**Bagian 1. Ubahlah syntax ES5 berikut ke dalam ES6**

**1.**

function calculateAge(birthYear){

return 2019 - birthYear;

}

function yearUntilRetirement(object){

var age = calculateAge(object.year);

var retirement = 60 - age;

if(retirement > 0){

console.log(object.firstName + ' retires in '+ retirement + ' years');

} else {

console.log(object.firstName + ' is already retired.');

}

}

yearUntilRetirement({year: 1987, firstName: 'John'});

ES6:

const calculateAge = (birthYear) => {

return 2019 - birthYear;

}

const yearUntilRetirement = (object) => {

let age = calculateAge(object.year);

let retirement = 60 - age;

if (retirement > 0) {

console.log(`${object.firstName} retires in ${retirement} years`)

} else {

console.log(`${object.firstName} is already retired`)

}

}

yearUntilRetirement({year: 1987, firstName: 'John'});

**2.**

const addNumber = (a, b, c, d, e, f, g) => {

var numbers = [a, b, c, d, e, f, g];

var sum = 0;

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

sum += numbers[i];

}

return sum;

}

console.log(addNumber(1,2,3,4,5,6,7));

**NOTE**: please use the map function

**3.**

var phi = 3.14;

var power = 2;

var radius = 0;

var calculateArea = function (obj) {

return phi \* Math.pow(obj.radius, obj.power);

};

radius = 21;

var area21 = calculateArea({radius: radius, power: 2 });

radius = 7;

var area7 = calculateArea({radius: radius, power: 2 });

console.log('area with 21 radius: ' + area21 + ', and area with 7 radius: ' + area7);

ES6:

let phi = 3.14

let power = 2;

let radius = 0;

const calculateArea = (obj) => {

return phi \* Math.pow(obj.radius, obj.power);

}

radius = 21;

let area21 = calculateArea({radius: radius, power: 2});

radius = 7;

let area7 = calculateArea({radius: radius, power: 2});

console.log(`area with 21 radius: ${area21}, and area with 7 radius: ${area7}`)

**4.**

const makeAjaxRequest = (url, method) => {

if(!method){

method = ‘GET’

}

console.log(url, method);

}

makeAjaxRequest(‘www.google.com’);

ES6:

const makeAjaxRequest = async (url) => {

fetch(url)

.then(response => response.json())

}

**Bagian 2. Tulislah kode program dari soal berikut.**

1. Buat sebuah function warnaKesukaan dengan parameter warna, berikan "putih" sebagai default parameter untuk warna dan kembalikan "Warna kesukaan saya adalah " + warna.(Note: Gunakan arrow function dan Template literals).

Answer:

const warnaKesukaan = (warna='putih') => {

console.log(`Warna kesukaan saya adalah ${warna}`)

}

1. Gunakan *spread operator* untuk menggabungkan namaBuah1 dan namaBuah2, dan masukkan hasilnya ke dalam semuaNamaBuah. semuaNamaBuah harus sama dengan ["apel", "mangga", "sirsak", "semangka"]

let namaBuah1 = ['apel', 'mangga'];

let namaBuah2 = ['sirsak', 'semangka'];

let semuaNamaBuah;

// Tulis kode kalian di bawah ini

let namaBuah1 = ["Apel", "Mangga"]

let namaBuah2 = ["Sirsak", "Semangka"]

let semuaNamaBuah = [...namaBuah1, ...namaBuah2]