

Modul 8

Middleware - Autentikasi – login/logout

Persiapan (1)


- Buat Tabel 'users'
 - Buat tabel, isi data user (username, password)
- Buat Model 'User_m' extends Authenticatable
- Konfigurasi middleware autentikasi (app\Http\Kernel.php)
 - Auth → otentikasi user (proses login)
 - config/auth.php → konfigurasi nama model user
 - app\Providers\RouteServiceProvider.php → konfigurasi const HOME
 - app\Http\Middleware\Authenticate.php → konfigurasi route 'login' di web.php
 - Guest → tanpa login

Persiapan (2)

- Buat view form login
- Modifikasi PerpusController
 - Tambah fungsi login() → menampilkan form login
- Buat LoginController
 - Fungsi authenticate() → untuk login
 - Fungsi logout()
- Modifikasi file view 'perpus/main.blade' → tambah tombol logout
- Modifikasi route 'route/web.php'
- Terapkan middleware 'auth' dan 'guest' pada route

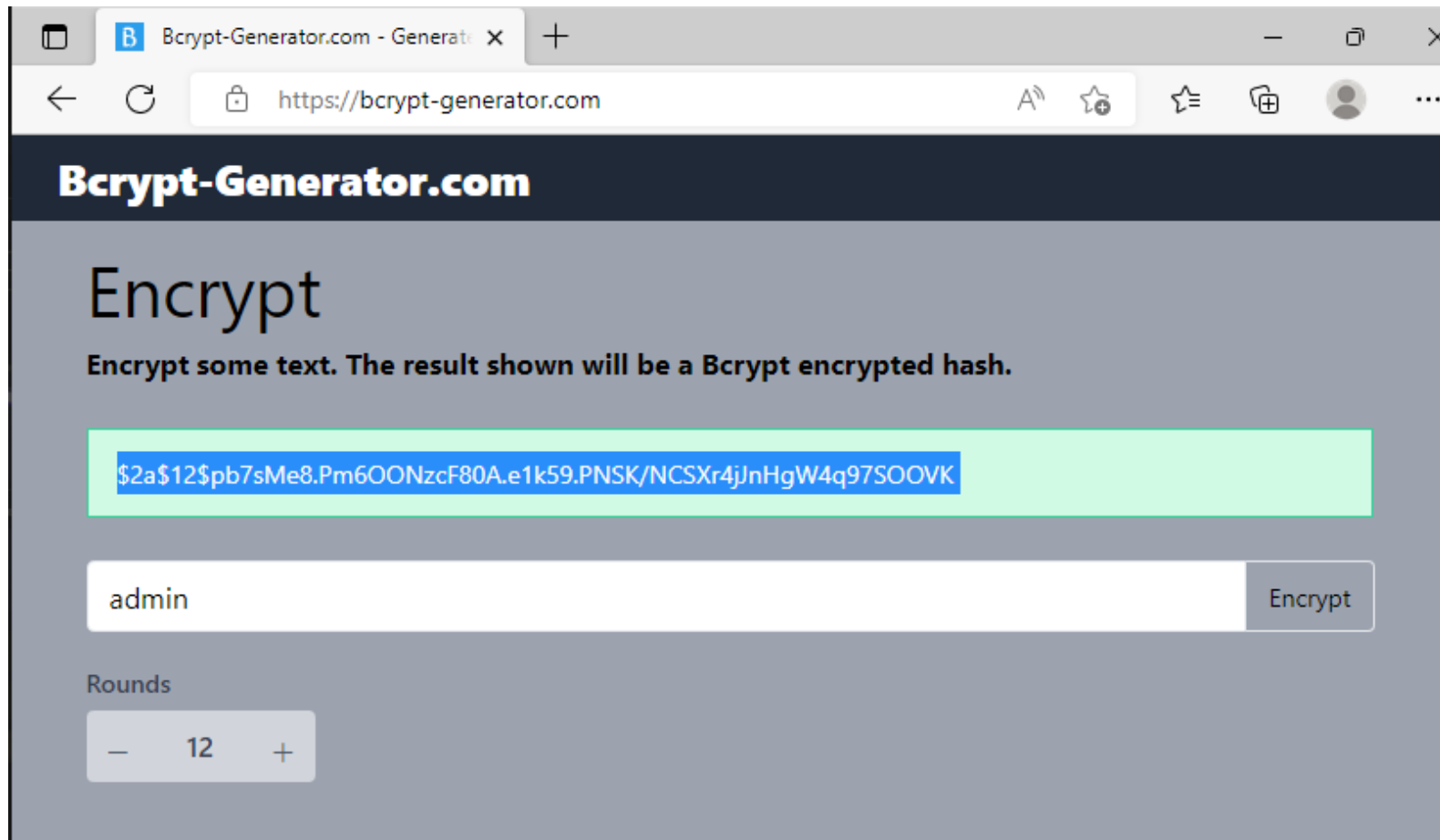
Tabel User

Buat tabel 'users' pada database 'perpus'

	#	Name	Type	Collation	Attributes	Null	Default	Extra
<input type="checkbox"/>	1	Id 	tinyint(4)			No	None	AUTO_INCREMENT
<input type="checkbox"/>	2	username	varchar(10)	latin1_swedish_ci		No	None	
<input type="checkbox"/>	3	password	varchar(100)	latin1_swedish_ci		No	None	

Akses bcrypt-generator.com untuk encrypt password (hash Bcrypt)

- Masukkan password yang akan di encrypt (contoh: admin)
- Kemudian salin ke phpmyadmin saat insert data



The screenshot shows a web browser window with the address bar displaying "https://bcrypt-generator.com". The website has a dark blue header with the text "Bcrypt-Generator.com". Below the header, the word "Encrypt" is displayed in a large font. Underneath, a message states: "Encrypt some text. The result shown will be a Bcrypt encrypted hash." A light green box contains the resulting hash: "\$2a\$12\$pb7sMe8.Pm6OONzcF80A.e1k59.PNSK/NCSXr4jJnHgW4q97SOOVK". Below this, there is a text input field containing the word "admin" and a button labeled "Encrypt". At the bottom, there is a section labeled "Rounds" with a numeric input field set to "12" and minus/plus buttons on either side.

