

PG DEPARTMENT OF COMMERCE (CA)

QUESTION BANK

COURSE: M.Com (CA)

SEMESTER: I

SUBJECT CODE: 19PCC104 **SUBJECT:** Relational Database Management System and Oracle

K1 LEVEL

Multiple Choice Questions

Unit I

1. DB stands for _____
a) Data Binding b) Disk Binding **c) Data Base** d) Dynamic Base
2. In RDBMS, R stands for _____
a) Relational b) Referential c) Renal d) Referred
3. The three integrity rules supported by DBMS are Referential, Entity and _____
a) Authority b) Integrity Constraints c) Manipulation **d) Domain**
4. One of the main reasons behind the success of relational model is _____
a) Rigidity **b) Simplicity** c) Flexibility d) Static
5. _____ is a collection of interrelated files and a set of programs that allows users to access and modify these files.
a) Data Abstraction **b) DBMS** c) Data View d) Data Integrity
6. The collection of information stored in the database at a particular moment is called _____
a) Instance b) Schema c) Abstraction d) Data Independence
7. The overall design of the database is called as _____
a) Instance **b) Schema** c) Abstraction d) Data Independence
8. The ability to modify a schema definition in one level without affecting a schema definition in the next higher level is _____
a) Data Abstraction b) Data Rigidity **c) Data Independence** d) Data Integrity
9. _____ are a logical representation of the business processes in an organisation.

a) Databases **b) Data Models** c) Data Collections d) Domains

10. In E-R Model, Ellipses represents _____

a) Entity b) Entity Sets c) Relationships **d) Attributes**

11. _____ model is based on the collection of objects like the E-R Model.

a) Object Based b) Entity Based c) Relational d) Record Based Logical

12. The E-R Model refers to _____

a) Entity-Referential Model b) Ellipses-Relational Model **c) Entity-Relationship Model**

d) External-Relationship Model.

13. The bodies of code in Object Oriented Model is called as _____

a) Methods b) Entity c) Attributes d) Program

14. The data and relationships in the relational model are represented by a collection of _____

a) Data **b) Tables** c) Tree View d) List View

15. In Network Model the data are represented by collection of _____

a) Tables b) Views **c) Records** d) Instance

16. A _____ model is used as a tool for data modelling and logical database design.

a) E-R b) Object Based c) Record Based d) Relational

17. A _____ is an association among several entities.

a) Relationship b) Attribute c) Entity d) Key

18. The _____ in the relational database represents guidelines for record design.

a) Attributes b) Records **c) Normal Form** d) Methods

19. _____ Normal Form is considered to be a part of the normal definition of a relation.

a) First b) Second c) Third d) Fourth

20. A relation is in _____ normal form, if and only if all underlying simple domains contain atomic values only.

a) **a) First** b) Second c) Third d) Fourth

21. The Oracle Corporation began producing database software in _____

a) 1967 **b) 1977** c) 1987 d) 1997

22. A client or the front end database application interacts with the database by _____ and receiving information from the database server.

- a) Responding b) Redirecting **c) Requesting** d) Registering

23. The _____ is used to manage the database tables optimally among multiple clients concurrently requesting the same data from the server.

- a) Database Server** b) Client System c) Intranet d) Internet

24. _____ is one of the powerful RDBMS product, that provides efficient and effective solution for database management.

- a) Forms b) Reports **c) Oracle** d) PL/SQL

25. _____ are the application development tools of Oracle for developing, executing, displaying and printing reports.

- a) Forms b) PL/SQL c) SQL **d) Reports**

26. The _____ data type is used to store fixed length character strings.

- a) Long **b) Char** c) Number d) Date

27. The _____ data type is used to store Zero or positive or negative fixed or floating point numbers.

- a) Long b) Char **c) Number** d) Date

28. In DML, M stands for _____

- a) Manifest b) Method c) Maximising **d) Manipulation**

29. The _____ command helps to delete all rows from the specified table.

- a) Drop **b) Truncate** c) Delete d) Destroy

30. The data constraints are connected to a cell by the DBA as _____

- a) Database b) Data Disk **c) Flag** d) Range

31. A _____ is anything that is defined and stored in a database.

- a) Database Object** b) Table c) View d) Synonym

32. _____ is the basic unit of data storage in an oracle database.

