

## Beginner Golang

### ACTIVITY 8

(Web Server GO, JSON, dan Polymer)

Format save : **Pert8\_Act1\_nama\_npm.docx**

Soal !

1. Buatlah program API sederhana dengan format data JSON. Kode dan output dpat dilihat pada video Activity JSON.mp4 (**Poin 50**)
2. Buatlah program untuk menampilkan data pada soal nomor 1 dalam sebuah tampilan HTML. Kode dan output dpat dilihat pada video Activity JSON Web.mp4 (**Poin 50**)

Jawaban

1. Kodingan

```
package main

import (
    "encoding/json"
    "fmt"
    "net/http"
)

func main() {
    http.HandleFunc("/api/mahasiswa", user)

    fmt.Println("Web berjalan pada port 8005")

    http.ListenAndServe(":8005", nil)
}

type lepkom struct {
    Nama    string `json:"nama_mahasiswa "`
    Kursus  string `json:"kursus_mahasiswa"`
    Foto    string `json:"foto_mahasiswa"`
}

var data_mahasiswa = []lepkom{
    {
        Nama:    "Didin",
        Kursus:  "Beginer web",
        Foto:    "img/gambar1.jpg",
    },
}

func user(w http.ResponseWriter, r *http.Request) {
    w.Header().Set("Content-type", "application/json")
```

```

    if r.Method == http.MethodGet {
        result, err := json.Marshal(data_mahasiswa)

        if err != nil {
            http.Error(w, err.Error(), http.StatusInternalServerError)
            return
        }

        w.Write(result)
        return
    }
}
2.

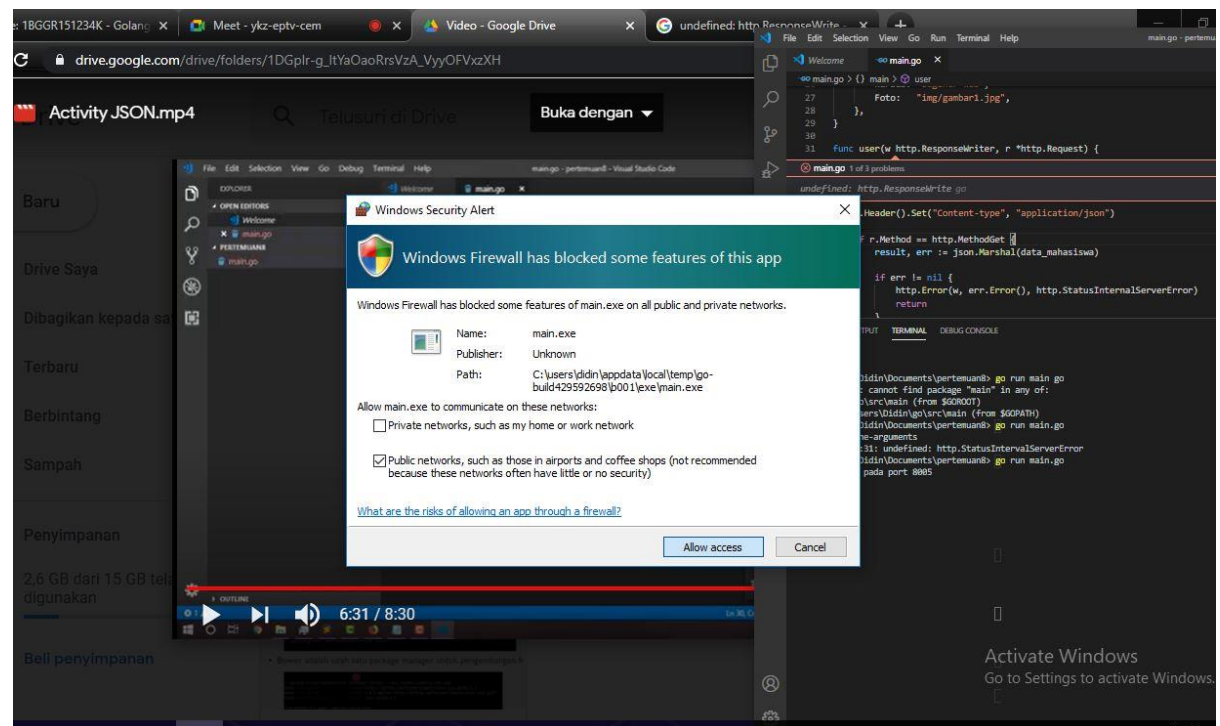
```

