

C Programming Question Paper

1. Write a C program to calculate the sum of the first N natural numbers using a while loop.
2. Write a C program to input the age of a person and check if they are eligible to vote (age ≥ 18).
3. Write a C program to print the multiplication table for a user-input number.

Example format:

If the input is n = 2;

2 x 1 = 2

2 x 2 = 4

...

2 x 10 = 20

4. Write a C program to assign grades based on marks using the following criteria: 90-100 = A, 80-89 = B, 70-79 = C, 60-69 = D, below 60 = Fail.

5. Write a C program to calculate the factorial of a given number.

6. Write a C program to check if a number is a palindrome using a while loop

7. **Write a C program to check if a voter is valid to vote or not.**

(For example, if the voter is 18 years or older, they are eligible to vote.)

8. Write a C program to find the sum of digits of a given number.

9. Write a C program to print the first N Fibonacci numbers using a for loop.

10. Write a C program to print all prime numbers between 1 and n (n = user input).

11. Write a function in C to calculate the sum of the digits of a number.

12. Write a C program to print the following pattern when n = 4:

1 2 3 4

5 6 7 8

9 10 11 12

13 14 15 16

13. Write a function in C to find the greatest of three numbers.

14. Write a C program to print the following pattern when $n = 6$:

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    1  
   2   2  
  3       3  
 4           4  
 5               5  
6 5 4 3 2 1 2 3 4 5 6
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