- a) View b) Synonym **c) Table** d) Sequences

33. A _____ is a virtual table whose contents are defined by a query.

- a) View** b) Synonym c) Table d) Sequences

34. A _____ is an alias given to a database object.

- a) Table b) View c) Sequences **d) Synonym**

35. To remove a synonym, the user must issue the _____ synonym command.

- a) Select b) Truncate **c) Drop** d) None of them

36. The address field of an index is called _____

- a) ROWID** b) ROWVAL c) ROW% d) ROWMATRIX

37. Indexes that deny duplicate values for the indexed columns are called _____ index.

- a) Duplicate **b) Unique** c) View d) Table

38. _____ are mechanisms intended to prevent destructive interaction between users accessing the same resource.

- a) Insertion b) Select c) ROWID **d) Lock**

39. _____ locks prevent others from reading or updating the table.

- a) Exclusive** b) Shared c) Select d) Deadlock

40. SQL * Plus uses the _____ names as default column headings while displaying query results.

- a) Row **b) Column** c) Title d) Data Type

41. The _____ programs can be stored in the database as stored programs and can be invoked whenever required.

- a) SQL **b) PL/SQL** c) Replaced d) Executable

42. _____ are PL/SQL blocks that can take parameter and can be invoked.

- a) Indexes b) Deadlocks **c) Sub-Programs** d) Abstractions

43. The _____ section contains statements, which are placed between the keyword BEGIN and EXCEPTION.

- a) Declarative **b) Executable** c) Exception d) Process

44. A _____ is a subprogram that computes a value.

- a) Functions** b) Synonyms c) Indexes d) Data Type

45. Oracle Forms Builder provides a powerful _____ to design such forms.

- a) Database **b) Graphical User Interface** c) Cursor d) Trigger

46. The design and layout of data entry screens and the creation of event driven PL/SQL code is done through _____

- a) GUI b) Form Compiler **c) Form Builder** d) Form Runtime

47. The process of data abstraction and its display is called _____

- a) Tabulation b) Navigation c) Parameters **d) Report Creation**

48. The _____ command evaluates a condition and executes one or more rows of commands only if the analysed condition is true.

- a) If ... then** b) Begin c) Exception d) Declare

49. The PL/SQL language uses the concept of _____ blocks.

- a) Declaration b) Exception **c) Structured** d) Unstructured

50. _____ refers the users to refer to data type and object from the database.

- a) Rows b) Row id c) Column **d) Attribute**

K2 Level Questions

1. Express about Data Dependence.

Data dependence refers to the close relationship between data stored in files and the specific software programs needed to update and maintain those files.

2. Review on View of Data

A DBMS is a collection of interrelated files and view of data helps in viewing the data as an abstract.

3. Discuss on the Physical Level Abstraction.

Physical level of abstraction is the lowest level of abstraction which describes how the data are actually stored in the database.

4. Decode the term Instance of the database.

The collection of information stored in the database at a particular moment is called an Instance of the database.

5. Defend on the concept Database Schema.

The overall design of the database is called as the database schema.

6. Report on Data Independence.

The ability to modify a schema definition in one level without affecting a schema definition in the next higher level is called Data Independence.

7. Clarify on the levels of Schema in a DBMS.

The database system has several schemas, partitioned according to the level of abstraction and they are External, conceptual and physical schema.

8. Generalise on Conceptual Schema.

The Conceptual Schema is also called the logical schema describes about all the relations that are stored in the database.

9. Indicate on the term Physical Schema.

The Physical Schema essentially describes about how the relations described in the conceptual schema are actually stored on secondary storage devices such as disks and tapes.

10. Extend and Explain on DBMS.

DBMS stands for Database Management System. DBMS is a system software for creating and managing databases such as to create, retrieve, update and manage data.

11. Restate on One-to-Many Relationship in DBMS.

For one occurrence of the first entity there can exist many related occurrences of the second entity and for every occurrence of the second entity there exist only one associated occurrence of the first.

12. Infer about the Data Models.

Data Models are the logical representation of the business processes in an organisation.

13. Interpret on Relationship in E-R Model.

A relationship is an association among several entities.

14. Clarify the meaning of Entity.

An Entity is a thing or an object that is distinguishable from all their objects. An entity can be a person, a place, an object, an event, or a concept about which an organisation wishes to maintain data.

