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11/27/2023

Week9Meet - 10 pts

Turn in on BBL as soon as complete, but before end of day Sunday following the lecture.

Answer these questions as we progress through the meeting.

1. <https://docs.oracle.com/javase/8/docs/api/java/util/ArrayList.html#method.detail> Review the methods of ArrayList then choose 2 to discuss how that method could be implemented on an underlying array.

Size() -> This is just the length attribute for the array. It will reference the size value set for the array by the user and return it.

```
return array.length
```

Add(): Appends an element to the arraylist

If array is full:

```
newArray = new Array [2*initialSize]
```

```
index = 0
```

```
for elem in initialArray:
```

```
    newArray[index] = elem
```

else:

```
array[array.length-1] = elem
```

2. After a review of the Agenda code discuss why linked list was chosen as the data structure for the agenda. Consider both linked list and array list in your discussion.

We need a linked list because it is much more efficient to add. An arraylist would require all elements to be shifted whenever a new element gets added in the front, whereas a linked list is simply managed by a pointer to the spot where the next element should be added.

3. Consider what you learned about a queue as a data structure. Find two examples of queues in your life and choose one to express in pseudocode as a data structure.

1. I have files stored on the top shelf of a holder. You can peek at the first one in the queue
2. Food in a fridge could be an example when you have a lot of it stored because you can only retrieve the items starting from the front

Class File:

```
String name;
```

```
fileQueue<File> = new Queue();
```

```
fileQueue.enqueue(new File("tax document 1"))
```

```
fileQueue.enqueue(new File("tax document 2"))
```

```
fileQueue.dequeue()
```

```
fileQueue.empty()
```

4. Consider what you learned about a stack as a data structure. Find two examples of stacks in your life and choose one to express in pseudocode as a data structure.

1. The same holder has a small shelf designed to hold other things in a stack
2. List of chores to do

Class ToDoItem:

String description;

```
toDoList<ToDoItem> = new Queue();
```

```
toDoList.push(new ToDoItem("Go to the store"))
```

```
toDoList.push(new ToDoItem("Vaccum the house"))
```

```
toDoList.pop()
```

Reflect on your learning and your needs. After this class meeting, how prepared do you feel you are for the final exam?  
How do you plan to study for it?

I feel like I'm fairly well prepared. Would definitely need to practice linkedlists, stacks, queues more. I plan to review the meet file codes, the labs I've done, and feedback I've got on those labs to study.