Variables (6 questions)

1. Declare a variable age of type number and assign it a value. Print it.

2. Create a variable username of type string and log "Hello, <username>".

3. Declare a boolean variable isActive and assign it true. Print its type.

4. Create two number variables x and y, assign values, and print their sum.

5. Declare a variable colors as an array of strings with three colors. Print the second one.

6. Create a constant PI with value 3.14 and try reassigning it (observe the error).

Functions (6 questions)

7. Write a function greet that takes a name (string) and returns "Hello, <name>".

8. Write a function addNumbers that takes two numbers and returns their sum.

9. Create a function isEven that takes a number and returns true if it’s even, else false.

10. Write a function multiply with default parameter b = 5 that multiplies a * b.

11. Create an arrow function square that takes a number and returns its square.

12. Write a function printDetails that accepts a name (string) and age (number) and prints: "Name: <name>, Age: <age>".

Classes (6 questions)

13. Create a class Person with name and age properties, and a method introduce() that logs "Hi, I'm <name> and I'm <age> years old.".

14. Add a constructor to Person that initializes name and age.

15. Create a class Car with properties brand and year, and a method displayInfo() that logs "Car: <brand>, Year: <year>".

16. Create a class Rectangle with properties width and height and a method getArea() that returns area.

17. Create a class Student that has name and grade, and a method displayGrade() that logs "Student <name> has grade <grade>".

18. Create a class BankAccount with accountNumber and balance, and a method deposit(amount) that adds to balance and logs the new balance.