Tambah minimal 1 (satu) user ke tabel 'users'

Column	Type	Function	Null	Value
id	tinyint(4)	<input type="text"/>	<input type="checkbox"/>	<input type="text"/>
username	varchar(10)	<input type="text"/>	<input type="checkbox"/>	<input type="text" value="admin"/>
password	varchar(100)	<input type="text"/>	<input type="checkbox"/>	<div><div>\$2a\$12\$pb7sMe8.Pm600NzcF80A.e1k59.PNSK /NCSXr4jJnHgW4q97S00VK</div><div>Go</div></div>

Hasil enkripsi
menggunakan Bcrypt


Model User

Buat Eloquent Model User (1)

- Buat file model **User_m.php** menggunakan artisan:

```
PS C:\framework\perpus> c:\xampp\php\php artisan make:model User_m
Model created successfully.
PS C:\framework\perpus> █
```

- Hasil generate menggunakan artisan:

```
perpus > app > Models >  User_m.php
1  <?php
2
3  namespace App\Models;
4
5  use Illuminate\Database\Eloquent\Factories\HasFactory;
6  use Illuminate\Database\Eloquent\Model;
7
8  class User_m extends Model
9  {
10     use HasFactory;
11 }
```

Edit Eloquent Model “User_m”

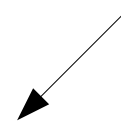
Inheritance dari Auth\User as Authenticatable

- Edit isi file model “User_m.php” sbb:

perpus > app > Models >  User_m.php

```
1  <?php
2
3  namespace App\Models;
4
5  use Illuminate\Database\Eloquent\Factories\HasFactory;
6  // use Illuminate\Database\Eloquent\Model;
7  use Illuminate\Foundation\Auth\User as Authenticatable;
8
9  class User_m extends Authenticatable
10 {
11     use HasFactory;
12
13     protected $table = 'users';
14     protected $primaryKey = 'id';
15     public $timestamps = false;
16
17     protected $fillable = [
18         'username',
19         'password',
20     ];
21 }
```

