**Summary of Outputs If needed**

**Summary:**

* **CPU Usage**:  
  The CPU looks to be working efficiently with most of the time spent in **idle mode** (401,129 ticks). The main activity is in **user time** (256,682 ticks), and there’s hardly any time spent on I/O waits or interrupts.
* **Memory Usage**:  
  From a total of **8,282,936 kB** memory, about **2,093,068 kB** is still available. This means the system is using around **75%** of its memory, which seems okay for now.
* **Disk Usage**:  
  The disk is almost **78% full**, with **94,288 MB** used and **26,593 MB** free. While there’s still space left, this could become an issue if more storage is needed later.
* **Process Info**:  
  The system load averages for the past 1, 5, and 15 minutes are **0.52**, **0.58**, and **0.59**, which indicates the system is not under heavy load. There’s only **1 active task** out of **5 total tasks**, and the last PID recorded is **78**.
* **Network Usage**:  
  There’s no activity detected on the **eth0** interface—both sent and received data are **0 B**. It looks like there isn’t much happening on the network right now.
* **Swap Usage**:  
  The swap space usage is super low, with almost all of the **15,472,892 kB** still free (**15,415,956 kB**). This is a good sign since it means the system isn’t relying on swap memory.

**My Observations:**

The system is running smoothly with plenty of CPU, memory, and swap resources available. Disk usage is on the higher side at **78%**, but there’s enough free space for now. Network activity seems to be idle, which is expected if no network-intensive tasks are running. Overall, the system looks stable and ready for regular work or testing.

**Timestamp**

[Fri Nov 29 10:33:58 2024]

* This is the current date and time when the log was generated.
  + **Fri:** Day of the week (Friday).
  + **Nov 29:** The date (29th of November).
  + **10:33:58:** The time in 24-hour format.
  + **2024:** The year.

**CPU Usage**

CPU Usage:

- User Time: 478285 ticks

- Nice Time: 0 ticks

- System Time: 80663 ticks

- Idle Time: 1098867 ticks

- I/O Wait Time: 0 ticks

- IRQ Time: 3247 ticks

- SoftIRQ Time: 0 ticks

- Steal Time: 0 ticks

- Guest Time: 0 ticks

- Guest Nice Time: 0 ticks

The CPU usage section provides detailed statistics about how the CPU is being utilized. These values are measured in **ticks**, which represent units of CPU time (often 1/100th of a second).

* **User Time:** 478285 ticks
  + Time the CPU spent executing user-level processes (excluding processes with a "nice" priority).
* **Nice Time:** 0 ticks
  + Time the CPU spent executing user-level processes that have been assigned a "nice" priority (lower priority).
* **System Time:** 80663 ticks
  + Time the CPU spent executing system-level (kernel) processes.
* **Idle Time:** 1098867 ticks
  + Time the CPU spent idle and not running any processes.
* **I/O Wait Time:** 0 ticks
  + Time the CPU spent waiting for input/output operations to complete (e.g., waiting for disk or network data).
* **IRQ Time:** 3247 ticks
  + Time the CPU spent servicing hardware interrupts (e.g., responding to external events like a mouse click).
* **SoftIRQ Time:** 0 ticks
  + Time spent handling software interrupts (e.g., tasks deferred from hardware interrupts).
* **Steal Time:** 0 ticks
  + Time lost to other virtual machines in a virtualized environment. (Here it is 0, indicating no virtualization overhead.)
* **Guest Time:** 0 ticks
  + Time spent running a virtual machine’s processes.
* **Guest Nice Time:** 0 ticks
  + Similar to "Guest Time," but for virtual processes with "nice" priority.

**Memory Usage**

Memory Usage:

- Total Memory: 8282936 kB

- Free Memory: 2094496 kB

* **Total Memory:** 8282936 kB
  + The total amount of physical RAM available on the system, measured in kilobytes (kB). Here, it’s about 8 GB.
* **Free Memory:** 2094496 kB
  + The amount of unused RAM available for allocation, also in kilobytes. Here, about 2 GB is free.

**Disk Usage**

Disk Usage:

- Total Disk: 120881 MB

- Used Disk: 94330 MB

- Free Disk: 26551 MB

* **Total Disk:** 120881 MB
  + The total size of the storage on the root filesystem (/), measured in megabytes (MB). Here, the system has approximately 120 GB.
* **Used Disk:** 94330 MB
  + The amount of storage currently in use, in MB. About 94 GB is utilized.
* **Free Disk:** 26551 MB
  + The remaining available storage, in MB. Around 26 GB is free.

**Process Info**

Process Info:

- Load Averages: 0.52 (1 min), 0.58 (5 min), 0.59 (15 min)

- Running Tasks: 1

- Total Tasks: 5

- Last PID: 109

* **Load Averages:** 0.52 (1 min), 0.58 (5 min), 0.59 (15 min)
  + These are the average number of processes waiting for CPU time over the last 1, 5, and 15 minutes. Lower values indicate less CPU load, while values greater than the number of CPU cores may indicate CPU over-utilization.
* **Running Tasks:** 1
  + The number of processes currently running on the CPU. Here, only 1 process is actively using the CPU.
* **Total Tasks:** 5
  + The total number of tasks (processes and threads) being managed by the scheduler, including those waiting for resources or idle.
* **Last PID:** 109
  + The Process ID (PID) assigned to the most recently created process. Here, the last process created has a PID of 109.

**Network Usage**

Network Usage (eth0):

- Received: 0 B

- Sent: 0 B

* **Network Interface:** (eth0)
  + This refers to the system’s primary Ethernet network interface. If the system had a Wi-Fi interface, you might see wlan0 instead.
* **Received:** 0 B
  + Total data received on this interface, measured in bytes. Here, no data has been received.
* **Sent:** 0 B
  + Total data transmitted through this interface, also in bytes. Here, no data has been sent.

**Swap Usage**

Swap Usage:

- Total Swap: 15472892 kB

- Free Swap: 14767248 kB

* **Total Swap:** 15472892 kB
  + Total available swap space (virtual memory on disk), in kilobytes. This system has around 15 GB of swap space.
* **Free Swap:** 14767248 kB
  + Amount of unused swap space, in kilobytes. Here, about 14.7 GB of swap is free.