Perintah untuk menjalankan program

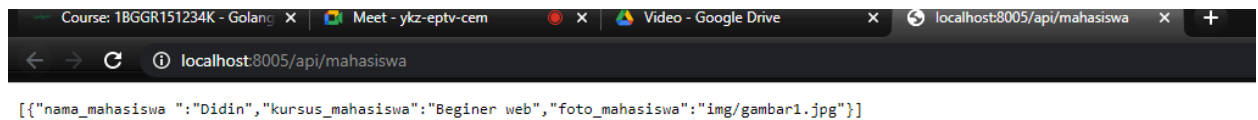
```

PS C:\Users\Didin\Documents\pertemuan8> go run main.go
package main: cannot find package "main" in any of:
  C:\Go\src\main (from $GOROOT)
  C:\Users\Didin\go\src\main (from $GOPATH)
PS C:\Users\Didin\Documents\pertemuan8> go run main.go
# command-line-arguments
.\main.go:38:31: undefined: http.StatusInternalServerError
PS C:\Users\Didin\Documents\pertemuan8> go run main.go
Web berjalan pada port 8085

```



## Output Program



## 3. Kodingan

Main.go

```
package main

import (
    "encoding/json"
    "fmt"
    "net/http"
)

func main() {
    http.Handle("/", http.FileServer(http.Dir("polymer-starter-kit")))
    http.HandleFunc("/api/mahasiswa", user)

    fmt.Println("Web berjalan pada port 8075")

    http.ListenAndServe(":8075", nil)
}

type lepkom struct {
    Nama    string `json:"nama_mahasiswa "`
    Kursus  string `json:"kursus_mahasiswa"`
    Foto    string `json:"foto_mahasiswa"`
}

var data_mahasiswa = []lepkom{
    {
        Nama:    "Didin",
        Kursus:  "Beginer web",
        Foto:    "img/gambar1.jpg",
    },
}

func user(w http.ResponseWriter, r *http.Request) {
    w.Header().Set("Content-type", "application/json")

    if r.Method == http.MethodGet {
```

```

        result, err := json.Marshal(data_mahasiswa)

        if err != nil {
            http.Error(w, err.Error(), http.StatusInternalServerError)
            return
        }

        w.Write(result)
        return
    }
}

```

Myview1.html

```

<!--
@license
Copyright (c) 2016 The Polymer Project Authors. All rights reserved.
This code may only be used under the BSD style license found at http://polymer
.github.io/LICENSE.txt
The complete set of authors may be found at http://polymer.github.io/AUTHORS.t
xt
The complete set of contributors may be found at http://polymer.github.io/CONT
RIBUTORS.txt
Code distributed by Google as part of the polymer project is also
subject to an additional IP rights grant found at http://polymer.github.io/PAT
ENTS.txt
-->

<link rel="import" href="../../bower_components/polymer/polymer-element.html">
<link rel="import" href="../../bower_components/iron-ajax/iron-ajax.html">
<link rel="import" href="shared-styles.html">

<dom-module id="my-view1">
  <template>
    <style include="shared-styles">
      :host {
        display: block;

        padding: 10px;
      }
      .card{
        width:24%;
        display: inline-block;
        overflow: hidden;
      }

      .gambar{
        width:100%;
        height:100px;
      }
    </style>
  </template>
</dom-module>

```

```

</style>

<center><h1>Daftar Nama Mahasiswa Kursus Lepkom</h1></center>
<template is="dom-repeat" items="[[data]]">
  <div class="card">
    
    <p>Nama : [[item.nama_mahasiswa]]</p>
    <p>Kursus : [[item.kursus_mahasiswa]]</p>
  </div>
</template>
<iron-ajax
  auto
  url="/api/mahasiswa"
  handle-as="json"
  method="GET"
  on-response="_handleResponse"
  debounce-duration="300">
</iron-ajax>
</template>

<script>
class MyView1 extends Polymer.Element {
  static get is() { return 'my-view1'; }
  static get properties(){
    return{
      data : {
        type : Object,
        notify : true,
      }
    }
  }

  _handleResponse(e){
    this.data = e.detail.response
  }
}

window.customElements.define(MyView1.is, MyView1);
</script>
</dom-module>

```

Running program

```

PROBLEMS  OUTPUT  TERMINAL  DEBUG CONSOLE

Windows PowerShell
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PS C:\Users\Didin\Documents\pertemuan8> go run main.go
Web berjalan pada port 8085
PS C:\Users\Didin\Documents\pertemuan8> 

```

## Output Program