Sesuaikan, kelas induk authenticatable
dan detil tabel user



Halaman Login

Buat File Blade View login

- Simpan pada folder 'resources\views\perpus' dengan nama file 'login.blade.php'
 - C:\framework\perpus\resources\views\perpus\login.blade.php

framework > perpus > resources > views > perpus > 🐘 login.blade.php

```
1  <!DOCTYPE html>
2  <html>
3  <head><title>Aplikasi Perpustakaan</title></head>
4  <body>
5      <h1>Silahkan Login</h1>
6      <form action="{{ url('login') }}" method="post" accept-charset="utf-8">
7          @csrf
8              <label for="username">Username: </label>
9              <input type="text" name="username" value="" size="20" />
10             <br/><label for="password">Password: </label>
11             <input type="password" name="password" value="" size="20" />
12             <br/><input type="submit" name="btn_simpan" value="Login" />
13         </form>
14 </body>
15 </html>
```

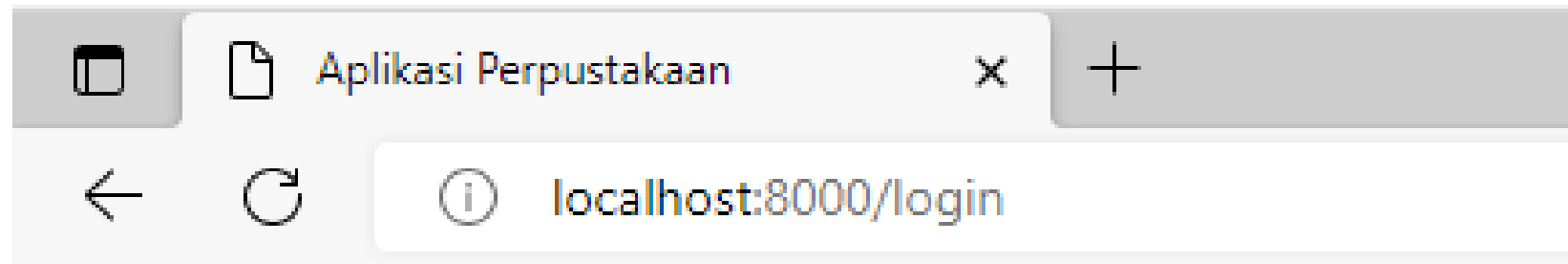
Coba akses view dengan Tambah route '/perpus/login'

- Buka file **web.php** yang ada di folder:
 - C:\framework\perpus\routes\web.php
- Tambahkan baris berikut:

```
80 use App\Http\Controllers\PerpusController;  
81 Route::get('/perpus', [PerpusController::class, 'index']);  
82 Route::get('/login', function () {  
83     return view('perpus.login');  
84 });
```

- Simpan file
- Akses halaman web melalui url: <http://localhost:8000/login>

Tampilan view halaman login



Silahkan Login

Username:

Password:

Modifikasi Controller perpustakaanController.php tambah method login()

perpus > app > Http > Controllers >  PerpustakaanController.php

```
1  <?php
2
3  namespace App\Http\Controllers;
4
5  use Illuminate\Http\Request;
6
7  class PerpustakaanController extends Controller
8  {
9      public function index()
10     {
11         return view('perpus.main');
12     }
13
14     public function login()
15     {
16         return view('perpus.login');
17     }
18 }
```

← Tambahan

Modifikasi Route untuk halaman Login melalui controller

- Lakukan modifikasi pada file route **web.php**
 - C:\framework\perpus\routes\web.php

```
80 use App\Http\Controllers\PerpusController;
81 Route::get('/perpus', [PerpusController::class, 'index']);
82 /*
83 Route::get('/login', function () {
84 |     return view('perpus.login');
85 | });
86 */
87 Route::get('/login', [PerpusController::class, 'login']);
```


Autentikasi Login & Logout

Buat Controller Login

- Buat file controller **LoginController.php** menggunakan artisan:

```
PS C:\framework\perpus> c:\xampp\php\php artisan make:controller LoginController
Controller created successfully.
PS C:\framework\perpus> █
```

Hasil generate menggunakan artisan:

```
perpus > app > Http > Controllers > 🐘 LoginController.php
1  <?php
2
3  namespace App\Http\Controllers;
4
5  use Illuminate\Http\Request;
6
7  class LoginController extends Controller
8  {
9      //
10 }
```