15. Predict on Entity Set.

An entity set is a set of entities of the same type that share the same properties attributes.

16. Indicate about the term Attribute in E-R Model.

In the Entity Relationship Model, attributes refer to the properties that characterize an entity set. It is also known as data field or data element.

17. Express the view on the Normal Form.

The normal forms in relational database theory represent guidelines for record design.

18. Review on the First Normal Form

First Normal Form is defined as, a relation is in first normal form if and only if all underlying simple domains contain atomic values only.

19. Decode the basis of Second Normal Form.

The Second Normal Form is based on the concept of fully functional Dependency.

20. Explain Boyce-Codd Normal Form.

A relation is in Boyce-Codd Normal Form if and only if every determinant is a candidate key.

21. Indicate about the Database Server in Oracle.

The database server or back end is used to manage the database tables optimally among multiple clients who concurrently request the server for the same data.

22. Decode the list of tools used in Oracle.

The tools of Oracle are:

1. SQL*Plus
2. PL/SQL
3. Forms
4. Reports

23. Express the three sub languages of SQL.

The three sub languages of SQL are:

1. Data Definition Language
2. Data Manipulation Language
3. Data Control Language

24. Extend the term SQL.

The term SQL stands for Structured Query Language.

25. Extend RDBMS.

The term RDBMS stands for Relational Database Management System.

26. Discuss the meaning of a Table in SQL.

A table is a unit of storage, which holds data in the forms of rows and columns.

27. Restate the purpose of a Select Command.

The request for the information stored in a table can be done through the select command.

28. Infer the meaning of Revoke Privilege Command.

The Revoke Command is used to withdraw the privilege that has been granted to a user.

29. Clarify the purpose of Commit Command in TCL.

The Commit Command is used to end a transaction and only with the help of the commit command, transaction changes can be made permanent to the database.

30. Generalise the Rollback Concept in TCL.

A Rollback Command is used to undo the work done in the current transaction.

31. Decode the Column Level Constraints.

If the constraints are defined along with the column definition, it is called as a column level constraint.

32. Infer about Table Level Constraints.

If the data constraint attached to a specific cell in a table reference the contents of another cell in the table then the user will have to use table level constraints.

33. Express about the Check Constraints.

The use of Check Constraints is to enforce integrity rules that can be evaluated based on a logical expression.

34. Predict on the Referential Integrity Constraint.

The referential integrity constraint enforces the relationship between the tables.

35. Infer the purpose of Unique Constraints.

The unique constraint designates a column or a group of columns as a unique key and allows in storing no duplicate values.

36. Differentiate between Unary and Binary Operators.

A Unary Operator uses only one operand while a Binary operator uses two operands.

37. Discuss the purpose of Set Operators.

Set Operators combine sets of rows returned by queried, instead of individual data items. All set operators have equal precedence.

38. Decode the list of Logical Operators.

Logical Operators manipulate the results of conditions and it includes AND, NOT and OR Operators with it.

39. Explain the term Locks in PL/SQL.

Locks are mechanisms intended to prevent destructive interaction between users accessing the same resource which may lead to incorrect data or incorrect alteration to a data structure.

40. Identify the meaning of Shared Lock.

Shared lock allows others to read a table, but prevents them from updating or modifying the table.

41. Extend the term PL/SQL.

The term PL/SQL can be extended as Procedural Language / Structured Query Language.

42. Identify the meaning of subprograms.

Subprograms are PL/SQL blocks that can take parameter and can be invoked whenever needed.

43. Explain about the Declaration Section in PL/SQL.

The declarative section contains declaration. The keyword DECLARE is not used to declare but declared using IS or AS and BEGIN keyword.

44. Express the process of Function in PL/SQL.

A Function is a subprogram that computes a value. It is a part of an expression and must return a value.

45. Classify the list of components of a Form.

The list of components in form construction includes:

1. Forms Builder
2. Forms Compiler

3. Forms Runtime

46. Decode the term Menu in Application Development.

The Menu Module is a collection of objects such as menu items, sub menus, sub menu items and PL/SQL code blocks.

47. Interpret about Report Creation.

The process of data extraction and its display is called as Report Creation.

48. Define the term Procedure.

A Procedure is a sub-program that performs a specific action and can be called from an Anonymous PL/SQL Block or from another procedure.

