{plasma-discover}]
│                           └─9*[{DiscoverNotifier}]
│                               └─agent─3*[{agent}]
│                                   └─at-spi-bus-lau─dbus-broker-lau─dbus-broker
│                                       └─4*[{at-spi-bus-lau}]
│                                           └─baloo_file─3*[{baloo_file}]
│                                               └─baloorunner─4*[{baloorunner}]
│                                                   └─bwrap─xdg-dbus-proxy─2*[{xdg-dbus-proxy}]
│                                                       └─2*[{chrome_crashpad}─2*[{chrome_crashpad}]]
│                                                           └─code─code─code─18*[{code}]
│                                                               └─code─code─code─15*[{code}]
│                                                                   └─code─7*[{code}]
│                                                                       └─3*[{code}─7*[{code}]]
│                                                                           └─19*[{code}]
│                                                                               └─code─14*[{code}]
│                                                                                   └─code─16*[{code}]
│                                                                                       └─36*[{code}]
│                                                                                           └─dbus-broker-lau─dbus-broker
│                                                                                               └─dconf-service─3*[{dconf-service}]
│                                                                                                   └─firewall-applet─7*[{firewall-applet}]
│                                                                                                       └─flameshot─9*[{flameshot}]
│                                                                                                           └─flatpak-portal─bwrap
│                                                                                                               └─3*[{flatpak-portal}]

```

## 7)

```

~/A41 20:49:53
$ cat > test.txt
helloo
world
^C

~/A41 20:50:16
$ ls
test.txt

~/A41 20:50:19
$ cat < test.txt
helloo
world

~/A41 20:50:25
$ tata
zsh: command not found: tata

~/A41 20:50:43
$ tata 2> error.txt

~/A41 20:50:48
$ cat < error.txt
zsh: command not found: tata

~/A41 20:50:54
$ cat >> test.txt
oh my word
^C

~/A41 20:51:22
$ cat < test.txt
helloo
world
oh my word

~/A41 20:51:27
$ cat << test.txt
heredoc> Linux
heredoc>

~/A41 20:51:42
$ cat < test.txt
helloo
world
oh my word

~/A41 20:51:52

```