# Notes 6

| Wildcard | Description |
|---|---|
| * | Matches zero or more characters in a filename |
| ? | Matches any one character in a filename |
| [acf] | Matches one of multiple characters in a filename; in this example, a, c, or f |
| [a-f] | Matches one of a range of characters in a filename; in this example, any character from a through f |
| [!a-f] | Matches filenames that don't contain a specified range of characters; in this example, filenames that don't contain a through f |

## * Wildcard

- Matches 0 to any number of character

Examples:

- list all the txt files:
    - ls*txt
    - notes.txt
    - report.txt

## ? Wildcard

- Matches only one character at a time

Examples:

- Finding single-character
    - ls file?.txt
        - file1.txt
        - file2.txt
        - fileA.txt

## [] Wildcard

- Allows me to match a range orspecific character within filenames.

Examples:

- Finding specific file variations
    - ls file[1-3].txt
        - file1.txt

- file2.txt
- file3.txt

# Brace Expansion

- helps automate repetitive tasks.

## Examples:

- create multiple directories
  - mkdir {Documents,Images,Videos}
- Generating a sequence of numbers
  - touch file_{1..5}.txt
    - generate- file_1.txt file_2.txt file_3.txt file_4.txt file_5.txt
- Combine multiple expansions
  - echo {A,B,C}{1,2}
    - output- A1 A2 B1 B2 C1 C2