

Trace the following code segments. Assume all undeclared variables are initialized to zero. If an error would occur, explain it. If an infinite loop occurs, write "infinite loop".

1.

```
Dim intScores() As Integer = {11, 112, -93, 20, 52}

While (intScores(J) > intSum) J intSum
    intSum = intSum + intScores(J)
    J = J + 1
End While
```

2.

```
Dim dblAves(4) As Double

While (intPosition < 4 And dblSum < 5) intPosition dblSum draw dblAves
    dblAves(intPosition + 1) = intPosition
    dblSum += intPosition
    intPosition = intPosition + 1
End While
```

3.

```
Dim intValues() As Integer = {1, 4, 10, 14, 22, 32, 38, 49, 60, 63, 77, 89, 90, 91}
Dim intMid As Integer = 7
Dim blnFound As Boolean = False intMid intLow intHigh
Dim intLow As Integer = 0
Dim intHigh As Integer = 13
Dim intKey As Integer = 22

While (Not blnFound And intLow <= intHigh)

    If (intValues(intMid) = intKey) Then
        blnFound = True
    ElseIf (intLow + 1 >= intHigh) Then
        Exit While
    Else

        If (intValues(intMid) > intKey) Then
            intHigh = intMid - 1
        Else
            intLow = intMid + 1
        End If

        intMid = Math.Round((intLow + intHigh) / 2)
    End If
End While
```