

Application Architecture

Our application has an MVC architecture, stands for Model, View, and Controller, it separates our application into three components **Model**, **View**, and **Controller**.

.config	09/02/2021 10:49 PM	Dossier de fichiers	
bin	17/02/2021 7:18 PM	Dossier de fichiers	
ClientApp	21/06/2021 12:15 PM	Dossier de fichiers	⇒ Views
Controllers	16/03/2021 7:34 PM	Dossier de fichiers	
Data	16/03/2021 7:23 PM	Dossier de fichiers	
EmailSender	09/02/2021 11:22 PM	Dossier de fichiers	
Hubs	04/03/2021 12:42 PM	Dossier de fichiers	Contains Notification Configuration
Migrations	16/03/2021 7:25 PM	Dossier de fichiers	
Model	11/05/2021 3:25 PM	Dossier de fichiers	
node_modules	09/02/2021 11:22 PM	Dossier de fichiers	
obj	16/03/2021 8:39 PM	Dossier de fichiers	
Pages	09/02/2021 11:23 PM	Dossier de fichiers	
Properties	09/02/2021 11:23 PM	Dossier de fichiers	
wwwroot	09/02/2021 11:23 PM	Dossier de fichiers	Contains users Uploaded Files
.gitignore	05/04/2020 12:08 PM	Fichier source Git I...	4 Ko
appsettings.Development	05/04/2020 12:08 PM	Fichier source JSON	1 Ko
appsettings	30/01/2021 2:50 AM	Fichier source JSON	1 Ko
package-lock	07/08/2020 12:06 AM	Fichier source JSON	4 Ko
Program.cs	07/08/2020 12:06 AM	Visual C# Source F...	1 Ko
Startup.cs	04/03/2021 12:30 PM	Visual C# Source F...	9 Ko
WeatherForecast.cs	05/04/2020 12:08 PM	Visual C# Source F...	1 Ko
WebApplicationPlateforme	11/05/2021 3:26 PM	Visual C# Project f...	7 Ko
WebApplicationPlateforme.csproj.user	21/06/2021 12:11 PM	Per-User Project O...	2 Ko

Frontend Part :

1. Views :

It's a user interface, it displays model data to the user and also enables them to modify. It's the Frontend part with angular which contains components with HTML, CSS and TS files.

Path					
Nom	Modifié le	Type	Taille		
FilesOrg	09/02/2021 11:21 PM	Dossier de fichiers		Component	
Finance	09/02/2021 11:21 PM	Dossier de fichiers			
Finances	09/02/2021 11:21 PM	Dossier de fichiers			
forbidden-page	09/02/2021 11:21 PM	Dossier de fichiers			
home	17/03/2021 12:18 AM	Dossier de fichiers			
mailing	09/02/2021 11:21 PM	Dossier de fichiers			
Maintenance	09/02/2021 11:21 PM	Dossier de fichiers			
menu	09/02/2021 11:21 PM	Dossier de fichiers			
Msg Interne	16/03/2021 7:27 PM	Dossier de fichiers			
nav-menu	11/04/2021 7:49 PM	Dossier de fichiers			
News	09/02/2021 11:21 PM	Dossier de fichiers			
Projets	09/02/2021 11:21 PM	Dossier de fichiers			
Reports	09/02/2021 11:21 PM	Dossier de fichiers			
RH	09/02/2021 11:21 PM	Dossier de fichiers			
RhDirServicesList	05/04/2021 11:12 AM	Dossier de fichiers			
Salaire	09/02/2021 11:21 PM	Dossier de fichiers			
ServiceRh	09/02/2021 11:21 PM	Dossier de fichiers			
shared	21/06/2021 12:51 PM	Dossier de fichiers		Files that contains : Interfaces, Models and Service in angular Part	
side-menu	07/03/2021 7:20 PM	Dossier de fichiers			
Supplies	09/02/2021 11:22 PM	Dossier de fichiers			
Tache	09/02/2021 11:22 PM	Dossier de fichiers			
Transfert Interne	09/02/2021 11:22 PM	Dossier de fichiers			
User	09/02/2021 11:22 PM	Dossier de fichiers			
user-register	09/02/2021 11:22 PM	Dossier de fichiers			
UserRoles	09/02/2021 11:22 PM	Dossier de fichiers			
UserServices	09/02/2021 11:22 PM	Dossier de fichiers			
voiture	09/02/2021 11:22 PM	Dossier de fichiers			
app.component	07/09/2020 7:42 PM	Fichier source HT...	1 Ko		