Edit file Controller Login (1)

perpus > app > Http > Controllers >  LoginController.php

```
1  <?php
2
3  namespace App\Http\Controllers;
4
5  use Illuminate\Http\Request;
6  use Illuminate\Support\Facades\Auth;
7
8  class LoginController extends Controller
9  {
10     public function authenticate(Request $request)
11     {
12         $credentials = $request->validate([
13             'username' => ['required'],
14             'password' => ['required'],
15         ]);
16
17         if (Auth::attempt($credentials)) {
18             $request->session()->regenerate();
19
20             return redirect()->intended('/perpus');
21         }
22         return back()->with('loginError','Login Gagal.');
```

Edit file Controller Login (2)

```
26     public function logout(Request $request)
27     {
28         Auth::logout();
29         $request->session()->invalidate();
30         $request->session()->regenerateToken();
31         return redirect('/');
32     }
33 }
```

Modifikasi Route untuk Login

- Lakukan modifikasi pada file route **web.php**
 - C:\framework\perpus\routes\web.php

```
80 use App\Http\Controllers\PerpusController;
81 Route::get('/perpus', [PerpusController::class, 'index']);
82 /*
83 Route::get('/login', function () {
84 |     return view('perpus.login');
85 | });
86 */
87 Route::get('/login', [PerpusController::class, 'login']);
88
89 use App\Http\Controllers\LoginController;
90 Route::post('/login', [LoginController::class, 'authenticate']);
91
```

Tambah fungsi logout pada halaman utama perpustakaan

- Lakukan modifikasi pada file blade `perpus/main.blade.php`
 - `C:\framework\perpus\resources\views\perpus\main.blade.php`

perpus > resources > views > perpustakaan > main.blade.php

```
1  <!DOCTYPE html>
2  <html>
3  <head><title>Aplikasi Perpustakaan</title></head>
4  <body>
5      <h2>Aplikasi Perpustakaan FTIK USM</h2>
6      <b>Pilihan menu :</b>
7      <ol>
8          <li><a href="{{ url('buku') }}">Kelola data buku</a></li>
9          <li><a href="{{ url('anggota') }}">Kelola data anggota</a></li>
10         <li><a href="{{ url('pinjam') }}">Kelola Transaksi Pinjam</a></li>
11     </ol>
12     <a href="{{ url('logout') }}">Logout</a>
13 </body>
14 </html>
15
```

Modifikasi Route untuk Logout

- Lakukan modifikasi pada file route **web.php**
 - C:\framework\perpus\routes\web.php

```
89
90 use App\Http\Controllers\LoginController;
91 Route::post('/login', [LoginController::class, 'authenticate']);
92 Route::get('/logout', [LoginController::class, 'logout']);
93
94
```

Middleware

Middleware “auth” & “guest” untuk proses autentikasi

- Buka file file ‘kernel.php’ pada folder:
 - C:\framework\perpus\app\Http\Kernel.php

```
perpus > app > Http > Kernel.php
52  // These middleware may be assigned to groups or used individually.
53  *
54  * @var array<string, class-string|string>
55  */
56  protected $routeMiddleware = [
57      'auth' => \App\Http\Middleware\Authenticate::class,
58      'auth.basic' => \Illuminate\Auth\Middleware\AuthenticateWithBasicAuth::class,
59      'cache.headers' => \Illuminate\Http\Middleware\SetCacheHeaders::class,
60      'can' => \Illuminate\Auth\Middleware\Authorize::class,
61      'guest' => \App\Http\Middleware\RedirectIfAuthenticated::class,
62      'password.confirm' => \Illuminate\Auth\Middleware\RequirePassword::class,
63      'signed' => \Illuminate\Routing\Middleware\ValidateSignature::class,
64      'throttle' => \Illuminate\Routing\Middleware\ThrottleRequests::class,
65      'verified' => \Illuminate\Auth\Middleware\EnsureEmailIsVerified::class,
66  ];
67  }
```

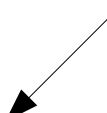
Auth → otentikasi user (proses login)

