

**Dictionary comprehension** is a compact way to process all or part of the elements in a sequence and return a dictionary with the results. It's like a one-line for loop that creates a new dictionary from a sequence. It uses curly braces ({}) and key-value pair in the expression.

## { key: value for ITEM in ITERABLE [if (CONDITION)] }

```
squares = {}
for n in range(5):
    squares.update({n: n ** 2})
squares
{0: 0, 1: 1, 2: 4, 3: 9, 4: 16}
{n: n ** 2 for n in range(5) }
{0: 0, 1: 1, 2: 4, 3: 9, 4: 16}
words = ['Python', 'Programming', 'artificial', 'intelligence']
{i:len(i) for i in words if len(i) > 6}
{'Programming': 11, 'artificial': 10, 'intelligence': 12}
c = ['Python', 'Programming', 'artificial', 'intelligence']
d = {'Python': 6, 'Programming': 11, 'data': 4, 'science': 7}
{i:d[i] if i in d else len(i) for i in c}
{'Python': 6, 'Programming': 11, 'artificial': 10, 'intelligence': 12}
```





## Online Resources

For best python resources, please visit:



gknxt.com/python/