1.1 : Component :

ATTACHAGE					
souha > source > repos > WebAppSalek > WebApplicationPlateforme > ClientApp > src > app > Administration > ad					
Nom	Modifié le	Type	Taille		
# administration-list.component	07/08/2020 12:06 AM	Fichier source CSS	0 Ko		
administration-list.component	18/01/2021 4:20 PM	Fichier source HT...	7 Ko		
administration-list.component.spec	07/08/2020 12:06 AM	Fichier TS	1 Ko		
administration-list.component	07/08/2020 12:06 AM	Fichier TS	4 Ko		

1.2 : Shared :

It Contains Interfaces, Models , and Services .

a > source > repos > WebAppSalek > WebApplicationPlateforme > ClientApp > src > app > shared					
Nom	Modifié le	Type	Taille		
Enum	09/02/2021 11:21 PM	Dossier de fichiers			
Interfaces	09/02/2021 11:21 PM	Dossier de fichiers			
Models	16/03/2021 7:28 PM	Dossier de fichiers			
Services	16/03/2021 7:33 PM	Dossier de fichiers			
path-shared.service	21/06/2021 12:51 PM	Fichier TS	1 Ko		

Path file is the one who is responsible for defining the web api path.

```
TS path-shared.service.ts M x // return 'http://2rtq.w.time4vps.cloud/ Untitled-3
ClientApp > src > app > shared > TS path-shared.service.ts > PathSharedService > getPath
1 import { Injectable } from '@angular/core';
2
3 @Injectable({
4   providedIn: 'root'
5 })
6 export class PathSharedService {
7
8   constructor() { }
9
10  getPath() {
11    return 'http://localhost:49599/api'
12    // return 'http://2rtq.w.time4vps.cloud/api'
13    // return 'http://161.97.163.78:82/api'
14
15  }
16
17 }
18
```

Backend Part :

2. Models:

Model represents the shape of the data. A class in C# is used to describe a model. Model objects store data retrieved from the database.

```

C: > Users > khemi > source > repos > WebAppSalek > WebApplicationPlateforme > Model > AdministrativeCommunication > Decision >
1  using System;
2  using System.Collections.Generic;
3  using System.ComponentModel.DataAnnotations.Schema;
4  using System.Linq;
5  using System.Threading.Tasks;
6  using WebApplicationPlateforme.Model.User;
7
8  namespace WebApplicationPlateforme.Model.AdministrativeCommunication.Decision
9  {
10     public class Decision
11     {
12         public int Id { get; set; }
13         public string type { get; set; }
14         public string date { get; set; }
15         public string typeRecue { get; set; }
16         public string priorite { get; set; }
17         public string securite { get; set; }
18         public string nomOrg { get; set; }
19         public string nomProp { get; set; }
20         public string tel { get; set; }
21         public string registreCivil { get; set; }
22         public string numAutorite { get; set; }
23         public string sujet { get; set; }
24         public string typeEmise { get; set; }
25         public string nomLivreur { get; set; }
26         public string operationlivraison { get; set; }
27         public string orgEnregTr { get; set; }
28         public string autoriteExterne { get; set; }
29         public string copieExterne { get; set; }
30         public string copieA { get; set; }
31         public string nbPjNumerique { get; set; }

```

3. Controllers :

The controller handles the user request. Typically, the user uses the view and raises an HTTP request, which will be handled by the controller. The controller processes the request and returns the appropriate view as a response.

It Contains the Get, Put , Post , Delete Methods and provides an web api path to connect users requests.

```

C: > Users > khemi > source > repos > WebAppSalek > WebApplicationPlateforme > Controllers > CommunicationAdministrative > Emise > LiaisonEsController.cs
9  using WebApplicationPlateforme.Model.AdministrativeCommunication.Emise;
10
11  namespace WebApplicationPlateforme.Controllers.CommunicationAdministrative.Emise
12  {
13      [Route("api/[controller]")]
14      [ApiController]
15      public class LiaisonEsController : ControllerBase
16      {
17          private readonly FinanceContext _context;
18
19          public LiaisonEsController(FinanceContext context)
20          {
21              _context = context;
22          }
23
24          // GET: api/LiaisonEs
25          [HttpGet]
26          public async Task<ActionResult<IEnumerable<LiaisonE>>> GetliaisonsE()
27          {
28              return await _context.liaisonsE.ToListAsync();
29          }
30
31          // GET: api/LiaisonEs/5
32          [HttpGet("{id}")]
33          public async Task<ActionResult<LiaisonE>> GetLiaisonE(int id)
34          {
35              var liaisonE = await _context.liaisonsE.FindAsync(id);
36
37              if (liaisonE == null)
38              {
39                  return NotFound();

```

4. Startup:

The Startup class provides the entry point for an application, and is required for all applications. The place where we set up configuration and winnig up services.

