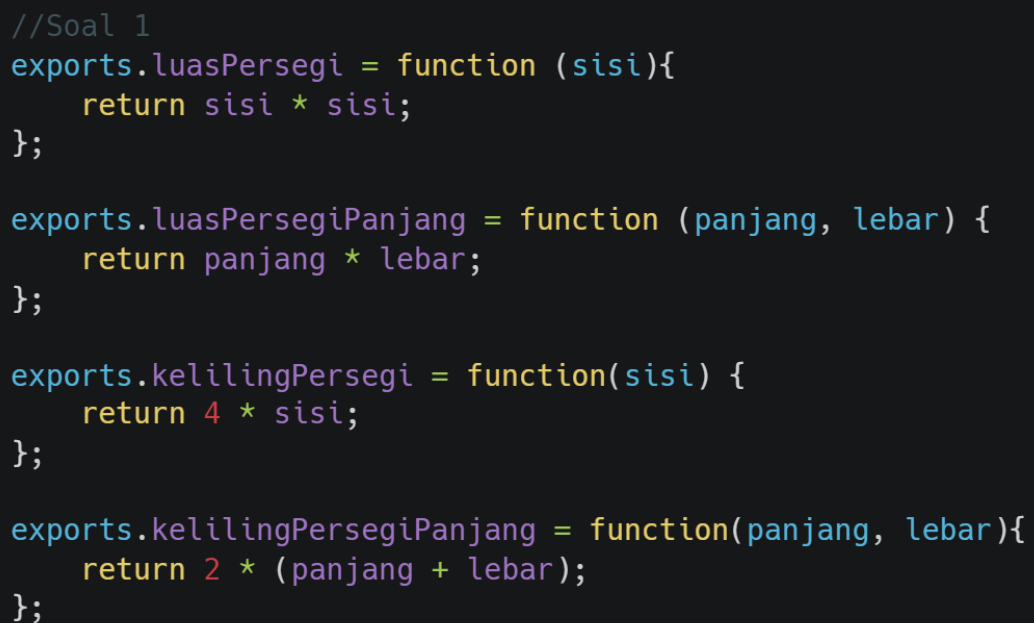# HomeWork - Week 7 - Node JS & Restfull API

Dzulfikar Fathin A

soal 1 :

- membuat rumus keliling dan luas persegi dan persegi panjang di file keliling&luas.js

```
//Soal 1
exports.luasPersegi = function (sisi){
    return sisi * sisi;
};

exports.luasPersegiPanjang = function (panjang, lebar) {
    return panjang * lebar;
};

exports.kelilingPersegi = function(sisi) {
    return 4 * sisi;
};

exports.kelilingPersegiPanjang = function(panjang, lebar){
    return 2 * (panjang + lebar);
};
```

- panggil dalam file soal1.js menggunakan require

```
// Soal 1
const rumus = require('./Keliling&Luas');

const kelilingPersegi = rumus.kelilingPersegi(5);
const kelilingPersegiPanjang = rumus.kelilingPersegiPanjang(8,5);
const luasPersegi = rumus.luasPersegi(5);
const luasPersegiPanjang = rumus.luasPersegiPanjang(10,7);

console.log("Keliling Persegi =", kelilingPersegi);
console.log("Keliling Persegi Panjang =", kelilingPersegiPanjang);
console.log("Luas Persegi =", luasPersegi);
console.log("Luas Persegi Panjang =" ,luasPersegiPanjang);
```

Soal 2 :

- membuat file bernama soal2.js dan membuat logika agar membuat file baru bernama log.txt yang berisi copy homework github yang berada di soal.

```javascript
// Soal 2
const fs = require('fs');
const payload = `
03/22 08:54:24 INFO   :......rsvp_flow_stateMachine: state RESVED, event T1OUT
03/22 08:54:24 TRACE  :.......rsvp_action_nHop: constructing a PATH
03/22 08:54:24 TRACE  :.......flow_timer_start: started T1
03/22 08:54:24 TRACE  :......rsvp_flow_stateMachine: reentering state RESVED
03/22 08:54:24 TRACE  :.......mailslot_send: sending to (9.67.116.99:0)
03/22 08:54:35 TRACE  :......rsvp_event_mapSession: Session=9.67.116.99:1047:6 exists
 24
03/22 08:54:35 EVENT  :.....api_reader: api request SENDER_WITHDRAW
03/22 08:54:35 INFO   :.......rsvp_flow_stateMachine: state RESVED, event PATHTEAR
 25
03/22 08:54:35 TRACE  :........traffic_action_oif: is to remove filter
03/22 08:54:35 INFO   :.........qosmgr_request: Ioctl to remove reservation successful
03/22 08:54:35 INFO   :.........rpapi_Reg_UnregFlow: RSVPRemActionName:  Entering

03/22 08:54:35 INFO   :.........rpapi_Reg_UnregFlow: ReadBuffer:  Entering

03/22 08:54:35 INFO   :.........rpapi_Reg_UnregFlow: ReadBuffer:  Exiting

03/22 08:54:35 INFO   :.........rpapi_Reg_UnregFlow: RSVPRemActionName:  Result = 0

03/22 08:54:35 INFO   :.........rpapi_Reg_UnregFlow: RSVPRemActionName:  Exiting

etc.
`

fs.writeFile('log.txt', payload, (err, data) => {
    if ( err ) { console.error(err) };

    console.log("Data succsessfuly writed")
});

fs.readFile('log.txt', 'utf-8', (err, data) => {
    if ( err ) { console.error(err) };

    console.log("Data :", data);
});
```

