

# **Machine Learning Foundation**

## **Instructors:**

### **krish naik:**

Having 10+ years of experience in Data Science and Analytics with product architecture design and delivery. Worked in various product and service based Company. Having an experience of 5+ years in educating people and helping them to make a career transition.

## **Curriculum:**

### **Complete Road Map To Be Expert In Python- Follow My Way**

- Introduction Preview

### **Complete Roadmap To Follow To Prepare Machine Learning With All Videos And Materials**

### **Tutorial 1- Anaconda Installation and Python Basics**

### **Why Python is the Best Programming Language For Machine Learning?**

### **Tutorial 2 - Python List and Boolean Variables**

### **Tutorial 3- Python Sets, Dictionaries and Tuples**

### **Tutorial 4 - Numpy and Inbuilt Functions Tutorial**

**Tutorial 5- Pandas, Data Frame and Data Series Part-1**

**Tutorial 6- Pandas,Reading CSV files With Various Parameters- Part 2**

**Tutorial 7- Pandas-Reading JSON,Reading HTML, Read PICKLE, Read EXCEL Files- Part 3**

**Tutorial 8- Matplotlib (Simple Visualization Library)**

**Tutorial 9- Seaborn Tutorial- Distplot, Joinplot, Pairplot Part 1**

**Tutorial 10- Seaborn- Countplot(), Violinplot(), Boxplot()- Part2**

**How To Become Expertise in Exploratory Data Analysis**

**Tutorial 11-Exploratory Data Analysis(EDA) of Titanic dataset**

**Tutorial 12- Python Functions, Positional and Keywords Arguments**

**Tutorial 13- Python Lambda Functions**

**Tutorial 15- Map Functions using Python**

**Tutorial 16- Filter Functions In Python**

**Tutorial 17- Python List Comprehension**

**Tutorial 18- Python Advanced String Formatting**

**Tutorial 19- Python Iterables vs Iterators**

**Tutorial 20- How To Import All Important Python Data Science Libraries Using Pyforest**

**Tutorial 21- Python OOPS Tutorial- Classes, Variables, Methods and Objects**

**Advanced Python- Exception Handling Detailed Explanation In Python**

**Advanced Python Series- Custom Exception Handling In Python**

**Advance Python Series- Public Private And Protected Access Modifiers**

**Tutorial 22-Univariate, Bivariate and Multivariate Analysis- Part1 (EDA)-Data Science**

**Tutorial 23-Univariate, Bivariate and Multivariate Analysis- Part2 (EDA)-Data Science**

**Tutorial 24- Histogram in EDA- Data Science**

**Tutorial 24-Z Score Statistics Data Science**

**Tutorial 25- Probability Density function and CDF- EDA-Data Science**

**Tutorial 26- Linear Regression Indepth Maths Intuition- Data Science**

**Tutorial 27- Ridge and Lasso Regression Indepth Intuition- Data Science**

**Tutorial 28- Ridge and Lasso Regression using Python and Sklearn**

**Multiple Linear Regression using python and sklearn**

**Tutorial 28-MultiCollinearity In Linear Regression- Part 2**

**Machine Learning-Bias And Variance In Depth Intuition| Overfitting Underfitting**

**Tutorial 29-R square and Adjusted R square Clearly Explained| Machine Learning**

**Tutorial 31- Hypothesis Test, Type 1 Error, Type 2 Error**

**Tutorial 32- All About P Value,T test,Chi Square Test, Anova Test and When to Use What?**

**Tutorial 33- P Value,T test, Correlation Implementation with Python- Hypothesis Testing**

**Tutorial 33- Chi Square Test Implementation with Python- Hypothesis Testing- Part 2**

**Tutorial 34- Performance Metrics For Classification Problem In Machine Learning- Part1**

**Tutorial 35- Logistic Regression Indepth Intuition- Part 1| Data Science**

**Tutorial 36- Logistic Regression Indepth Intuition- Part 2| Data Science**

**Tutorial 36- Logistic Regression Mutliclass Classification(OneVsRest)- Part 3| Data Science**

**Tutorial 37: Entropy In Decision Tree Intuition**

**Tutorial 38- Decision Tree Information Gain**

**Tutorial 39- Gini Impurity Intuition In Depth In Decision Tree**

**Tutorial 40- Decision Tree Split For Numerical Feature**

**Advance House Price Prediction- Exploratory Data Analysis- Part 1**

**Advance House Price Prediction- Exploratory Data Analysis- Part 2**

**Advance House Price Prediction-Feature Engineering Part 1**

**Advance House Price Prediction-Feature Engineering Part 2**

**Advance House Price Prediction-Feature Selection**

**Tutorial 41-Performance Metrics(ROC,AUC Curve) For Classification Problem In Machine Learning Part 2**

**Performance Metrics On MultiClass Classification Problems**

**K Nearest Neighbor classification with Intuition and practical solution**

**K Nearest Neighbour Easily Explained with Implementation**

**Tutorial 42 - Ensemble: What is Bagging (Bootstrap Aggregation)?