1. Write a **for** loop that takes **up to** fifteen integer values from the user and then stores those values into an integer array. Then make another **for** loop that prints out the array from front to back.:

Scanner scan = new Scanner(System.in);

int arr[] = new int[15];

1. What is the output of the following **for** loop:

int y =6;

int x =13;

int z =7;

for (int i = 0; i<y; i++){

x+=i;

y--;

z-=y;

}

System.out.println(z+" "+y+" "+x);

1. Write a **sentinel controlled while** loop that takes words or phrases from a user and puts them into the sentence variable. Exit the loop when the user enters “done” when prompted to. After exiting the loop print out the sentence variable.

Scanner scan = new Scanner(System.in);

String sentence = "";

String word = "";

1. Trace the following **sentinel controlled while** loop if the user inputs values in the order (37, -58, 2058, -1757, 453, 216, 1, 5, -999):

Scanner scan = new Scanner(System.in);

int count = 0;

int sum=0;

int sentinel=0;

System.out.print("Enter a number to increment the count and add to

the sum (enter -999 to quit): ");

sentinel = scan.nextInt();

while(sentinel!=-999){

sum+=sentinel;

count++;

if (count>0){

System.out.print("Enter a number to increment the count

and add to the sum (enter -999 to quit): ");

sentinel = scan.nextInt();

}

}

System.out.println(sum + " " + count);