Dokumentasi :

Keliling&Luas.js

```javascript
// Soal 1
exports.luasPersegi = function (sisi){
    return sisi * sisi;
};

exports.luasPersegiPanjang = function (panjang, lebar) {
    return panjang * lebar;
};

exports.kelilingPersegi = function(sisi) {
    return 4 * sisi;
};

exports.kelilingPersegiPanjang = function(panjang, lebar){
    return 2 * (panjang + lebar);
};
```

---

soal1.js

```javascript
// Soal 1
const rumus = require('./Keliling&Luas');

const kelilingPersegi = rumus.kelilingPersegi(5);
const kelilingPersegiPanjang = rumus.kelilingPersegiPanjang(8,5);
const luasPersegi = rumus.luasPersegi(5);
const luasPersegiPanjang = rumus.luasPersegiPanjang(10,7);

console.log("Keliling Persegi =", kelilingPersegi);
console.log("Keliling Persegi Panjang =", kelilingPersegiPanjang);
console.log("Luas Persegi =", luasPersegi);
console.log("Luas Persegi Panjang =" ,luasPersegiPanjang);
```

JS soal2.js > ...

```javascript
1   const fs = require('fs');
2   const payload = `
3   03/22 08:54:24 INFO    :......rsvp_flow_stateMachine: state RESVED, event T1OUT
4   03/22 08:54:24 TRACE   :.......rsvp_action_nHop: constructing a PATH
5   03/22 08:54:24 TRACE   :.......flow_timer_start: started T1
6   03/22 08:54:24 TRACE   :......rsvp_flow_stateMachine: reentering state RESVED
7   03/22 08:54:24 TRACE   :.......mailslot_send: sending to (9.67.116.99:0)
8   03/22 08:54:35 TRACE   :......rsvp_event_mapSession: Session=9.67.116.99:1047:6 exists
9    24
10  03/22 08:54:35 EVENT   :......api_reader: api request SENDER_WITHDRAW
11  03/22 08:54:35 INFO    :......rsvp_flow_stateMachine: state RESVED, event PATHTEAR
12   25
13  03/22 08:54:35 TRACE   :........traffic_action_oif: is to remove filter
14  03/22 08:54:35 INFO    :.........qosmgr_request: Ioctl to remove reservation successful
15  03/22 08:54:35 INFO    :.........rpapi_Reg_UnregFlow: RSVPRemActionName:  Entering
16
17  03/22 08:54:35 INFO    :.........rpapi_Reg_UnregFlow: ReadBuffer:  Entering
18
19  03/22 08:54:35 INFO    :.........rpapi_Reg_UnregFlow: ReadBuffer:  Exiting
20
21  03/22 08:54:35 INFO    :.........rpapi_Reg_UnregFlow: RSVPRemActionName:  Result = 0
22
23  03/22 08:54:35 INFO    :.........rpapi_Reg_UnregFlow: RSVPRemActionName:  Exiting
24
25  03/22 08:54:35 INFO    :.........rpapi_Reg_UnregFlow: flow[sess=9.67.116.99:1047:6,
26  source=9.67.116.98:8000] unregistered from CLCat2
27  03/22 08:54:35 EVENT   :.........qosmgr_response: DELRESP from qosmgr, reason=0, qoshandle=0
28  03/22 08:54:35 INFO    :.........qosmgr_response: src-9.67.116.98:8000 dst-9.67.116.99:1047 proto-6
29  03/22 08:54:35 TRACE   :...........traffic_reader: tc response msg=3, status=1
30   26
31  03/22 08:54:35 TRACE   :.........rsvp_action_nHop: constructing a PATHTEAR
32  03/22 08:54:35 TRACE   :.........flow_timer_stop: stopped T1
```

> OUTLINE
> TIMELINE

JS soal2.js > ...

```javascript
56  03/22 08:54:53 INFO    :......term_policyAPI: APITerminate:  Entering
57
58  03/22 08:54:53 INFO    :......term_policyAPI: APITerminate:  Exiting
59
60  03/22 08:54:53 INFO    :......term_policyAPI: Policy API terminated
61  03/22 08:54:53 INFO    :......dreg_process: deregistering process with the system
62  03/22 08:54:53 INFO    :......dreg_process: attempt to dereg (ifaeddrg_byaddr)
63  03/22 08:54:53 INFO    :......dreg_process: rc from ifaeddrg_byaddr  rc =0
64  03/22 08:54:53 INFO    :.....terminator: process terminated with exit code 0
65  `
66
67  fs.writeFile('log.txt', payload, (err, data) => {
68      if ( err ) { console.error(err) };
69
70      console.log("Data succsessfuly writed")
71  });
72
73  fs.readFile('log.txt', 'utf-8', (err, data) => {
74      if ( err ) { console.error(err) };
75
76      console.log("Data :", data);
77  });
78
```

> OUTLINE
> TIMELINE

sekian dan terimakasih.