

MyArrayList Psuedocode Activity

Assume MyArrayList<E> has two instance/member variables:

- **this.data**, an array of length 100 that holds elements of type **E**
- **this.size**, an int that holds the number of elements stored in MyArrayList

Here are the pseudocode examples for add(), get(), and clear():

```
method add(E item):  
    if size == this.data.length:  
        return  
    this.data[size] = item  
    this.size++
```

```
method get(int index): [return type: E]  
    return this.data[index]
```

```
method clear():  
    this.size = 0
```

Write *pseudocode* for the following methods. Remember, you don't need to worry about syntax – you can even describe operations in English as desired (as long as it's something that can be coded)!

```
method size(): [return type: int]  
    return this.size
```

```
method remove(int index):  
    for i in range [index, this.size - 1]:  
        this.data[i] = this.data[i + 1]  
    this.size--
```

```
method contains(E e): [return type: boolean]  
    for each x in this.data:  
        if x equals e:  
            return true  
    return false
```