**Guvi tasks 4**

**Functions**

1. Print odd numbers in an array

function printOddNumbers(arr) {

for (let i = 0; i < arr.length; i++) {

if (arr[i] % 2 !== 0) {

console.log(arr[i]) }}}

1. Convert all the strings to title caps in a string array

(function () var hello = "guvigreek" console.log(hello.toUpperCase()); })();

1. Sum of all numbers in an array

function sums(a1, a2, a3){ return a1 + a2 + a3; } let result= sums(10, 12, 13);console.log(result);

1. Return all the prime numbers in an array

const generatePrimes = (max) => const isPrime = (num) => {

if (num <= 1) return false;

if (num <= 3) return true;

if (num % 2 === 0 || num % 3 === 0) return false let i = 5;

while (i \* i <= num) {

if (num % i === 0 || num % (i + 2) === 0) return false;

i += 6; return true; }const primes = []; for (let i = 2; i <= max; i++) if (isPrime(i)) { primes.push( )} return primes; };

1. Return all the palindromes in an array

const isPalindrome = (str) => {const cleanStr = str.toLowerCase().replace(/[^a-zA-Z0-9]/g, '');

const reversedStr = cleanStr.split('').reverse().join('');

return cleanStr === reversedStr };

1. Return median of two sorted arrays of the same size.

const findMedianSortedArrays = (nums1, nums2) => {

const mergedArray = [...nums1, ...nums2].sort((a, b) => a - b);

const mid = Math.floor(mergedArray.length / 2) if (mergedArray.length % 2 === 0) {

return (mergedArray[mid - 1] + mergedArray[mid]) / 2;

} else {

return mergedArray[mid];} };const nums1 = [1, 3]; const nums2 = [2, 4];

const median = findMedianSortedArrays(nums1, nums2);console.log("Median:", median);

1. Remove duplicates from an array

const myArray = [1, 2, 2, 3, 4, 4, 5];

const uniqueArray = removeDuplicates(myArray);

console.log("Array with duplicates removed:", uniqueArray);

1. Rotate an array by k times: const myArray = [1, 2, 3, 4, 5]; const k = 2;

const rotatedArray = rotateArray(myArray, k);console.log("Rotated array:", rotatedArray);

2. arrow functions

1. Print odd numbers in an array

const printOddNumbers = (arr) => { arr.forEach((num) => {

if (num % 2 !== 0) { console.log(num); })

1. Convert all the strings to title caps in a string array
2. Sum of all numbers in an array

function sums(a1, a2, a3){ return a1 + a2 + a3; } let result= sums(10, 12, 13);console.log(result);

1. Return all the prime numbers in an array

const primesUpTo50 = (() => generatePrimes(50))();

console.log("Prime numbers up to 50:", primesUpTo50);

1. Return all the palindromes in an array

const findPalindromes = (arr) => {

return arr.filter((str) => isPalindrome(str));};