#include <stdio.h>

int main() {

int a, b, c, c1, c2, c3;

char istriangle;

do {

printf("\nenter 3 integers which are sides of triangle\n");

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

printf("\na=%d\tb=%d\tc=%d", a, b, c);

c1 = a >= 1 && a <= 10;

c2 = b >= 1 && b <= 10;

c3 = c >= 1 && c <= 10;

if (!c1)

printf("\nthe value of a=%d is not the range of permitted value", a);

if (!c2)

printf("\nthe value of b=%d is not the range of permitted value", b);

if (!c3)

printf("\nthe value of c=%d is not the range of permitted value", c);

} while (!(c1 && c2 && c3));

// To check if it is a triangle or not

if (a < b + c && b < a + c && c < a + b)

istriangle = 'y';

else

istriangle = 'n';

// To check which type of triangle

if (istriangle == 'y') {

if ((a == b) && (b == c))

printf("equilateral triangle\n");

else if ((a != b) && (a != c) && (b != c))

printf("scalene triangle\n");

else

printf("isosceles triangle\n");

} else {

printf("Not a triangle\n");

}

return 0;

}