

# Getting Started with Files

**Spoken Tutorial Project**

**<http://spoken-tutorial.org>**

**National Mission on Education through ICT**

**<http://sakshat.ac.in>**

**Script:Thirumalesh H S**

**Narrator:Trupti Kini**

**IIT Bombay**

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# Objectives



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- ▶ **Open a file**



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- ▶ **Open a file**
- ▶ **Read the contents of the file line by line**



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- ▶ Open a file
- ▶ Read the contents of the file line by line
- ▶ Read the entire content of the file at once



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- ▶ Open a file
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- ▶ Read the entire content of the file at once
- ▶ **Append the lines of a file to a list**



# Objectives

- ▶ Open a file
- ▶ Read the contents of the file line by line
- ▶ Read the entire content of the file at once
- ▶ Append the lines of a file to a list
- ▶ Close the file



# System Specifications





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- ▶ **Ubuntu Linux 16.04 operating system**



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- ▶ **Python 3.4.3**



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- ▶ **Python 3.4.3**
- ▶ **IPython 5.1.0**



# Pre-requisite

**To practice this tutorial, you should know about -**



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To practice this tutorial, you should know about -

- ▶ **Lists**



# Pre-requisite

To practice this tutorial, you should know about -

- ▶ Lists
- ▶ for statement



# Pre-requisite

To practice this tutorial, you should know about -

- ▶ Lists
- ▶ for statement

If not, see the pre-requisite Python tutorials on <http://spoken-tutorial.org>



# Open a file





# Open a file

**Syntax :**

```
file_object = open(filename, mode)
```



# Open a file

**Syntax :**

**file\_object = open(filename, mode)**

- ▶ **Filename - name of the file to be opened**



# Open a file

## Syntax :

`file_object = open(filename, mode)`

- ▶ **Filename** - name of the file to be opened
- ▶ **Mode** - indicates how the file is going to be opened



# Open a file

## Syntax :

`file_object = open(filename, mode)`

- ▶ **r** - Read mode
- w** - Write mode
- a** - Appending mode
- r+** - Read and Write



# Exercise 1

Re-open the file `pendulum.txt` with `f` as the file object



# Summary



# Summary

- ▶ Open and close files using the **open** and **close** methods respectively
- ▶ Read the data in the files as a whole, by using the **read** method



# Summary

- ▶ Read the data in the files line by line by iterating over the file object using the **for** loop
- ▶ Append the lines of a file to a list using the **append** method within the **for** loop





# Assignment

## 1. The **open** function returns a

- ▶ string
- ▶ list
- ▶ file object
- ▶ function



# Assignment

## 2. What does the function `splitlines()` do?

- ▶ Displays the data as strings, all in a line
- ▶ Displays the data line by line as strings
- ▶ Displays the data line by line but not as strings



# Solutions

1. **open** function returns a file object
2. **splitlines()** displays the data line by line as strings



# Forum to answer questions

- ▶ **Do you have questions in THIS Spoken Tutorial?**
- ▶ **Choose the minute and second where you have the question.**
- ▶ **Explain your question briefly.**
- ▶ **Someone from the FOSSEE team will answer them. Please visit**

<http://forums.spoken-tutorial.org/>



# Forum to answer questions

- ▶ Questions not related to the Spoken Tutorial?
- ▶ Do you have general / technical questions on the Software?
- ▶ Please visit the FOSSEE Forum  
<http://forums.fossee.in/>
- ▶ Choose the Software and post your question.



# Textbook Companion Project

- ▶ The FOSSEE team coordinates coding of solved examples of popular books
- ▶ We give honorarium and certificate to those who do this

For more details, please visit this site:

<http://tbc-python.fossee.in/>



# Acknowledgements

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- ▶ **It is supported by the National Mission on Education through ICT, MHRD, Government of India**
- ▶ **More information on this Mission is available at:**

<http://spoken-tutorial.org/NMEICT-Intro>



# THANK YOU!

For more Information, visit our website  
<http://fossee.in/>

