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Greatest among three number:-

Algorithm:

Step 1) accept the numbers in three variables i.e. a, b, c.

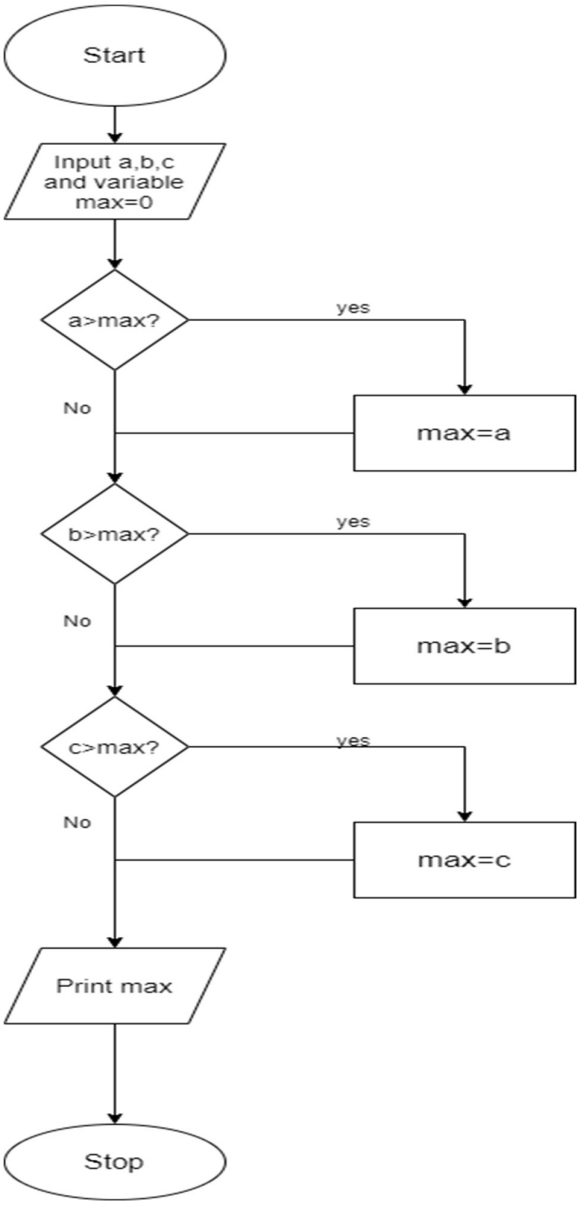
Step 2) take another variable i.e. max having containing the smallest number that is 0.

Step 3) compare the other variables with the new variable a, b, c with max, one at a time.

Step 4) If any of a, b or c is greater than max then put that number in max. After this process max will finally contain the largest of the three numbers.

Step 5) Print max;

Flowchart:



Code:-

```
#include <stdio.h>

int main()
{
   int a,b,c;
   scanf("%d%d%d", &a, &b, &c);

   int max=0;
   if(a>max){
      max=a;
   }
   if(b>max){
      max=b;
   }
   if(c>max){
      max=c;
   }

   printf("the greatest number is:-%d", max);

   return 0;
}
```

Quadratic Eq root:-

Algorithm:

Step 1) take input three variables a, b, c.