Our Startup class defines a Configure method, and also define a ConfigureServices method, which will be called when the application is started.

Configure Method :

```

C:\> Users > khemi > source > repos > WebAppSalek > WebApplicationPlateforme > Startup.cs
159 // This method gets called by the runtime. Use this method to configure the HTTP request pipeline.
160 public void Configure(IApplicationBuilder app, IWebHostEnvironment env)
161 {
162     //Path for files
163     if (string.IsNullOrEmpty(env.WebRootPath)) env.WebRootPath = Path.Combine(Directory.GetCurrentDirectory(), "wwwroot");
164
165     //app.UseHangfireDashboard();
166
167     /* backgroundJobClient.Enqueue(() => Console.WriteLine("hello Hanfire Job"));
168
169     recurringJobManager.AddOrUpdate("Run every minute", () => Console.WriteLine("test reccuring job"), "* * * * *");*/
170
171     //Cron.Monthly
172     app.UseForwardedHeaders();
173     if (env.IsDevelopment())
174     {
175         app.UseDeveloperExceptionPage();
176         app.UseHttpsRedirection();
177     }
178     else
179     {
180         app.UseExceptionHandler("/Error");
181         // The default HSTS value is 30 days. You may want to change this for production scenarios, see https://aka.ms/aspnetcore-hsts.
182         app.UseHsts();
183     }
184
185     // app.UseHttpsRedirection();
186     // app.UseDefaultFiles();
187
188
189

```

ConfigureServices Method :

```

C:\> Users > khemi > source > repos > WebAppSalek > WebApplicationPlateforme > Startup.cs
28 namespace WebApplicationPlateforme
29 {
30     public class Startup
31     {
32         public Startup(IConfiguration configuration)
33         {
34             Configuration = configuration;
35         }
36
37         public IConfiguration Configuration { get; }
38
39         // This method gets called by the runtime. Use this method to add services to the container.
40         public void ConfigureServices(IServiceCollection services)
41         {
42             services.AddScoped<SmtpClient>((serviceProvider) =>
43             {
44                 var config = serviceProvider.GetRequiredService<IConfiguration>();
45                 return new SmtpClient()
46                 {
47                     Host = config.GetValue<String>("Email:Smtp:Host"),
48                     Port = config.GetValue<int>("Email:Smtp:Port"),
49                     Credentials = new NetworkCredential(
50                         config.GetValue<String>("Email:Smtp:Username"),
51                         config.GetValue<String>("Email:Smtp:Password")
52                     )
53                 };
54             });
55             //Inject Hangfire
56             /* services.AddHangfire(config =>
57                 config.SetDataCompatibilityLevel(CompatibilityLevel.Version_170)

```

5. AppSettings:

Gets current application's default configuration.

Users > khemi > source > repos > WebAppSalek > WebApplicationPlateforme > {} appsettings.json > ...

```
"ConnectionStrings": {
  "DefaultConnection": "Server=127.0.0.1;Port=5432;Database=PlateformeDB;User Id=souha;Password=rouge2010;Integrated Security=true;Pooling=true",
},
//Key for JWT Authentication
DataBase Name      UserName

"ApplicationSettings": {
  "JWT_Secret": "1234567890123456",      Authentication Token
  "Client_URL": "http://localhost:4200"
},

"Email": {
  "Smtp": {
    "Host": "smtp.gmail.com",
    "Port": 587,
    "Username": "souhakhemiri20@gmail.com",      Email Server Configuration
    "Password": "~~~~~"
  }
},

"Logging": {
  "LogLevel": {
    "Default": "Information",
    "Microsoft": "Warning",
    "Microsoft.Hosting.Lifetime": "Information"
  }
},
"AllowedHosts": "*"
}
```