Arrays Practice Questions

Ш	the sum of all elements in the array.
	Create a function that takes an array of integers and its size as arguments and returns the average of all elements.
	Write a function that takes an array of integers and its size and finds the maximum value in the array.
	Create a function that takes an array of integers and its size and reverses the array in place.
	Write a function that takes an integer array and its size and returns the index of the first occurrence of a given target value. If the target is not found, return -1.
	Write a function that takes two integer arrays and their sizes and returns a new array that is the concatenation of the two input arrays.
	Create a function that takes an integer array and its size and removes duplicate elements, modifying the array to contain only unique elements.
	Write a function that takes an integer array and its size and finds the second largest element in the array.
	Create a function that takes an integer array and its size and checks if the array is sorted in ascending order. Return true if it is, otherwise return false.
	Create a function that takes an integer array and its size and finds the pair of elements with the smallest difference.
	Write a function that takes an integer array and its size and finds the most frequent element in the array.

Create a function that takes an integer array and its size and counts the number of prime numbers in the array.
Write a function that takes an integer array and its size and finds the sum of all even elements and all odd elements separately.
Write a function that takes an integer array and its size, and returns the smallest element in the array.
Create a function that takes an array of integers and its size and finds the total number of even and odd elements in the array.
Write a function that takes an integer array and its size and counts how many elements are greater than a given threshold value.
Create a function that takes an integer array and its size and checks if all elements in the array are unique (no duplicates). Return true if they are, otherwise return false.
Write a function that takes an array of integers and its size and returns the product of all elements in the array.
Create a function that takes an array of integers and its size and checks if any two elements in the array add up to a given sum. Return true if such a pair exists, otherwise return false.
Write a function that takes an integer array and its size and finds the difference between the maximum and minimum elements in the array.
Write a function that takes a character array and its length and counts the number of vowels in the string.
Create a function that takes a character array and its length, and converts all lowercase letters to uppercase.