Guest → tanpa login

Konfigurasi User Provider

- Edit file 'auth.php' pada folder:
 - C:\framework\perpus\config\auth.php

Sesuaikan dengan
nama model yang
kita buat

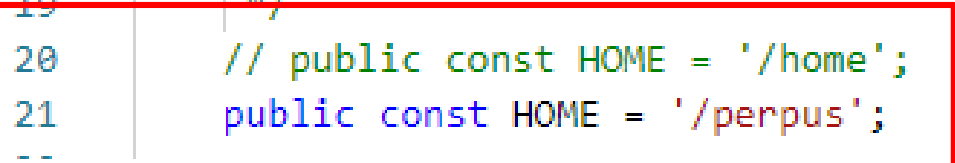


```
62     'providers' => [  
63         'users' => [  
64             'driver' => 'eloquent',  
65             // 'model' => App\Models\User::class,  
66             'model' => App\Models\User_m::class,  
67         ],  
68  
69         // 'users' => [  
70             //     'driver' => 'database',  
71             //     'table' => 'users',  
72             // ],  
73     ],
```

Konfigurasi RouteServiceProvider

- Edit file 'RouteServiceProvider.php' pada folder:
 - C:\framework\perpus\app\Providers\RouteServiceProvider.php

```
11  class RouteServiceProvider extends ServiceProvider
12  {
13      /**
14       * The path to the "home" route for your application.
15       *
16       * This is used by Laravel authentication to redirect users after login.
17       *
18       * @var string
19       */
20      // public const HOME = '/home';
21      public const HOME = '/perpus';
22  }
```



Sesuaikan dengan route halaman dashboard aplikasi perpus

C:\framework\perpus\app\Http\Middleware\Authenticate.php

perpus > app > Http > Middleware > Authenticate.php

```
1  <?php
2
3  namespace App\Http\Middleware;
4
5  use Illuminate\Auth\Middleware\Authenticate as Middleware;
6
7  class Authenticate extends Middleware
8  {
9      /**
10       * Get the path the user should be redirected to when they are not authenticated.
11       *
12       * @param \Illuminate\Http\Request $request
13       * @return string|null
14       */
15     protected function redirectTo($request)
16     {
17         if (! $request->expectsJson()) {
18             return route('login');
19         }
20     }
21 }
```

Buat nama route 'login' untuk halaman login pada file route/web.php sesuai konfigurasi

Modifikasi Route

Modifikasi Route get /login beri nama 'login' sesuai Middleware\Authenticate.php

- Lakukan modifikasi pada file route **web.php**
 - C:\framework\perpus\routes\web.php

```
83  /*
84  Route::get('/login', function () {
85  |      return view('perpus.login');
86  |  });
87  */
88  Route::get('/login', [PerpusController::class, 'login'])->name('login');
89  //
```

Modifikasi Route '/' menuju halaman dashboard perpus

- Lakukan modifikasi pada file route **web.php**
 - C:\framework\perpus\routes\web.php

```
16 Route::get('/', function () {  
17     //return view('ftik');  
18     return redirect('perpus');  
19 });
```

Route yang menggunakan middleware

Route	middleware
/	auth
/buku	auth
/anggota	auth
/pinjam	auth
/perpus	auth
/login	guest

Modifikasi Route untuk implementasi middleware 'auth' dan 'guest'

