**ClassWork Tasks - Day 1**

**Q1: What is the average score of students?**

**Q2: Use an IF condition to categorize students as Pass/Fail (score ≥ 50).**

**Q3: How would you sort this data by score in descending order?**

**Q4: Which city has the highest number of students?**

**Q5: Calculate mean, median, and mode of scores**

**Q6: Identify outliers using 1.5×IQR rule**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Name** | **Gender** | **Age** | **Score** | **Preferred Language** | **City** |
| **Aamir** | **Male** | **21** | **91** | **Python** | **Delhi** |
| **Sara** | **Female** | **22** | **89** | **Java** | **Mumbai** |
| **Zoya** | **Female** | **20** | **82** | **SQL** | **Delhi** |
| **Mubeen** | **Male** | **23** | **76** | **Python** | **Hyderabad** |
| **Ali** | **Male** | **24** | **67** | **R** | **Hyderabad** |
| **Ifrah** | **Female** | **21** | **52** | **Python** | **Mumbai** |
| **Rehan** | **Male** | **22** | **45** | **SQL** | **Chennai** |
| **Fatima** | **Female** | **23** | **34** | **Java** | **Delhi** |

**Answer:  
Q1: What is the average score of students?**

=AVERAGE(D2:D9)

**Q2: Use an IF condition to categorize students as Pass/Fail (score ≥ 50).**

=ARRAYFORMULA(IF(D2:D9<>"", IF(D2:D9>=50, "PASS", "FAILED"), ""))

**Q3: How would you sort this data by score in descending order?**

=SORT(D2:D9,d,FALSE)

**Q4: Which city has the highest number of students?**

=INDEX(F2:F9,Mode(MATCH(F2:F9,F2:F9,0)))

**Q5: Calculate mean, median, and mode of scores**

=AVERAGE(D2:D9)

=MODE(D2:D9)  
=MEDIAN(D2:D9)

**Q6. Identify outliers using 1.5×IQR rule**

**Steps to use identify outliers.  
Arrange the data into ascending order  
Find the Q1, Q2  
Calculate IQR =Q3-Q1.**