**Exercise 1**

Create a function addTwo that accepts one input and adds 2 to it.

console.log(addTwo(3)) should output 5  
and  
console.log(addTwo(10))  
should output 12

**Exercise 2**

Create a function addS that accepts one input and adds an "s" to it.

console.log(addS("pizza")); should output pizzas and console.log(addS("bagel")); should output bagels

**Exercise 3**

Create a function called map that takes two inputs:  
an array of numbers (a list of numbers)  
a 'callback' function - a function that is applied to each element of the array (inside of the function 'map')  
Have map return a new array filled with numbers that are the result of using the 'callback' function on each element of the input array.

console.log(map([1, 2, 3], addTwo)); should output [ 3, 4, 5 ]

**Exercise 4**

The function forEach takes an array and a callback, and runs the callback on each element of the array. forEach does not return anything.

let alphabet = "";

const letters = ["a", "b", "c", "d"];

forEach(letters, function (char) {

alphabet += char;

});

console.log(alphabet);

should output abcd

**Exercise 5**

Rebuild your map function, this time instead of using a for loop, use your own forEach function that you just defined. Call this new function mapWith.

console.log(mapWith([1, 2, 3], addTwo)); should output [ 3, 4, 5 ]

**Exercise 6**

The function reduce takes an array and reduces the elements to a single value. For example it can sum all the numbers, multiply them, or any operation that you can put into a function.

const nums = [4, 1, 3];

const add = function (a, b) {

return a + b;

};

console.log(reduce(nums, add, 0))

should output 8.

**Exercise 7**

Construct a function intersection that compares input arrays and returns a new array with elements found in all of the inputs. BONUS: Use reduce!

console.log(

intersection([5, 10, 15, 20], [15, 88, 1, 5, 7], [1, 10, 15, 5, 20])

);

Should output [5, 15]