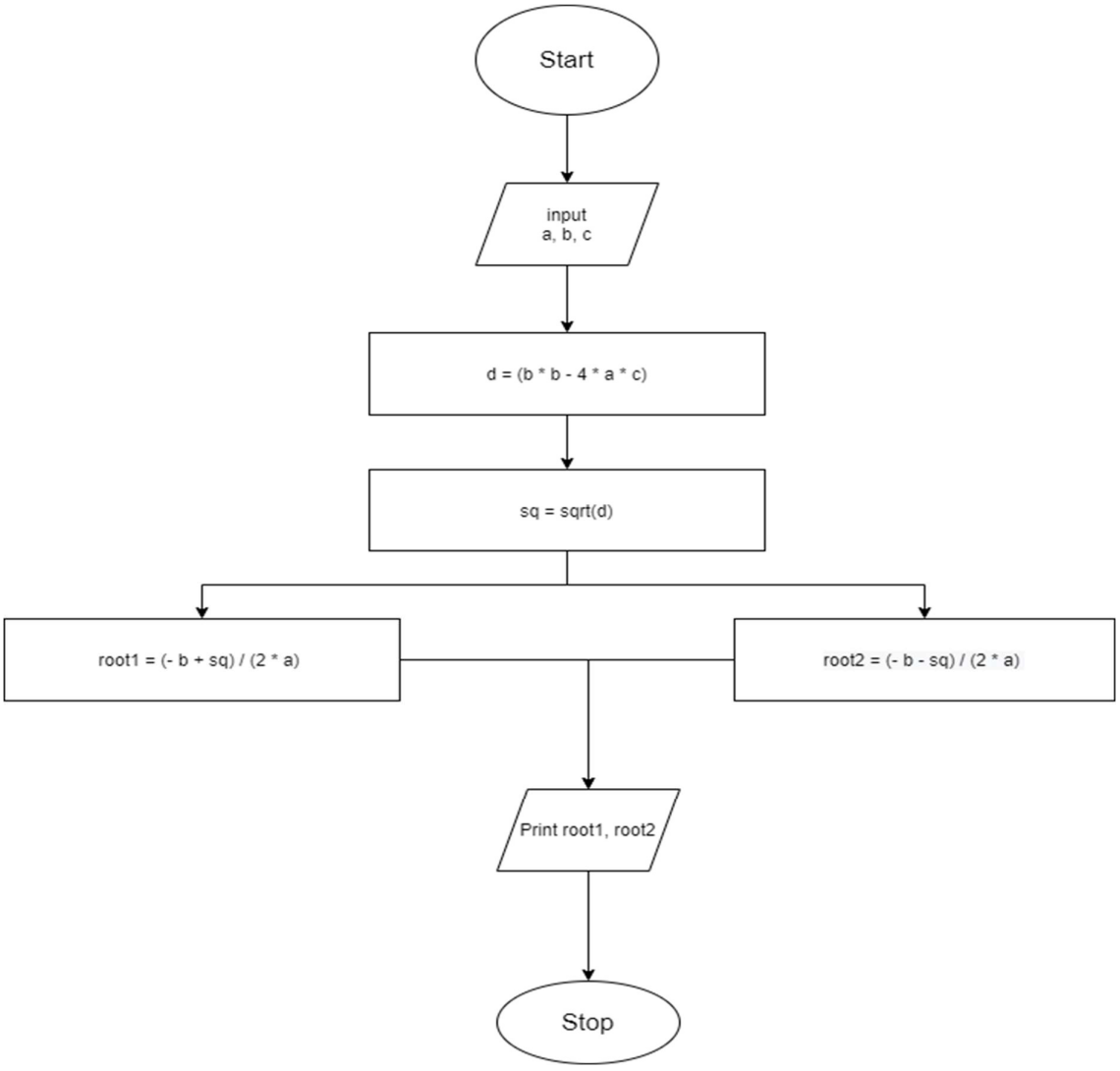
Step 2) calculates the discriminant i.e.(b*b -4*a*c) and store it in d

Step 3) store the square root of d in sq

Step 4) store the value of (-b + sq)/(2*a) in root1 and (-b - sq)/(2*a) in root2.

Step 5) Print the values of root1 and root 2

FlowChart



Code:-

```
#include <stdio.h>
#include <math.h>

int main()
{
   int a,b,c;

   scanf("%d%d%d", &a,&b,&c);

   int d = abs((b*b) - (4*a*c));

   float sq = sqrt(d);

   float root1 = (-b + sq)/(2*a);
   float root2 = (-b - sq)/(2*a);

   printf("root1:-%f root2:-%f",root1,root2);


   return 0;
}
```

Factorial

Algorithm:

Step 1) take a number from the user as input and store it in n

Step 2) initialize a variable fact = 1,I = 1

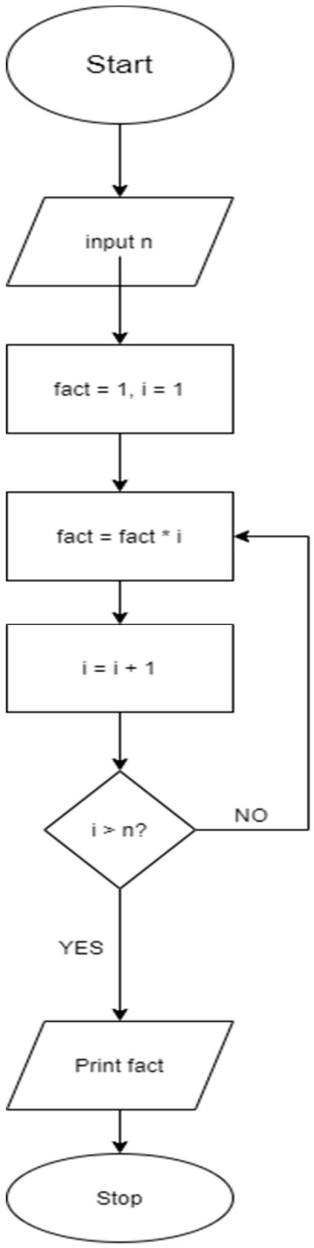
Step 3) fact = fact*i

Step 4)I = I + 1

Step 5)repeat Step 3 and Step 4 till I is equal to n

Step 4) print fact;

Flowchart



Code:-

```
#include <stdio.h>
#include <math.h>

int main()
{
   int n;

   scanf("%d", &n);

   int fact=1;

   for(int i=1;i<=n;i++){
      fact=fact*i;
   }

   printf("%d", fact);

   return 0;
}
```