

## Regular Expression in python

Regular expression or “regex” for short, are a powerful tool for working with things and text data in Python. They allow you to match and manipulate strings based on patterns, making it easy to perform complex string operations with just a few line of code.

### Metacharacters in Regular Expression

```
[ ] Represent a character class  
^ Matches the beginning  
$ Matches the end  
. Matches any character except newline  
? Matches zero or one occurrence.  
| Means OR (matches with any of the characters separated by it.  
• Any number of occurrence  
(including ) occurrence  
+ One or more occurrence  
{ } indicate number of occurrences of a preceding RE to match  
( ) Enclose a group if Res
```

### For searching a text

```
match=re.search(pattern,text)  
print(match)
```

## Source Code

```
import re
pattern=r"[A-Z]cyclone"
text='''this is a text for Cyclone and Dyclone  and more about Ccyclone and much
more.'''
matches=re.finditer(pattern,text)
for match in matches:
    print(match.span())
    print(text[match.span()[0]:match.span()[1]])
# match=re.search(pattern,text)
# print(match)
```

Thank You