//Retos de código

//Reto 1

function computeAverageLengthOfWords (str1,str2){

return (str1.length+str2.length)/2;

}

computeAverageLengthOfWords('code', 'programs');

//Reto 2

function addArrayProperty(obj, key, array){

obj[key]=array;

}

var myObj = {};

var myArray = [1, 3];

addArrayProperty(myObj, 'myProperty', myArray);

myObj.myProperty;

//Reto 3

function getNthElement(arr,value){

return arr[value];

}

var output = getNthElement([1, 3, 5], 1);

console.log(output);

//Reto 4

function removeStringValuesLongerThan(num, obj) {

var properties = Object.keys(obj);

for (var i = 0; i<properties.length ; i++){

if(obj[properties[i]].length > num){

delete obj[properties[i]];

}

}

return obj;

}

var obj = {

name: 'Montana',

age: 20,

location: 'Texas'

};

removeStringValuesLongerThan(6, obj);

console.log(obj);

//Reto 5

function convertDoubleSpaceToSingle(str){

return (str.split(" ")).join(" ");

}

var output = convertDoubleSpaceToSingle("string with double spaces");

console.log(output);

//Reto 6

function areValidCredentials(name,password){

var out;

(name.length>3 && password.length>=8)? out=true : out=false ;

return out;

}

var output = areValidCredentials('Ritu', 'mylongpassword');

console.log(output);

//Reto 7

function getElementOfArrayProperty(obj, key, index) {

var properties = Object.keys(obj);

if(properties == key){

var str = obj[key][index];

}

return (typeof str === "number")? str: undefined ;

}

var obj = {

key: ['Jamil', 'Albrey']

};

var output = getElementOfArrayProperty(obj, 'key', 0);

console.log(output);

//Reto 8

function findPairForSum (arr,value){

var sumandos = [];

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

for(var j=i+1; j<arr.length ; j++){

if(arr[i]+arr[j] === value){

sumandos.push(arr[i],arr[j]);

}

}

}

return sumandos;

};

var pair = findPairForSum([3, 34, 4, 12, 5, 30, 60], 90);

console.log(pair);

//Reto 9

var customerData = {

'Joe': {

visits: 1

},

'Carol': {

visits: 2

},

'Howard': {

visits: 3

},

'Carrie': {

visits: 4

}

};

function greetCustomer(firstName) {

var greeting = '';

var names = Object.keys(customerData);

if(names.includes(firstName)===false){greeting+='Welcome! Is this your first time?';}

else if(customerData[firstName]['visits']==1){greeting+='Welcome back, '+firstName+"! We're glad you liked us the first time!";}

else if(customerData[firstName]['visits']>1){greeting+='Welcome back, '+firstName+'! So glad to see you again!';}

return greeting;

}

//Reto 10

function filterOddElements(array) {

var arr=[];

for (var i=0; i<array.length; i++){

if(array[i]%2===1){arr.push(array[i])};

}

return arr;

}

var output = filterOddElements([1, 2, 3, 4, 5]);

console.log(output);

//Reto 11

function findShortestWordAmongMixedElements(arr) {

var resultado = "";

var len = arr.length;

var min = Infinity;

while(len--){

if(arr[len].length<Infinity){

min = arr[len];

}

}

return (min!==Infinity) ? min : resultado;

}

//Reto 12

function findSmallestNumberAmongMixedElements(arr) {

var len = arr.length, min = Infinity;

while (len--) {

if (arr[len] < min) {

min = arr[len];

}

}

return (min !== Infinity) ? min : "";

}

// Reto 13

function getLongestWordOfMixedElements(arr) {

var max= "";

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

if(arr[i].length>max.length){

max = arr[i]

}

}

return max;

}

//Reto 14

function getLargestNumberAmongMixedElements(arr) {

var max = 0;

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

if(arr[i]>max && typeof arr[i]== "number"){

max= arr[i];

}

}

return max;

}

//Reto 15

function computeSumOfAllElements(arr) {

var sum = 0;

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

sum+= arr[i];

}

return sum;

}

//Reto 16

function transformFirstAndLast(arr) {

var obj = {};

obj[arr[0]]=arr[arr.length-1];

return obj;

}

//Reto 17

function getAllKeys(obj) {

var names = Object.keys(obj);

return names;

}

//Reto 18

function fromListToObject(arr) {

var obj = {};

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

obj[arr[i][0]] = arr[i][1];

}

return obj;

}

//Reto 19

function listAllValues(obj) {

var properties = Object.keys(obj);

var arr = [];

for (var i=0;i<properties.length;i++){

arr.push(obj[properties[i]])

}

return arr;

}

//Reto 20

function transformEmployeeData(arr) {

var newArray=[];

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

var obj={};

for(var j=0;j<arr[i].length; j++){

obj[arr[i][j][0]] = arr[i][j][1];

}

newArray.push(obj);

}

return newArray;

}

//Reto 21

function convertObjectToList(obj) {

var arr=[];

var properties = Object.keys(obj);

for(var i=0; i<properties.length; i++){

var array=[properties[i],obj[properties[i]]];

arr.push(array);

}

return arr;

}

//Reto 22

function computeSumBetween(num1, num2) {

var sum= 0;

for (var i=num1;i<num2; i++){

sum += i;

}

return sum;

}

//Reto 23

function getLongestOfThreeWords(word1, word2, word3) {

var arr = [word1,word2,word3]

var max= arr[0];

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

if(arr[i].length>max.length){max = arr[i];}

}

return max;

}

//Reto 24

function findShortestOfThreeWords(word1, word2, word3) {

var arr = [word1,word2,word3]

var min= arr[0];

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

if(arr[i].length<min.length){min = arr[i];}

}

return min;

}

//Reto 25

function calculateBillTotal(preTaxAndTipAmount) {

var bill = (preTaxAndTipAmount\*9.5)/100;

var tips = (preTaxAndTipAmount\*15)/100;

var suma= preTaxAndTipAmount + bill + tips;

return suma;

}

//Reto 26

function convertScoreToGrade(score) {

var nota;

if(score<=100 && score>=90){nota = "A";}

else if(score<=89 && score>=80){nota = "B";}

else if(score<=79 && score>=70){nota = "C";}

else if(score<=69 && score>=60){nota = "D";}

else if (score<=59 && score>=0){nota = "F";}

else{nota = "PUNTUACION INVALIDA"}

return nota;

}

//Reto 27

function getSumOfAllElementsAtProperty(obj, key) {

var sum =0;

var arr =obj [key] || 0;

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

sum += arr[i];

}

return sum;

}

//Reto 28

function getProductOfAllElementsAtProperty(obj, key) {

var producto=1;

var arr =obj[key] || 0;

if(typeof arr === "object"){

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

producto \*= arr[i];

}

}

return (producto !==1) ? producto :0 ;

}

//Reto 29

function addObjectProperty(obj1, key, obj2) {

obj1[key]=obj2;

}

//Reto 30

function addFullNameProperty(obj) {

obj["fullName"]= obj["firstName"]+" "+obj["lastName"];

}