

### **1)What is a sklearn in Python?**

What is scikit-learn or sklearn? Scikit-learn is probably the most useful library for machine learning in Python. The sklearn library contains a lot of efficient tools for machine learning and statistical modeling including classification, regression, clustering and dimensionality reduction.

### **2)What is import sklearn in Python?**

Scikit-learn is a machine learning library for Python. It features several regression, classification and clustering algorithms including SVMs, gradient boosting, k-means, random forests and DBSCAN. It is designed to work with Python Numpy and SciPy.

### **3)Is sklearn a library or framework?**

scikit-learn is a high level framework designed for supervised and unsupervised machine learning algorithms. Being one of the components of the Python scientific ecosystem, it's built on top of NumPy and SciPy libraries, each responsible for lower-level data science tasks.

### **4)How Python is used in machine learning?**

Python offers all the skillsets that are required for a machine learning or AI project - stability, flexibility and a large number of tools. Python helps developers to be productive and confident about the product that they are

manufacturing, from the stages of development to deployment and till the maintenance stage.

### **5)Should I use TensorFlow or Sklearn?**

Image result for tensorflow python  
Scikit-learn and TensorFlow were designed to assist developers in creating and benchmarking new models, so their functional implementations are very similar, with the exception that Scikit-learn is used in practice with a broader range of models, whereas TensorFlow's implied use is for neural networks.

### **6)What is a TensorFlow in Python?**

TensorFlow is a Python-friendly open source library for numerical computation that makes machine learning and developing neural networks faster and easier

### **7)What is TensorFlow used for?**

The TensorFlow platform helps you implement best practices for data automation, model tracking, performance monitoring, and model retraining. Using production-level tools to automate and track model training over the lifetime of a product, service, or business process is critical to success.

## **8)Can we use Python for deep learning?**

Python is a general-purpose high level programming language that is widely used in data science and for producing deep learning algorithms.

## **9)How do I use deep learning in Python?**

Deep Learning With Python Demo: Predict Handwritten Digits

- 1.Import the required libraries.
- 2.Load the dataset.
- 3.Check the total number of training and testing samples.
- 4.Visualize the data.
- 5.Build the model.
- 6.Loss and Optimization.
- 7.Test the model and find the accuracy.

## **10)Which Python IDE is best for deep learning?**

Top Python IDEs

IDLE. IDLE (Integrated Development and Learning Environment) is a default editor that accompanies Python. ...

PyCharm. PyCharm is a widely used Python IDE created by JetBrains. ...

Visual Studio Code. Visual Studio Code is an open-source (and free) IDE created by Microsoft.

...

\*Sublime Text 3. ...

- \*Atom. ...
- \*Jupyter. ...
- \*Spyder. ...
- \*PyDev.

## **11)What is Natural Processing?**

Natural language processing (NLP) is a field that focuses on making natural human language usable by computer programs. NLTK, or Natural Language Toolkit, is a Python package that you can use for NLP. A lot of the data that you could be analyzing is unstructured data and contains human-readable text.

## **12)How do I learn NLP in Python?**

You can join one or two courses from this list to start your NLP journey online.

- 1.NLP – Natural Language Processing with Python [ Udemy] ...
- 2.Natural Language Processing Specialization – Coursera. ...
- 3.Data Science: Natural Language Processing (NLP) in Python. ...
- 4.Hands-On Natural Language Processing (NLP) using Python.

## **13)What are the 5 steps in NLP?**

5 Phases of NLP

- \*Lexical or Morphological Analysis. Lexical or Morphological Analysis is the initial step in NLP. ...

- \*Syntax Analysis or Parsing. ...

- \*Semantic Analysis. ...
- \*Discourse Integration. ...
- \*Pragmatic Analysis

#### **14)What does spaCy do in Python?**

spaCy is a free, open-source library for NLP in Python. It's written in Cython and is designed to build information extraction or natural language understanding systems. It's built for production use and provides a concise and user-friendly API.

#### **15)What is spaCy and NLTK?**

NLTK was built by scholars and researchers as a tool to help you create complex NLP functions. It almost acts as a toolbox of NLP algorithms. In contrast, spaCy is similar to a service: it helps you get specific tasks done. Due to this difference, NLTK and spaCy are better suited for different types of developers.

#### **16)Why do we use spaCy?**

Image result for what is spacy in python  
spaCy is designed specifically for production use and helps you build applications that process and "understand" large volumes of text. It can be used to build information extraction or natural language understanding systems, or to pre-process text for deep learning

### **17)What is Rasa framework in python?**

Image result for rasa framework python

Rasa is a tool to build custom AI chatbots using Python and natural language understanding (NLU). Rasa provides a framework for developing AI chatbots that uses natural language understanding (NLU). It also allows the user to train the model and add custom actions

### **18)What is Rasa framework used for?**

Image result for rasa framework python

Rasa is a framework for developing AI powered, industrial grade chatbots. It's incredibly powerful, and is used by developers worldwide to create chatbots and contextual assistants. In this project, we are going to understand some of the most important basic aspects of the Rasa framework and chatbot development.

### **19)What does OpenCV-Python do?**

Image result for opencv python

OpenCV is a Python library that allows you to perform image processing and computer vision tasks. It provides a wide range of features, including object detection, face recognition, and tracking.

## **20) Is Python good for OpenCV?**

Python is well-suited for implementing new features. Libraries like OpenCV are written in C++ and make Python have slower runtime as it will still call C/C++ libraries. This means you will have the development advantage from Python while you can have performance optimization from C++.

## **21) What is ANN in Python?**

Image result for ann python  
ANN Visualizer is a python library that enables us to visualize an Artificial Neural Network using just a single line of code. It is used to work with Keras and makes use of python's graphviz library to create a neat and presentable graph of the neural network you're building.

## **22) What is CNN in python?**

We have 4 steps for convolution: Line up the feature and the image. Multiply each image pixel by corresponding feature pixel. Add the values and find the sum. Divide the sum by the total number of pixels in the feature.

### **23)What is RNN in Python?**

Recurrent neural networks (RNN) are a class of neural networks that is powerful for modeling sequence data such as time series or natural language.

### **24)Build a Chatbot With Python**

- 1.Demo.
- 2.Project Overview.
- 3.Prerequisites.
- 4.Step 1: Create a Chatbot Using Python ChatterBot.
- 5.Step 2: Begin Training Your Chatbot.
- 6.Step 3: Export a WhatsApp Chat.
- 7.Step 4: Clean Your Chat Export.
- 8.Step 5: Train Your Chatbot on Custom Data and Start Chatting.

### **25)How Python is used in chatbot?**

ChatterBot Library:

This feature allows developers to build chatbots using python that can converse with humans and deliver appropriate and relevant responses. Not just that, the ML algorithms help the bot to improve its performance with experience.