

1- For each attribute of a relation, there is a set of permitted values, called the ... of that attribute.

- a. Domain
- b. Relation
- c. Set
- d. Schema

2- Database ... , which is the logical design of the database, and the database ..., which is a snapshot of the data in the database at a given instant in time.

- a. instance, schema
- b. relation, schema
- c. Relation, domain
- d. schema, instance.

3- The tuples of the relations can be of ... order.

- a. any
- b. same
- c. sorted
- d. constant

4- Which of the following is a set of one or more attributes taken collectively to uniquely identify a record?

- a. candidate key
- b. sub key
- c. super key
- d. foreign key

5- An attribute in a relation is a foreign key if the ... key from one relation is used as an attribute in that relation.

- a. candidate
- b. super
- c. primary
- d. sub

6- tables in second normal form (2nf):

- a. eliminate all hidden dependencies
- b. eliminate the possibility of a insertion anomalies
- c. have a composite key
- d. have all non-key fields depend on the whole primary key.

7- Which forms simplifies and ensures that there is minimal data aggregates and repetitive groups:

- a. 1nf
- b. 2nf
- c. 3nf
- d. all of the mentioned

8- Which type of entity cannot exist In the database unless another type of entity also exists in the database, but does not require that the identifier of that other entity be included as part of its own identifier?

- a. weak entity
- b. strong entity
- c. id-dependent entity
- d. id-independent entity

9- the different classes of relations created by the technique for preventing modification anomalies are called:

- a. normal forms
- b. referential integrity constraints
- c. functional dependencies
- d. none of the above is correct

10- a key:

- a. must always be composed of two or more columns.
- b. can only be one column.
- c. identifies a row.
- d. identifies a column.

11- If a table has been normalized so that all determinants are candidate keys, then that table is in:

- a. 1nf
- b. 2nf
- c. 3nf
- d. bcnf

12- when the values in one or more attributes being used as a foreign key must exist in another set of one or more attributes in another table, we have created a(n):

- a. transitive dependency
- b. insertion anomaly
- c. referential integrity constraint.
- d. normal form

13- a functional dependency is a relational between or among:

- a. tables.
- b. row.
- c. relations.
- d. attributes.

14- Functional dependencies are the types of constraints that are based on ...

- a. key
- b. key revisited
- c. superset key
- d. none of these.

15- In the relational model, relationships between relations or tables are created by using:

- a. composite key
- b. determinants
- c. candidate key
- d. foreign key

16- ... is the minimal super key

- a. primary key
- b. candidate key
- c. foreign key
- d. unique key
- e. alternate key

17- metadata about structure of database is stored in:

- a. data files
- b. indices
- c. data dictionary
- d. metadata files

18- a combination of cartesian product followed by a selection process is called:

- a. association
- b. product formalization
- c. joins
- d. protocols

19- a collection of tables to represent data and relationship among data is represented through which model?

- a. ER data model
- b. relational model
- c. semi structured model
- d. object based model