Developing ASP.NET MVC 5 Views

Exercise 1: Adding a View for Photo Display

Task 1: Add a new display view.

- 1. Copy starter folder from MNS/Kursus/--Views to your local machine
- 2. Build Solution
- 3. Open the PhotoController.cs code window.
- 4. Add a new view to the **Display** action in the **PhotoController** by using the following information:

Name: Display

Scaffold template: **Empty**

Model class: **Photo**

Data Context Class: PhotoSharingContext

Task 2: Complete the photo display view.

- 1. Add a title to the display view by using the Title property of the Model object.
- 2. Add an H2 element to the body page to display the photo title on the page by using the Title property of the Model object.
- 3. Add an tag to display the photo on the page by using the following information:

Width: 800 src: Empty

4. Add the URL.Action helper to the src attribute of the tag by using the following information:

Method: Url.Action()
Action name: GetImage
Controller name: Photo

Route values: new { id=Model.PhotoID }

5. Add a P element to display the Description property from the model by using the following

information:

Helper: Html.DisplayFor

Lamda expression: model =>model.Description

6. Add a **P** element to display the UserName property from the model by using the following information:

Helpers: Html.DisplayNameFor

HtmlDisplayFor

Lamda expression: model => model.UserName

7. Add a P element to display the CreatedDate property from the model by using the following

nformation:

Helpers:

Html.DisplayNameFor

Html.DisplayFor

Lamda expression: model => model.CreatedDate

8. Add a **P** element to display a link to the Index controller action by using the following information:

Helper: HTML.ActionLink Content: Back to List

-->@Html.ActionLink("Back to List", "Index")

9. Save the Display.cshtml file.

Exercise 2: Adding a View for New Photos

Task 1: Add a new create view.

1. Create a new view for the Create action of the PhotoController class by using the following

information: Name: **Create**

Scaffold template: **Empty** Model class: **Photo**

Data Context Class: PhotoSharingContext

Task 2: Complete the photo create view.

1. Add the following title to the Create view:

Title: Create New Photo

- 2. Add an **H2** element to the body page to display the heading as **Create New Photo**.
- 3. Create a form on the page by using the following information within an @using statement:

Helper: Html.BeginForm

Action: Create

Controller name: Photo

Form method: FormMethod.Post

Parameter: Pass the HTML attribute enctype = "multipart/form-data"

- 4. In the form, use the Html.ValidationSummary helper to render validation messages.
- 5. After the **ValidationSummary**, add a **P** element to display controls for the **Title** property of the model by using the following information:

Helpers:

LabelFor

EditorFor

ValidationMessageFor

6. After the controls for the Title property, add a P element to display a label for the PhotoFile

property, and an **<input>** tag by using the following information:

Helper: LabelFor Input type: file Name: Image

7. After the **PhotoFile** controls, add a **P** element to display controls for the **Description** property of the model by using the following information:

Helpers: LabelFor EditorFor ValidationMessageFor

8. After the **Description** controls, add a **P** element to display read-only controls for the **UserName** property of the model by using the following information:

Helpers: LabelFor DisplayFor

9. After the **UserName** controls, add a **P** element to display read-only controls for the **CreatedDate** property of the model by using the following information:

Helpers: LabelFor DisplayFor

10. After the **CreatedDate** controls, add a **P** element that contains an **<input>** tag by using the following information:

Input type: **submit** Value: **Create**

Add an action link to the Index action with the text Back to List.

11. Save the Create.cshtml file.

Exercise 3: Creating and Using a Partial View

Task 1: Add a gallery action to the Photo Controller.

1. Add a new action to the PhotoController.cs file by using the following information:

Annotation: ChildActionOnly

Scope: public

Return Type: **ActionResult** Name: **_PhotoGallery**

Parameter: an Integer called number with a default value of 0

2. Create a new List of Photo objects named photos. Add an if statement, to set photos to include all

the **Photos** in the **context** object, if the **number** parameter is zero.

