Rajesh’s basic salary is input through the keyboard. His dearness allowance is 40% of basic salary, and house rent allowance is 20% of basic salary. Write a program to calculate his gross salary.

2) Temperature of a city in Fahrenheit degrees is input through the keyboard. Write a program to convert this temperature into Centigrade degrees.

3) Write a program to accept Principle, Rate and Time from user and Calculate Simple Interest.

4) If the marks obtained by a student in five different subjects are input through the keyboard, find out the aggregate marks and percentage marks obtained by the students. Assume that the maximum marks that can be obtained by a student in each subject is 100.

5) The length & breadth of a rectangle and radius of a circle are input through the keyboard. Write a program to calculate the area & perimeter of the rectangle, and the area & circumference of the circle.

6) Two numbers are input through the keyboard into two locations C and D. Write a program to interchange the contents of C and D.

7) A cashier has currency notes of denominations 10, 50 and 100. If the amount to be withdrawn is input through the keyboard in hundreds, find the total number of currency notes of each denomination the cashier will have to the withdrawer.

8) If the total selling price of 15 items and the total profit earned on them is input through the keyboard, write a program to find the cost price of one item.

9) Write a c program to swap two numbers without using third variable.

10) If a five-digit number is input through the keyboard, write a program to reverse the number.

If-Else

11) Write a program to accept two numbers and print greater among them.

12) Write a program to accept 3 numbers and print greater among them.

13) If the ages of Ram, Sham and Ajay are input through the keyboard, write a program to

determine the youngest of the three.

14) Any year is input through the keyboard. Write a program to determine whether the year is a leap year or not.

(Hint: Use the %(modulus) operator)

15) Any integer is input through the keyboard. Write a program to find out whether it is an odd number or even number.

16) Any character is entered through the keyboard; write a program to determine whether the character entered is a capital letter, a small case latter, a digit or a special symbol.

The following table shows the range of ASCII values for various characters.

Characters	ASCII Values
A – Z	65 – 90
a – z	97 – 122
0 – 9	48 – 57
Special symbols	0 – 47, 58 – 64, 91 – 96, 123 – 127

17) If cost price and selling price of an item is input through the keyboard, write a program to determine whether the seller has made profit or incurred loss. Also determine how much profit he made or loss he incurred.

18) While purchasing certain items, a discount of 10% is offered if the quantity purchased is more than 1000. If quantity and price per item are input through the keyboard. Write a program to calculate the total expenses.

19) The current year and the year in which the employee joined the organization are entered through the keyboard. If the number of years for which the employee has served the organization is greater than 3 then a bonus of Rs. 2500/- is given to the employee. If

the years of service are not greater than 3, then the program should do nothing.

20) The marks obtained by a student in 5 different subjects are input through the keyboard. The student gets a division as per the following rules:

Percentage above or equal to 60 – First division

Percentage between 50 and 59 – Second division

Percentage between 40 and 49 – Third division

Percentage less than 40 – Fail

Write a program to calculate the division obtained by the student.

21) Accept match played, runs scored & wickets taken by a cricketer player & check the cricketer is a batsman, bowler, all-rounder or fielder as per the following conditions:

a) If averages runs more than or equal 40 and average wickets more than or equal 2 then all-rounder.

b) If averages runs more than 45 then batsman.

c) If averages wickets more than or equal 3 then bowler otherwise fielder.

22) Accept marks in physics, chemistry, math and check Whether the student is eligible for examination or not as per the given conditions:

a) If marks in physics>=60

b) If marks in chemistry>=50

c) If marks in math>=40

d) If total>=200 or physics + chemistry>=150 then student is eligible else not eligible.

23) A library charges a fine for every book returned late. For first 5 days the fine is 50 paise, for 6-10 days fine is one rupee and above 10 days fine is 5 rupees. If you return the book after 30 days your membership will be cancelled. Write a program to accept the number of days the member is late to return the book and display the fine or the appropriate message.

24) Write a program to compute the wages of a daily labour as per the following rules:-

House Worked Rate Applicable

Up to first 8 hrs Rs 50/-

For next 4 hrs Rs 10/- per hr extra

For next 4 hrs Rs 20/- per hr extra

For next 4 hrs Rs 25/- per hr extra

For rest Rs 40/- per hr extra

Accept the name of the labourer and no. of hours worked. Calculate and display the wages.

The program should run for Number of labourers as specified by the user.

25) Accept units consumed & calculate the electricity bill as per the following conditions:

a) First 100 units will be charged @ Paisa 80 per unit.

b) Next 200 units will be charged @ Rs 1.20 per unit.

c) Units next to 300 will be charged @ Rs 2.60 per unit.

d) If total bill exceeds Rs 1200 than additional surcharge of 6% of total bill should be added into the bill.

26) Accept weight(in grams) of a parcel & calculate the charges as per the following conditions:

a) If weight up to 300 grams, charges Rs 45.

b) Next weight 10 grams or part thereof, up to 1000 gram, charges Rs 3.

c) Next each 50 grams or part thereof charge Rs 5.

