BCM SCHOOL, BASANT AVENUE, DUGRI ROAD, LUDHIANA

CLASS X – ASSIGNMENT ANSWER KEY

Q1: Assertion – Reasoning Questions and Multiple Choice Questions

- i) A. Both A and R are true, and R is the correct explanation of A
- ii) A. Both A and R are true, and R correctly explains A
- iii) C. A is true, R is false
- iv) C. Graphic style
- v) C. File → Export directly as a template

Q2: Short / Medium Answer Questions

1. Difference between "Keep scale size" and "Keep ratio"?

- Keep Scale Size: Maintains the original size of the image or object while adjusting resolution or scaling attributes.
- Keep Ratio: Maintains the proportional relationship between width and height when resizing an image or object, preventing distortion.

2. Define Referential integrity in DBMS

Referential integrity ensures that relationships between tables remain consistent. It means that a foreign key in one table must either match a primary key in another table or be NULL — preventing invalid or orphan records.

3. Explain the use of Scenarios and Multiple Operations in spreadsheet "What-If" analysis.

- Scenarios: Allow users to create and save different sets of input values and compare outcomes easily.
- Multiple Operations: Enable analyzing how changing one or two variables across multiple inputs affects the result.

4. What is a foreign key in a relational table? With example, show how it links two tables.

A foreign key is a field in one table that refers to the primary key of another table, establishing a relationship between them.

Example:

Student (StudentID, Name, Class)

Enrollment (EnrollID, StudentID, CourseCode)

Here, StudentID in Enrollment is a foreign key linking it to StudentID in Student table.

Q3: Five-Mark Question

5. You have two tables in a database:

Student (StudentID, StudentName, Age, Class)

Enrollment (EnrollID, StudentID, CourseCode, EnrollmentDate)

- a) Primary key in each table:
- Student \rightarrow StudentID
- Enrollment → EnrollID
- b) Foreign key in Enrollment:
- StudentID acts as a foreign key as it refers to StudentID in the Student table.
- c) Define attribute:

An attribute is a column or field in a table that represents a specific property of an entity. Example: StudentName is an attribute of the Student entity.

d) Constraint preventing orphan records:

Referential Integrity Constraint (ON DELETE CASCADE or ON DELETE RESTRICT) ensures that no orphan records remain in Enrollment.