# Text Manipulation

**By: Michael Ilodigwe** 



# echo | Printing Text

Displays a line of text or variables.

#### **Syntax**

• echo [options] [text]

-е	Enable interpretation of backslash escapes.	
-n	Suppress trailing newline.	
-E	Disable interpretation of backslash escapes.	



## grep Searching Text

Searches for patterns in files or output.

#### **Syntax**

• grep [options] [pattern] [filename]

-i	ignore-case: Ignore case distinctions.	
-v	invert-match: Invert the sense of matching	
-n	line-number: Display line numbers.	



## sed | Stream Editor

Edits text stream by performing operations like search, find, replace, insert, or delete.

#### **Syntax**

• sed [options] 'command' [filename]

-е	Add the script to the commands to be executed.	
-i	Edit files in place	
-n	Suppress automatic printing of pattern space.	



# awk Text Processing

Processes text files line by line and performs operations like pattern scanning and text processing.

#### **Syntax**

awk [options] 'pattern { action }' [filename]

-F	Specifies the field separator	
-V	Assigns value to a variable	
-f	Specifies a script file containing the awk commands.	



### WC Word Count

Counts the number of lines, words, and characters in a file.

#### **Syntax**

• wc [options] [filename]

-l	Prints the number of lines.	
-W	Prints the number of words.	
-c	Prints the number of bytes.	



### head command

The head command in Linux is used to display the first few lines of a file.

#### **Syntax**

• head [options] [file(s)]

-n	Specify the number of lines to display.	
Default is 10c <num></num>	Display the first <num> bytes instead of lines.</num>	



### tail command

The tail command in Linux is used to display the last few lines of a file.

#### Syntax

• tail [options] [file(s)]

-n	Specify the number of lines to display. Default is 10
-f	Follow the output of a file in real-time (like watching a log file).



### cut command

The cut is a command-line utility in Linux used to extract sections from each line of files.

#### Syntax | cut [options] [filename]

#### **Options**

-d	delimiter <delim>: Specify the delimiter character.</delim>	Default is TAB.
-f	fields <list>: Select only these fields; also print any line that contains no delimiter character, unless the -s option is specified.</list>	-f1,3 selects the first and third fields.
-c	characters <list>: Select only these characters.</list>	-c1-5 selects characters 1 to 5 of each line.
-s	only-delimited: Do not print lines not containing delimiters.	-s only prints lines with the specified delimiter.
-n	Do not split multi-byte characters.	-n avoids splitting multi-byte characters.

# Demonstrations