27) A company insures its drivers in the following cases:

a) If the driver is married.

b) If the driver is unmarried, male & above 30 years of age.

c) If the driver is unmarried, female & above 25 years of age.

In all other cases the driver is not insured. If the marital status, sex and age of the driver are the inputs, write a program to determine whether the driver is to be insured or not.

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28) The policy followed by a company to process customer orders is given by the following rules:

a) If a customer order is less than or equal to that in stock and has credit is OK, supply has requirement.

b) If has credit is not OK do not supply. Send him intimation.

c) If has credit is OK but the item in stock is less than has order, supply what is in stock. Intimate to him data the balance will be shipped.

Write a C program to implement the company policy.

29) Accept marks in 5 subjects & calculate the results as per the following conditions:

a) If marks in all subjects more than or equal 33 then ‘pass’.

b) If marks up to two subjects less than ‘Compartment’.

c) If marks in more than two subjects less than ‘Fail’.

Iteration (Looping)

30) Write a program to find the factorial value of any number entered through the keyboard.

31) Two numbers are entered through the keyboard. Write a program to find the value of one number raised to the power of another.

32) Write a program to print the multiplication table of the number entered by the user. The table should get displayed in the following form.

29*1=29

29*2=58

33) Print the factors of a given number.

34) Print square root of a number.

35) Print the sum of ‘n’ natural numbers where the user enters ‘n’.

36) Write a program to calculate the HCF two numbers.

37) Write a program to reserve the digits of a given numbers.

38) Print the sum of digits of any given integer number.

39) Accept a number & check it is Palindrome or not.

40) Accept a number & check it is Armstrong or not.

41) Accept a number & digit & count how many times the given digit exits in the given number.

42) Write a program to accept a number & check it is prime or not.

43) Write a program to accept a number & check it is perfect or not.

44) Write a program to accept two numbers & check number are amicable or not.

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45) Write a program to enter the numbers till the user wants and at the end it should display the count of positive, negative and zeros entered.

46) Write the program to print greater and smaller no. between 10 numbers.

47) Print the following Fibonacci Series up to 10 times.

0 1 1 2 3 4 8 13.....

48) Accept a number & check it is Fibonacci number or not. i.e. the given number exists in the Fibonacci Series or not.

49) Write a program to print all prime number from 1 to 300.

50) Write a program to print out all Armstrong numbers between 1 and 500. If sum of cubes of each digit of the number is equal to the number itself, then the number is called an Armstrong number.

51) Write a program to accept range from user & print tables of whole range.

52) Write a program to find sum of all perfect numbers between 100 to 500.

53) Write a program to accept range from user & display all palindrome numbers from range.

54) Write a program to find average of all prime numbers between 100 & 500.

55) Write a program to accept range from user & calculate factor of each number from range.

56) Write C program to print the following PYRAMIDS:

a) 1

1 2

1 2 3

1 2 3 4

1 2 3 4 5

b) 1

2 2

3 3 3

4 4 4 4

5 5 5 5 5

c) 1

2 3

4 5 6

7 8 9 10

d) 1

2 3

3 4 5

4 5 6 7

6

e) 1

0 1

1 0 1

0 1 0 1

1 0 1 0 1

f) A

A B

A B C

A B C D

A B C D E

g) 1

1 2

1 2 3

1 2 3 4

h) 1

1 2 1

1 2 3 2 1

1 2 3 4 3 2 1

1 2 3 4 5 4 3 2 1

i) 1

1 2 1

1 2 3 2 1

1 2 3 4 3 2 1

1 2 3 4 5 4 3 2 1

1 2 3 4 3 2 1

1 2 3 2 1

1 2 1

1

j) A B C D E F G F E D C B A

A B C D E F F E D C B A

A B C D E F G F E D C B A

A B C D E F G F E D C B A

A B C D E F G F E D C B A

A B C D E F G F E D C B A

A B C D E F G F E D C B A

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k) 1

2 3

4 5 6

7 8 9 10

57) Write a program to add first seven terms of the following series using a for loop:

58) The natural logarithm can be approximated by the following uhiuiyftf6redfyuuyseries.

If x is input through the keyboard, write a program to calculate the sum of first seven terms of this

series.

59) Write a program to obtain sum of the ‘n’ terms of the following series:

a) 1!+2!-3!+4!-5!..... n terms

b) 1/1!+1/2!+1/3!+1/4!+..... n terms

c) x+x 3 /3!+x 5 /5!+..... n terms

60) Input any positive integer number (n<=9999999). Convert the number into words.

61) Write a program to convert a given decimal number to its binary equivalent and vice versa.

Switch, Go to, Break, Continue

62) Write a program to accept numeric day of week from user and print character day of week using switch statement.

63) Write a program to accept numeric month from user and print character month of year using switch statement.

64) Write a menu driven program to accept choice from user perform the task using switch statement :-

Menu 1:-

1) Sum

2) Difference

3) Product

4) Quotient

65) Write a menu driven program which has following options using switch statement :-

1. Factorial of a number.

2. Prime or not

3. Odd or even

4. Exit

66) Write a program to show the use of break and continue.

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67) Write a program to print the table of number wit go to statement.