

## Answers to Questions from TT 7.2.1

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### Hand execution using a trace table

*Demonstrate how the following code is executed in the computer.*

```
1 def whatshouldthisfunctionbecalled?(data, val)
2     i = 0
3     result = false
4     while i < data.length
5         if data[i] == val
6             result = true
7             return result
8         end
9         i = i + 1
10    end
11    return result
12 end
```

Draw and complete trace tables for the following two sets of data and place the final result in the table below:

<i>data</i>	<i>val</i>	<i>Result</i>
[2, 6, -4, 3, 7]	3	true
[-2, 8, 2, -5, 9]	6	false

Once you have completed your trace tables (below) write the name you chose for the function above:  
results\_check (data, val)

Place your trace tables below:

For data set: **data** = [2, 6, -4, 3, 7] **val** = 3

Data	Index	Result
2	0	false
6	1	false
-4	2	false
3	3	true

For data set: **data** = [-2, 8, 2, -5, 9] **val** = 6

Data	Index	Result
-2	0	false
8	1	false
2	2	false
-5	3	false
9	4	false