- Lakukan modifikasi pada file route **web.php**
 - C:\framework\perpus\routes\web.php

```
16 Route::get('/', function () {
17     //return view('ftik');
18     return redirect('perpus');
19 })->middleware('auth');

42 Route::get('/buku', [BukuController::class, 'index'])->middleware('auth');

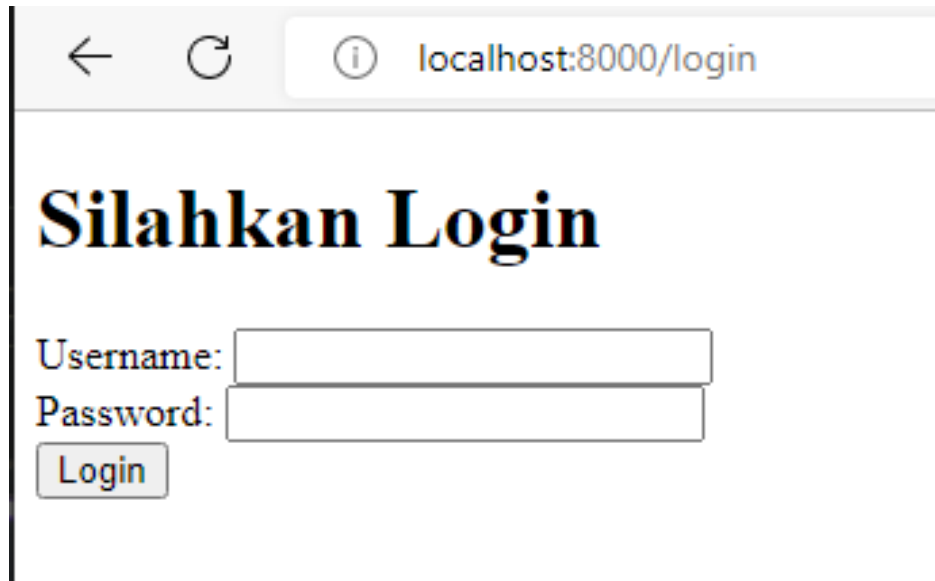
49 Route::get('/anggota', [AnggotaController::class, 'index'])->middleware('auth');

75 Route::get('/pinjam', [PinjamController::class, 'index'])->middleware('auth');

83 Route::get('/perpus', [PerpusController::class, 'index'])->middleware('auth');

89 Route::get('/login', [PerpusController::class, 'login'])->name('login')
90 |     ->middleware('guest');
```

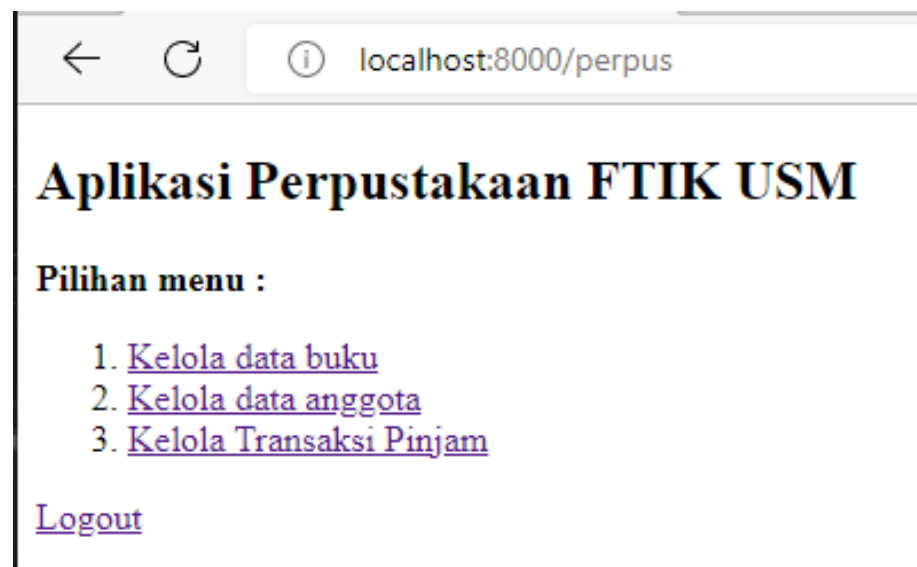
Tampilan



A screenshot of a web browser showing the login page. The address bar displays 'localhost:8000/login'. The page has a heading 'Silahkan Login' in a large, bold, black serif font. Below the heading are two input fields: 'Username:' and 'Password:'. A 'Login' button is positioned below the password field.

← Sebelum Login

Setelah Login →



A screenshot of a web browser showing the application page after login. The address bar displays 'localhost:8000/perpus'. The page has a heading 'Aplikasi Perpustakaan FTIK USM' in a large, bold, black serif font. Below the heading is the text 'Pilihan menu :'. There are three menu items listed: '1. [Kelola data buku](#)', '2. [Kelola data anggota](#)', and '3. [Kelola Transaksi Pinjam](#)'. At the bottom of the page is a link '[Logout](#)'.