49. Predict on the Return Statement in PL/SQL.

A RETURN statement immediately completes the execution of subprogram and returns control to the caller.

50. Identify the two types of Exceptions.

The two types of exceptions are:

1. Predefined Exceptions
2. User-defined Exceptions

K3 Level Questions

Unit I

1. Assess the purpose of Database Systems.
2. Sketch on View of Data with suitable example.
3. Compute on Data Abstraction.
4. Find out the Advantages of a Database.
5. Predict the Benefits of Data Dictionary.
6. Sketch the Concepts of Database.
7. Demonstrate the Types of Data Dictionary.
8. Differentiate between Physical and Logical Data Independence.
9. Construct the One to One Relationship in DBMS with example.

10. Distinguish between One to Many and Many to Many Relationships in DBMS.

Unit II

1. Organise the meaning of Data Models with examples.
2. Demonstrate the Conceptual Data Model with illustration.
3. Examine the Physical Data Model with suitable example.
4. Manipulate the Logical Data Model with examples.
5. Predict the Network Data Model
6. Experiment the Relational Data Model
7. Construct the Object Oriented Model and give examples.
8. Assess the term Normalisation with suitable example.
9. Sketch the First Normal Form.
10. Show the Second Normal Form.

Unit III

1. Predict on the Introduction to Oracle.
2. Demonstrate on what can you do with SQL? List out the points involved in it in brief.
3. Discover any three data types with examples.
4. Assess the Steps involved in creation and alteration of a table.
5. Show the Select Command with examples.
6. Demonstrate on the Table level and Column level constraints.
7. Dramatise the Check Constraints with example.
8. Schedule the list of Comparison Operators.
9. Examine the concept Keys and its types.
10. Sketch the Usage of Sub-Queries.

Unit IV

1. Interpret Tables and the steps involved in table creation.
2. Predict the concept of Synonyms and its features

3. Demonstrate the term Indexing and its needs.
4. Show the Table level Locks with examples.
5. Sketch the Row Level Locks with suitable illustration.
6. Employ the Lock and state what are Shared lock and Exclusive Lock?
7. Predict the Features of Column Commands in SQL*Plus Formatting Commands.
8. Find out the terms of formatting commands used in SQL*Plus.

Unit V

1. Sketch an introduction to PL/SQL.
2. Interpret the Advantages of PL/SQL.
3. Demonstrate the Creating Functions in PL/SQL.
4. Experiment how do you Create and Specify a Procedure in PL/SQL.
5. Organise the Attributes of PL/SQL.
6. Interpret the Subprograms in PL/SQL.
7. Manipulate on the Calling of a Procedure in PL/SQL.
8. Predict the Purpose of a Return Statement in Functions.
9. Discover the Components of Oracle Forms.
10. Relate the Components of Oracle Form Builder.

K4 & K5 Level Questions

Unit I

1. Analyse the Various types of Data Relationships and its associations.
2. Criticise the Disadvantages of File Based Management System.
3. Deduce the Benefits of DBMS.
4. Assemble the Components of DBMS.
5. Summarize the Data Independence and its types.

Unit II

1. Differentiate the Models, Conceptual, Physical and Logical Models with suitable illustrations.

2. Distinguish between Network, Relational and Object Oriented Models in detail.
3. Outline in detail the Components – Entities, Attributes and Relationship.
4. Generate the Boyce Codd Normal Form and state some examples.
5. Establish the difference between the 4th and 5th Normal Forms.

Unit III

1. Arrange the Tools of Oracle.
2. Generate the Relating of Data through Join Concept.
3. Propose the Oracle internal data types
4. Organise the DML Commands in Detail.
5. Compose the Data Constraints and its types.
6. Illustrate the Set operators.
7. Categorise the Single Row Functions with suitable examples.

Unit IV

1. Analyse a Table and its features.
2. Investigate on the Viewing a table and its methods.
3. Integrate the Purpose of a Sequence and its features.
4. Originate on the term Locking and the various modes of locking.
5. Summarise the SQL * Plus Formatting Commands.

Unit V

1. Construct the Architecture of a PL/SQL block.
2. Formulate the Control Structures with examples.
3. Analyse the Concept of Exception Handling with illustration.
4. Identify the Steps involved in constructing a Simple Form.
5. Argue on Creating Reports in Oracle.