3. If the **number** parameter is not zero, set **photos** to list the most recent **Photo** objects. The number of **Photo** objects in the list should be the **number** attribute.

```
→(LINQ Query).Take(number).ToList()
```

- 4. Pass the **photos** object to the partial view **_PhotoGallery** and return the view.
- 5. Save the PhotoController.cs file.

Task 2: Add a photo gallery partial view.

1. Create a new partial view for the **_PhotoGallery** action in the PhotoController.cs file by using the following information:

Name: _PhotoGallery Template: Empty Model class: Photo

Data Context Class: PhotoSharingContext

Create as a Partial view: Checked

2. Move the _PhotoGallery.cshtml view file from the Photo folder to the Shared folder.

Task 3: Complete the photo gallery partial view.

- 1. In the _PhotoGallery.cshtml partial view file, bind the view to an enumerable list of **Photo** model objects. → IEumerable()
- 2. In the _PhotoGallery.cshtml partial view file, add a **Foreach** statement that loops through all the items in the **Model**.
- 3. In the **Foreach** statement, add an **H3** element that renders the **item.Title** property.
- 4. After the **H3** element, add an **if** statement that checks that the **item.PhotoFile** value is not null. → item.PhotoFile != null
- 5. If the **item.PhotoFile** value is not null, render an **** tag with **width 200**. Call the **UrlAction** helper to set the **src** attribute by using the following information:

Action: **GetImage** Controller: **Photo**

Parameters: for the id parameter, pass item.PhotoID

→ src = "@Url.Action("GetImage", "Photo", new { id = item.PhotoID })"

- 6. After the **if** statement, add a **P** element, and call the **@Html.DisplayFor** helper to render the label **Created By:** followed by the value of the **item.UserName** property.
- 7. After the **UserName** display controls, add a **P** element, and call the **@Html.DisplayFor** helper to render the label **Created On:** followed by the value of the **item.CreatedDate** property.
- 8. After the **CreatedDate** display controls, call the **Html.ActionLink** helper to render a link by using the following information:

Link text: **Display** View name: **Display**

Parameters: pass the item.PhotoID value as the id parameter

9. Save the _PhotoGallery.cshtml file.

Task 4: Use the photo gallery partial view.

- 1. Modify the **Index** action in the PhotoController.cs so that no model class is passed to the **Index** view.
- 2. Create a view for the **Index** action in the PhotoController.cs file by using the following information:

Name: Index

View type: Empty Without Model

- 3. In the Index.cshtml file, change the title to All Photos.
- 4. Add an **H2** element to the page body to display the heading as **All Photos**
- 5. Add a **P** element to add a link to the **Create** action in the **Photo** controller by using the following information:

Helper: Html.ActionLink Link text: Add a Photo Action name: Create Controller name: Photo

6. Insert the **PhotoGallery** partial view by using the following information:

Helper: **Html.Action**

Action name: _PhotoGallery Controller name: Photo

→ @Html.Action(" PhotoGallery", "Photo")

7. Save the Index.cshtml file

Exercise 4: Adding a Home Controller and Testing the Views

Task 1: Add a Controller and View for the home page.

1. Add a new **Controller** to the home page by using the following information:

Controller name: **HomeController** Template: **Empty MVC Controller**

- 2. Add an Empty(without model) view to the **Index** action in **HomeController** by using the following information:
- 3. Change the title of the page to Welcome to Adventure Works Photo Sharing.
- 4. Add the following text to the home page:

Welcome to Adventure Works Photo Sharing! Use this site to share your adventures.

- 5. Add an **H2** element to display the heading as **Latest Photos**.
- 6. Insert the **_PhotoGallery** partial view by using the following information:

Helper: **Html.Action**

Action name: _PhotoGallery Controller name: Photo

Parameters: for the **number** parameter, pass the value **3**

7. Save the Index.cshtml file.

Task 2: Run the web application.

- 1. Start the Photo Sharing application in browser.
- 2. Verify the number of photos displayed on the home page.
- 3. Display a photo of your choice to verify whether the display shows the required information.
- 4. Verify the number of photos displayed on the **Photo/index** page.
- 5. Add a new photo.
- 6. Close Application