

1 Reading.

Chapters 1-2.

2 Book Problems.

- 1.5 (write function in Java or C++, you do not have to write a full program),
- 1.8 (parts a and b), and
- 2.2 (for each part explain why).

3 Additional Problems.

1. Write integer addition and integer multiply functions (in Java or C++) that take as inputs two n -element arrays of digits and outputs an array of the appropriate length. Assume each digit is an `int` between 0 and 9. Your routines might be called as follows:

```
int[] a = new int[n];
int[] b = new int[n];
int[] c,d;
```

...

```
c = add(a,b);
d = mult(a,b);
```

Give the runtime in big-oh notation of your two functions. (You do not have to write a full program.)