High-Level Design (HLD) MCQs:

1. **Question:** What is the primary objective of High-Level Design (HLD)?

   a) Writing detailed code
   b) Defining the overall system architecture
   c) Unit testing
   d) Identifying and fixing bugs

2. **Question:** In HLD, what does the term "architectural patterns" refer to?

   a) Detailed coding practices
   b) Common design structures for solving recurring problems
   c) Unit testing strategies
   d) Debugging techniques

3. **Question:** Which of the following is typically considered in HLD?

   a) Low-level module interactions
   b) Code optimization techniques
   c) User interface design
   d) Detailed algorithm implementation

4. **Question:** What is the purpose of a "data flow diagram" in the context of HLD?

   a) Illustrating detailed algorithms
   b) Showing the overall structure of the system
   c) Representing data exchange between modules
   d) Identifying and fixing bugs

5. **Question:** Which document is a key outcome of the High-Level Design phase?

   a) Source code
   b) Test cases
   c) Detailed Design Document
   d) User Manual

6. **Question:** In HLD, what does "abstraction" refer to?

   a) Detailed coding practices
   b) Hiding unnecessary details and showing only essential features
   c) Unit testing strategies
   d) Debugging techniques

7. **Question:** What is the role of "module interface design" in HLD?

   a) Writing detailed code for modules
   b) Defining how modules will interact with each other
   c) Unit testing strategies
   d) Identifying and fixing bugs

8. **Question:** What does the term "scalability" mean in the context of HLD?

   a) Writing code that can be easily scaled down
   b) Designing a system that can handle increased load or growth
   c) Unit testing strategies
   d) Debugging techniques

9. **Question:** Which of the following is an example of a design constraint in HLD?

   a) System performance requirements
   b) Detailed coding practices
   c) Unit testing strategies
   d) Debugging techniques

10. **Question:** What is the focus of "system architecture diagrams" in HLD?

   a) Representing detailed algorithm steps
   b) Showing the overall structure of the system
   c) Code optimization techniques
   d) Identifying and fixing bugs

11.   **Question:** What is the primary goal of Low-Level Design (LLD)?

   a) Defining the overall system architecture
   b) Implementing detailed algorithms
   c) Unit testing
   d) Identifying and fixing bugs

12.   **Question:** In LLD, what does "pseudocode" refer to?

   a) Actual code written in a programming language
   b) High-level system architecture
   c) Detailed algorithm steps written in plain language
   d) User interface design

13.   **Question:** What does the LLD phase focus on?

   a) System testing
   b) Detailed coding practices
   c) Identifying high-level modules
   d) Overall system architecture

14.   **Question:** Which of the following is a key deliverable of Low-Level Design?

   a) System Requirements Specification
   b) Detailed Design Document
   c) User Manual
   d) Project Plan

15.   **Question:** In LLD, what is the purpose of "control flow diagrams"?

   a) Illustrating overall system architecture
   b) Representing detailed algorithm steps
   c) Showing data exchange between modules
   d) Code optimization techniques

16. **Question:** What is the role of "module specifications" in LLD?

   a) High-level system architecture
   b) Defining detailed implementation for each module
   c) Unit testing strategies
   d) Debugging techniques

17. **Question:** What is the significance of "coupling and cohesion" in LLD?

   a) Identifying and fixing bugs
   b) Assessing the effectiveness of unit testing
   c) Evaluating the relationships between modules
   d) Debugging techniques

18. **Question:** What is the purpose of "interface design" in LLD?

   a) High-level system architecture
   b) Defining how modules will interact with each other
   c) Unit testing strategies
   d) Identifying and fixing bugs

19. **Question:** In LLD, what does the term "data dictionary" refer to?

   a) High-level system architecture
   b) Detailed coding practices
   c) Centralized repository of data definitions used in the system
   d) Debugging techniques

20. **Question:** What does "coding standards" refer to in the context of LLD?

   a) Detailed coding practices recommended for the entire project
   b) Low-level module interactions
   c) Unit testing strategies
   d) Overall system architecture