

# Python Programming Exercises and Solutions

Here you will find all the questions and answers related to Python programming exercises. The table below provides a list of Python exercises for beginners. The exercises are categorized as follows:

## List of Python Exercises and Solutions

### Basic Program

- Sum of Two Numbers in Python
- Multiplication Table in Python
- Subtract Two Numbers in Python
- Division of Two Numbers in Python
- Multiplication of Two Numbers in Python
- Min and Max Numbers Using a User-defined Function in Python
- Minimum and Maximum of a List of Numbers in Python
- Generate a Random Number in Python
- Convert Kilometers to Miles in Python
- Print Output Without a Newline in Python
- Python Program to Make a Simple Calculator
- Create Calculator Using Eval in Python

### Object Oriented

- Get the Class Name of an Instance in Python
- Differentiate Between Type() and Isinstance() in Python

## Functions

- Display Powers of 2 Upto N Numbers in Python
- Display Powers of 2 Using Normal Function in Python
- Display Powers of 2 Using Anonymous Function in Python
- Find Numbers Divisible by Another Number in Python
- Convert Decimal to Binary, Octal and Hexadecimal in Python
- Find Ascii Value of Character in Python
- Shuffle Deck of Cards in Python
- Display Calendar in Python
- Gcd of Two Numbers in Python Using Recursion
- Gcd of Two Numbers in Python Using in-build Function
- Lcm of Two Numbers in Python Using While Loop
- Lcm of Two Numbers in Python Using Recursion
- Find Sum of Natural Numbers in Python Using Recursion
- Find Factorial of Number in Python Using Recursion
- Convert Decimal to Binary in Python Using Recursion
- Return Multiple Values From a Function in Python
- Temperature Conversion Program in Python
- Quadratic Equation in Python Without Lambda
- Leap Year Program In Python
- Leap Year Program in Python Using If Else
- Check Leap year from Logical operator in a single line in Python
- Pre-defined Function to Check Leap Year in Python
- Convert Binary to Decimal in Python
- Pascal Triangle In Python
- Pascal Triangle In Python Using the Powers of 11

## Decision Making and Loops

- Factorial of the Number in Python Using in-built Function
- Factorial of the Number in Python Using While Loop
- Factorial of the Number in Python Using for Loop
- Factorial of a Number in Python Using Recursion
- Check if a Number is Positive, Negative or 0 in Python
- Find the Largest Among Three Numbers in Python
- Print All Prime Numbers in a Range Using Python

- Print the Fibonacci Sequence in Python Using While Loop
- Print the Fibonacci Sequence in Python Using for Loop
- Display Fibonacci Sequence in Python Using Recursion
- Check Armstrong Number in Python Using Function
- Check Armstrong Number in Python Using Recursion
- Find the Sum of Natural Numbers in Python
- Iterate Over Dictionaries in Python Using Keys() Function
- Iterate Over Dictionaries in Python Using for Loop
- Iterate Over Dictionaries in Python Using Values() Function
- Iterate Over Dictionaries in Python Using Items() Function
- Iterate Over Dictionaries in Python Using Both Key() & Value() Function
- Iterate Over Dictionaries in Python and Print Items in Key-value in Pair
- Iterate Over Dictionaries in Python & Unpack the Dictionaries
- Reverse a Number in Python Using for Loop
- Reverse a Number in Python Using While Loop
- Reverse a Number in Python Using String Slicing
- Reverse a Number in Python Using Recursion
- Compute the Power of a Number in Python
- Star Pattern in Python Using Loops in Python
- Printing Number Patterns in Python
- Alphabet Pattern Programs in Python
- Count Vowels in a String Python in Python
- Count Vowels From a String In Python Using Comprehension Method
- Count Vowels From a String In Python Using Recursive Method
- Count Vowels From a String in Python Using Iterative Method
- Count Alphabets in a String in Python

# Native Data types

- Add Two Matrices in Python
- Transpose a Matrix in Python
- Multiply Two Matrices in Python
- Check Whether a String is Palindrome or Not in Python
- Remove Punctuations From a String in Python
- Remove Punctuations From a String in Python Using String Package
- Remove Punctuations From a String in Python Using Regular Expressions
- Sort Words in Alphabetic Order in Python
- Illustrate Different Set Operations in Python
- Merge Two Dictionaries in Python
- Access Index of a List in Python Using for Loop
- Flatten a Nested List in Python Using a List Comprehension
- Flatten a Nested List in Python Using Nested for Loops
- Flatten a Nested List in Python Using Itertools Package
- Flatten a Nested List in Python Using in-build Sum() Method
- Flatten a Nested List in Python Using Lambda and Reduce()
- Slice Lists in Python
- Sort a Dictionary by Value in Python
- Check if a List is Empty or Not in Python
- Check if a List is Empty or Not in Python Using Len() Function
- Check if a List is Empty or Not in Python by Comparing an Empty List
- Check if a List is Empty or Not in Python Using `_len_()`
- Check if a List is Empty or Not in Python Using Numpy Module
- Concatenate Two Lists Using + Operator in Python
- Concatenate Two Lists Using Iterable Unpacking Operator \* in Python
- Concatenate Two Lists With Unique Values in Python
- Concatenate Two Lists Using Extend() in Python
- Check if a Key is Already Present in a Dictionary Using in Keyword in Python
- Check if a Key is Already Present in a Dictionary Using Get() in Python
- Check if Key Exists in Dictionary Python Using Keys()

