

## Lesson 34 Coding Activities

Download the zipped .java starter files with the program templates, and use them in DrJava or an IDE of your choice, to get a head start on the activity.

For the Lesson 34 activities, you will be asked to write one or more methods. Use the template to write a main method that tests each of your methods, then paste everything into the code runner box. Your submission should begin with the first import statement and end with the final }.

Come to the forum with your questions and to share your test cases.

1. Write a method that takes an array of ints as a parameter and returns the sum of integers in the array.

```
public static int sum(int [] a)
```

For example, `sum(a)`; would return 6 if `a = {1, 2, 3}` or 3 if `a = {1, 1, 1}`.

2. Write a method that takes an array of ints as a parameter and returns the average value of the array as a double.

```
public static double average(int [] a)
```

For example, `average(a)` would return 2.0 if `a = {1, 2, 3}` or 1.0 if `a = {1, 1, 1}`.

3. Write a method that takes an array of ints and returns the largest value in the array.

```
public static int findMax(int [] a)
```

4. Write a method that takes an array of ints and returns the smallest value in the array.

```
public static int findMin(int [] a)
```

5. Write a method that takes an array of ints and returns a sum of *only* the even values.

```
public static int sumEven(int [] a)
```

For example, `sumEven(a)` would return 6 if `a = {1, 2, 3, 4, 5}`.

6. Write a method that takes an array of ints and returns true if all of the values in the array are positive. If the array contains any negative integers, it should return false.

```
public static boolean allPositive(int [] a)
```