1)s =**' hello '**print(s[3:8])

Output

hello

2)

s =**' hello '**.strip()  
print(s)

output

hello

3,4)

s = **' hello '**.lstrip()  
print(s)

output

hello

s = **' hello '**.rstrip()  
print(s)

hello

s = **'www.example.com'**.strip(**'com'**)  
print(s)

output

[www.example](http://www.example).

5,6)

s = **'Arthur:three!'**.lstrip(**'Arthur:'**)  
print(s)

output

ee!

s = **'Arthur:three!'**.removeprefix(**'Arthur:'**)  
print(s)

output

three!

s = **'HelloPython'**.removesuffix(**'Python'**)  
print(s)

Hello

7)

s = **'HelloPython'**.replace(**'Python'**,**'java'**)  
print(s)

Hellojava

8)

**import** re  
s = **"string methods in python"**s2 = re.sub(**"\s+"**,**"-"**,s)  
print(s2)

string-methods-in-python

9)

s = **'string methods in python'**.split()  
print(s)

['string', 'methods', 'in', 'python']

s = **'string methods in python'**.split(**' '**, maxsplit=1)  
print(s)

['string', 'methods in python']

10)

s = **'string methods in python'**.rsplit()  
print(s)

['string', 'methods', 'in', 'python']

11)

list\_of\_strings = [**'strings'**,**'methods'**,**'in'**,**'python'**]  
s = **' '**.join(list\_of\_strings)  
print(s)

strings methods in python

12,13,14)

s = **'python is awesome!'**.upper()  
print(s)

PYTHON IS AWESOME!

s = **'PYTHON IS AWESOME!'**.lower()  
print(s)

python is awesome!

s = **'python is awesome!'**.capitalize()  
print(s)

Python is awesome!

15,16)

s = **'PYTHON IS AWESOME!'**.islower()  
print(s)

False

s = **'python is awesome!'**.islower()  
print(s)

True

17,18,19)

s = **'python'**print(s.isalpha(),s.isnumeric(),s.isalnum())

True False True

s = **'123'**print(s.isalpha(),s.isnumeric(),s.isalnum())

False True True

s = **'python123'**print(s.isalpha(),s.isnumeric(),s.isalnum())

False False True

s = **'python-123'**print(s.isalpha(),s.isnumeric(),s.isalnum())

False False False

20)

n = **'hello world'**.count(**'o'**)  
print(n)

21)

2

s = **'Machine Learning'**idx = s.find(**'a'**)  
print(idx)

1

print(s[idx:])

achine learning

s = **'Machine learning'**idx = s.find(**'a'**,2)  
print(idx)

10

22)

s = **'Machine Learning'**idx = s.rfind(**'a'**)  
print(idx)

10

23,24)

s = **'Patrick'**.startswith(**'Pat'**)  
print(s)

True

s1 = **'Patrick'**.endswith(**'k'**)  
print(s1)

true

25)

s = **'Python is awesome!'**parts = s.partition(**'is'**)  
print(parts)

('Python ', 'is', ' awesome!')

s = **'Python is awesome!'**parts = s.partition(**'was'**)  
print(parts)

('Python is awesome!', '', '')

26,27,28)

s = **'Python is awesome'**s1 = s.center(30,**'-'**)  
print(s1)

------Python is awesome-------

s = **'Python is awesome!'**s1 = s.ljust(30,**'-'**)  
print(s1)

Python is awesome!------------

s = **'Python is awesome!'**s1 = s.rjust(30,**'-'**)  
print(s1)

------------Python is awesome!

29)

num = 1  
language = **'Python'**s = **f'{**language**} is the number {**num**} in programming'**print(s)

Python is the number 1 in programming

30)

s = **'HELLO world'**s1 = s.swapcase()  
print(s1)

hello WORLD

31)

s = **'42'**.zfill(5)  
print(s)

00042