- Check if a Key is Already Present in a Dictionary Using Count() Method in Python
- Split a List Into Evenly Sized Chunks in Python Using Yield
- Split a List Into Evenly Sized Chunks in Python Using for Loop
- Split a List Into Evenly Sized Chunks in Python Using List Comprehension
- Split a List Into Evenly Sized Chunks in Python Using Numpy
- Split a List Into Evenly Sized Chunks in Python Using itertools
- Split a List Into Evenly Sized Chunks in Python Using Collections
- Split a List Into Evenly Sized Chunks Using Partial assignment in python
- Convert String to Float in Python
- Convert String Float Numeral Into Float in Python
- Convert a String Into an Integer in Python
- Convert a String Float Numeral Into an Integer in Python
- Print Colored Text to the Terminal in Python
- Convert String to Date time in Python
- Find the Last Element of a List in Python Using Negative Indexing
- Find the Last Element of a List in Python Using Slicing
- Find the Last Element of a List in Python Using pop() Function
- Find the Last Element of a List in Python Using for Loop
- Get a Substring of a String in Python
- Randomly Select Element From List in Python Using randrange()
- Randomly Select Element From List in Python Using sample()
- Randomly Select Element From List in Python Using choices()
- Check if a String is a Number (Float) in Python
- Count Occurrences of Items in a Python List Using Loop
- Count Occurrences of Items in a Python List Using count()
- Count Occurrences of Items in a Python List Using counter()
- Count Occurrences of Items in a Python List Using countof()
- Count Occurrences of Items in a Python List Using Comprehension
- Count Occurrences of Items in a Python List Using Pandas Library
- Delete an Element From a Dictionary in Python Using Del Statement
- Delete an Element From a Dictionary in Python Using clear()
- Create a Long Multiline String in Python Using Triple Quotes
- Create a Long Multiline String in Python Using Parentheses & Single/Double Quotes

- Create a Long Multiline String in Python Using \ (Backslash)
- Convert Two Lists Into a Dictionary in Python Using for Loop
- Convert Two Lists Into a Dictionary in Python Using Dictionary Comprehension
- Convert Two Lists Into a Dictionary in Python Using zip() Function
- Convert Two Lists Into a Dictionary in Python Using map() Function
- Convert Two Lists Into a Dictionary in Python Using enumerate() Function
- Remove Whitespace From String in Python Using strip() Function
- Remove Whitespace From String in Python Using Regular Expression
- Iterate Through Two Lists in Parallel Python Using zip()
- Iterate Through Two Lists in Parallel Python Using itertools
- Iterate Through Two Lists in Parallel Python Using itertools.zip\_longest()
- Count Number of Digits in a Number in Python Using While Loop
- Count Number of Digits in a Number in Python Using inbuilt Method
- Check if Two Strings Are Anagrams in Python Using sorted() Function
- Check if Two Strings Are Anagrams in Python Using counter()
- Check if Two Strings are Anagrams in Python Using sort()
- Capitalize the First Character of a String in Python Using capitalize()
- Capitalize the First Character of a String in Python Using upper()
- Capitalize the First Character of a String in Python Using str.title()
- Capitalize the First Letter of Each Word in Python Using capitalize()
- Capitalize the First Letter of Each Word in Python Using string.capwords()
- Capitalize the First Letter of Each Word in Python Using RegExp
- Capitalize the First Letter of Each Word in Python Using title()
- Capitalize the First Letter of Every Word in the File Using title() in Python
- Find All the Permutation of a String in Python Using a Naive Method
- Find All the Permutation of a String in Python Using itertools
- Count the Number of Occurrence of a Character in String Using Python
- Count the Number of Occurrences of a Character in a String in Python Using count()
- Remove Duplicate Elements From a List in Python Using \*set()

- Remove Duplicate Elements From a List in Python Using list comprehension
- Remove Duplicate Elements From a List in Python Using set()
- Remove Duplicate Elements From a List in Python Using list comprehension
- Remove Duplicate Elements From a List in Python Using set()
- Remove Duplicate Elements From a List in Python Using enumerate()
- Remove Duplicate Elements From a List in Python Using OrderedDict.fromkeys()
- Remove Duplicate Elements From a List in Python Using in, not in Operators
- Remove Duplicate Elements From a List in Python Using Array.index()
- Remove Duplicate Elements From a List in Python Using Counter()
- Remove Duplicate Elements From a List in Python Using numpy
- Merge Lists in Python

## Files

- Copy a File in Python
- Append to a File in Python
- Find Hash of File in Python
- Get the File Name From the File Path in Python
- Get Line Count of a File in Python
- Check the File Size in Python
- Catch Multiple Exceptions in One Line in Python
- Python Program Read a File Line by Line Into a List in Python
- Find the Size (Resolution) of an Image in Python
- Get Extension of File in Python
- List All Txt Files in a Directory in Python
- Get File Creation and Modification Date in Python
- Current Working Directory in Python

## Advanced

- [Enum in Python](#)
- [Create a Countdown Timer in Python](#)
- [Convert Bytes to a String in Python](#)

## Python Programming Exercises and Solutions for Beginners

The importance of [Python Programming Exercises and Solutions](#) for beginners and experienced programmers are equally vital. With the help of these activities, you can broaden your intellectual horizons, sharpen your technological abilities, and prepare for job applications.

Exercises are an important instrument to help you better your coding abilities, acquire confidence, and prepare for real-world scenarios.