#include<stdio.h>

#include<conio.h>

#include<math.h>

void main()

{

float a,b,c,d,x,xreal,ximg,alpha,beta;

printf("\n enter the coefficients of quadratic equation a,b and c \n");

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

if (a==0)

{

printf("not a Q.E.");

if (b!=0)

{

x<- -c/b;

printf ("x=%f",x);

}

else

{

d=b\*b-(4\*a\*c);

if(d>0)

{

printf("roots are real and distinct");

alpha= -b + sqrt (d)/(2\*a);

beta = -b - sqrt (d)/(2\*a);

}

if (d==0)

{

printf("roots are real and distinct \n");

alpha = -b/(2\*a);

beta = alpha;

}

printf("roots of QE are x1=%f and x2=%f", alpha,beta);

}

}

else

{

printf("roots are complex or imaginary");

xreal= -(b/(2\*a));

ximg= -(sqrt(d)/(2\*a));

printf("first complex root = %f+i%f", xreal,ximg);

printf("second complex root = %f-i%f", xreal,ximg);

}

getch();

}