**

**Tutorial 43-Random Forest Classifier and Regressor**

**Tutorial 45-Handling imbalanced Dataset using python- Part 1**

**Tutorial 46-Handling imbalanced Dataset using python- Part 2**

**Hyperparameter Optimization for Xgboost**

**What is AdaBoost (BOOSTING TECHNIQUES)**

**Visibility Climate Prediction- You Can Add This In Your Resume**

**Euclidean Distance and Manhattan Distance**

**K Means Clustering Intuition**

**Hierarchical Clustering intuition**

**DBSCAN Clustering Easily Explained with Implementation**

**Silhouette (clustering)- Validating Clustering Models- Unsupervised Machine Learning**

**Curse of Dimensionality Easily explained| Machine Learning**

**Dimensional Reduction| Principal Component Analysis**

**Principle Component Analysis (PCA) using sklearn and python**

**What is Cross Validation and its types?**

**Tutorial 42-How To Find Optimal Threshold For Binary Classification - Data Science**

**Tutorial 47- Bayes' Theorem| Conditional Probability- Machine Learning**

**Tutorial 48- Naive Bayes' Classifier Indepth Intuition- Machine Learning**

**Tutorial 49- How To Apply Naive Bayes' Classifier On Text Data (NLP)- Machine Learning**

**Support Vector Machine (SVM) Basic Intuition- Part 1| Machine Learning**

**Maths Intuition Behind Support Vector Machine Part 2 | Machine Learning Data Science**

**Gradient Boosting In Depth Intuition- Part 1 Machine Learning**

**Gradient Boosting Complete Maths Indepth Intuition Explained| Machine Learning- Part2**

**Xgboost Classification Indepth Maths Intuition- Machine Learning Algorithms**

**Xgboost Regression In-Depth Intuition Explained- Machine Learning Algorithms**

**Data Science In Medical-Live Tracking Of CO--VID Cases In India using Python**

**Perform EDA In Seconds With Visualization Using SweetViz Library**

**4 End To End Projects Till Deployment For Beginners In Data Science| All You Have To Do Is Learn**

**Deploy Machine Learning Models Using StreamLit Library- Data Science**

**Perform Exploratory Data Analysis In Minutes- Data Science| Machine Learning**

**Pandas Visual Analysis- Perform Exploratory Data Analysis In A Single Line Of Code**

**How To Read And Process Huge Datasets in Seconds Using Vaex Library| Data Science| Machine Learning**

**D-Tale The Best Library To Perform Exploratory Data Analysis Using Single Line Of Code**

**Interview Prep Day3-How To Prepare Support Vector Machines Important Questions In Interviews**

**Google Datasets Search Engine- Search All Datasets From One Place For Data Science,Machine Learning**

**How To Run Flask In Google Colab**

**Time Series Forecasting Using Facebook FbProphet**

**Performance Metrics Interview Questions- Data Science**



**How To Perform Post Pruning In Decision Tree? Prevent Overfitting- Data Science**

**How To Train Machine Learning Model Using CPU Multi Cores**

**Step By Step Process To Learn Machine Learning Algorithm Efficiently**

**Data Science Is Just Not About Model Building**

**How To Interpret The ML Model? Is Your Model Black Box? Lime Library**

**6 Healthcare End To End Machine Learning Projects- Credits Devansh and Bedanta**

**Overfitting, Underfitting And Data Leakage Explanation With Simple Example**

**What Is API? Application Programming Interface And Why It Is Important-Data Science**

**500+ Machine Learning And Deep Learning Projects All At One Place**

**Google Colab Pro Vs Colab Free- Benefits Of Using Colab Pro- How To Access From India**