PYTHON – WORKSHEET 1

- **1.** %
- **2.** 0
- **3.** 24
- **4.** 2
- **5.** 6
- **6.** The finally block will be executed no matter if the try block raises an error or not
- **7.** It is used to raise an exemption
- **8.** In defining an iterator
- 9. _abc and abc2
- 10. Yield and raise

STATISTICS WORKSHEET-1

- **1.** True
- **2.** Central Limit Theorem
- **3.** Modelling Bounded Data
- **4.** All of the mentioned above
- **5.** Poisson
- **6.** False
- **7.** Hypothesis
- **8.** 0
- **9.** Outliers cannot conform to the regression relationship

10. Normal Distribution:

- Also known as Guassian distribution
- Continous distribution
- Every event is independent of each other
- Referred to as Bell curve
- Half of the values falls to either side of the mean
- **11.** Ways to handle missing data

- Use deletion of data in certain datasets.
- Use regression analysis to eliminate data
- Use mean or mode imputation to best fill the data

12. A/B Testing

Split testing. Known as Randomized Experimentation Process.

It splits the data into 2groups to test different variations, so as to check which achieves better result .

13. Is mean imputation of missing data acceptable practice?

In general it is not accepted widely since it is unbiased and does not preserve the relationship of the variables.

14. Linear Regression

Used to predict the values of a variable(dependent variable) with the use of value of another variable(independent variable).

15. Types of Statistics

Discriptive Statistics Inferential Statistics.

MACHINE LEARNING

- 1. Least Square Error
- 2. Linear Regression is sensitive to oultiers
- 3. Negative
- 4. Correlation
- 5. Low Bias and high variance
- 6. Predictive Model
- 7. Regularization
- 8. SMOTE
- 9. Sensitivity and precision
- 10. False

11. All of the above

12. We don't have to choose the learning rate,
It becomes slow when number of features is very large.

13. Regularization:

Used to calibrate Machine Learning model to minimize the adjusted loss and underfitting and overfitting.

It decreases the complexity of the model.

14. Algorithms are used for regularization

Regularization uses 3 algorithms

Ridge Regression

Lasso Regression

Dropout

15. Error in linear regression equation:

Error is the actual difference between the original value and predicted value. Milmising the error is the major task .