

Assignment:1

Task:6

Practical Guide: Checking Disk Usage with "du -h"

Introduction:

The `du -h` command is a valuable tool for checking disk space utilization on a Linux system. It provides a human-readable summary of the disk space used by directories and files. In this guide, we will explore the usage of `du -h`, understand its options, and demonstrate how to interpret its output.

Step 1: Basic Usage of `du -h`:

Open a terminal and navigate to the directory you want to analyze.

Type the following command and press Enter:

`du -h`

This will display the disk usage summary for the current directory and its subdirectories in a human-readable format.

Step 2: Checking Specific Directory:

To check the disk space utilization of a specific directory, provide the directory path as an argument. For example:

`du -h /path/to/directory`

This will display the disk usage summary for the specified directory.

Step 3: Checking Disk Usage of Specific File:

To check the disk space used by a specific file, provide the file path as an argument. For example:

`du -h /path/to/file.txt`

This will display the disk space used by the specified file.

Step 4: Sorting Output by Size:

To sort the output by size, you can use the sort command in conjunction with du -h. For example:

du -h | sort -rh

This will display the disk usage summary with the largest directories/files listed first.

Step 5: Explaining Output:

The output of du -h consists of two columns:

The first column represents the size of the directory or file.

The second column displays the directory or file path.

The -h option makes the sizes human-readable, using units such as KB, MB, GB, etc.

Step 6: Finding Largest Directories:

To find the largest directories within a directory, you can use the find command with du -h. For example:

du -h --max-depth=1 | sort -rh

This will show the sizes of immediate subdirectories, helping you identify space-consuming directories.

Conclusion:

The du -h command is a versatile tool for checking disk space utilization on a Linux system. By following this guide, you can analyze disk usage at different levels, identify space-consuming directories, and manage your disk space effectively.