Domain Model for UC-1 (Log-in)

Extracting the responsibility

Responsibility Description	Type	Concept Name
Coordinate actions of all concepts associated with a use case, a logical grouping of use cases, or the entire system and delegate the work to other concepts.	D	Controller
Keyboard input value	K	KeyboardEntry
Enter the saved id / password value	K	CurrentData
Show current input status and login success/failure	D	Display Interface

Extracting the Associations

Concept Pair	Association description	Association name
KeyboardEntry<-> Controller	KeyboardEntry The value is passed to the controller	conveys data
Controller <-> CurrentData	Passes keyboard input into the controller to the current data.	conveys data
Controller <-> Display Interface	Displays the input status, login success or failure	provides data

Extracting the Attributes

Concept	Attributes	Attribute Description
CurrentData	- ID Information - PW Information	- ID Input Value- PW Input Value

Domain Model for UC-2 (Log-out)

Extracting the responsibility

Responsibility Description	Type	Concept Name
Coordinate actions of all concepts associated with a use case, a logical grouping of use cases, or the entire system and delegate the work to other concepts.	D	Controller
Saved Account Information	K	CurrentData
Tell the behavior of successful cancellation	D	Display Interface

Extracting the Associations

Concept Pair	Association description	Association name
Controller <-> CurrentData	Passes the value of the button input to the current data to perform the logout	conveys data
Controller <-> Display Interface	Indicate whether the cancellation was successful or not.	provides data

Extracting the Attributes

Concept	Attributes	Attribute Description
CurrentData	Account Information	Current user account information.

Domain Model for UC-3 (Register Account)

Extracting the responsibility

Responsibility Description	Type	Concept Name
Coordinate actions of all concepts associated with a use case, a logical grouping of use cases, or the entire system and delegate the work to other concepts.	D	Controller
Enter the saved id / password value	K	CurrentData
Created account information	K	AccountEntry
Passing the generated account information to the server	D	RegisterOperator

Extracting the Associations

Concept Pair	Association description	Association name
KeyboardEntry<-> Controller	Passing a KeyboardEntry value to the controller	conveys data
Controller <-> CurrentData	Passes keyboard input into the controller to the current data.	conveys data
AuthenticateEntry <-> Controller	The AuthenticateEntry value is passed to the controller.	conveys data
AccountEntry <-> RegisterOperator	The AccountEntry value will be passed to the RegisterOperator.	conveys data

Extracting the Attributes

Concept	Attributes	Attribute Description
CurrentData	- ID Information - PW Information	- ID Input Value- PW Input Value

AccountEntry	Account Information	Account Information

Domain Model for UC-4 (positioning)

Extracting the responsibility

Responsibility Description	Type	Concept Name
Coordinate actions of all concepts associated with a use case, a logical grouping of use cases, or the entire system and delegate the work to other concepts.	D	Controller
User's button input value	K	ButtonEntry
Locate the current account location	K	Positioning information
Display the current location address to the user	D	Display Interface

Extracting the Associations

Concept Pair	Association description	Association name
ButtonEntry <-> Controller	The ButtonEntry value is then passed to the controller	conveys data
Controller<-> Positioning information	Locate the current account location	request data
Controller<-> Display Interface	Display the current location address to the user	provides data

Extracting the Attributes

Concept	Attributes	Attribute Description
Positioning	Positioning information	Show current location address

Domain Model for UC-5 (show weather)

Extracting the responsibility

Responsibility Description	Type	Concept Name
Coordinate actions of all concepts associated with a use case, a logical grouping of use cases, or the entire system and delegate the work to other concepts.	D	Controller
User's button input value	K	ButtonEntry
Confirm current address location	D	PopUpOperator
Display the weather information of the current location address	D	Display Interface

Extracting the Associations

Concept Pair	Association description	Association name
ButtonEntry<->Controller	Select current positioning.	conveys data
Controller <-> PopUpOperator	Loads the PopUp interface.	requests data
Controller <-> Display Interface	Display weather information to the user	provides data

Extracting the Attributes

Concept	Attributes	Attribute Description
RequestData	weather information	- Display weather information to the user

Domain Model for UC-6 (search)

Extracting the responsibility

Responsibility Description	Type	Concept Name
Coordinate actions of all concepts associated with a use case, a logical grouping of use cases, or the entire system and delegate the work to other concepts.	D	Controller
User's button input value	K	ButtonEntry
Accept city name input information	D	FetchOperator
Search City Information	K	ApproveData
Display weather information for the searched city	D	Display Interface

Extracting the Associations

Concept Pair	Association description	Association name
Controller<-> FetchOperator	Request server data from FetchOperator.	requests data
ButtonEntry <-> Controller	Enter the city name	conveys data

Controller <-> ApproveData	Accept city name input information	provides data
Controller <-> Display Interface	Display weather information for the searched city	provides data

Extracting the Attributes

Concept	Attributes	Attribute Description
RequestedBooksContainer	-BookList information	- List of requested books
ApproveData	-Book information	- Current data of selected books

Domain Model for UC-7 (add city)

Extracting the responsibility

Responsibility Description	Type	Concept Name
Coordinate actions of all concepts associated with a use case, a logical grouping of use cases, or the entire system and delegate the work to other concepts.	D	Controller
User's button input value	K	ButtonEntry
Enter the city name	D	City List Adder
Show searched cities	K	City List
Add the currently displayed city to the user's city list	K	My City List
Show current city list	D	Display Interface

Extracting the Associations

Concept Pair	Association description	Association name
ButtonEntry <-> Controller	The button input value is passed to the controller.	conveys data
Controller <-> City List Adder	Enter the city name	requests data
City List Adder <-> City List	Show searched cities	requests data
Controller <-> My City List	Add the currently displayed city to the user's city list	provides data
Controller<-> Display Interface	Show current city list	provides data

Extracting the Attributes

Concept	Attributes	Attribute Description
City List	- City List information	- List of City List
My City List	- My City List information	- List of My City List

Domain Model for UC-8 (update)

Extracting the responsibility

Responsibility Description	Type	Concept Name
Coordinate actions of all concepts associated with a use case, a logical grouping of use cases, or the entire system and delegate the work to other concepts.	D	Controller

User's button input value	K	ButtonEntry
Confirm that the current time has expired	D	Operator
Update the weather information for the currently selected city	D	ChangeCover Operator
Show updated city weather	D	Display Interface

Extracting the Associations

Concept Pair	Association description	Association name
ButtonEntry<-> Controller	The input value of the button will be transmitted to the controller.	conveys data
Controller<-> Operator	Confirm that the current time has expired	requests data
Controller<-> ChangeCoverOperat or	Update the weather information for the currently selected city	conveys data
Display Interface	Show updated city weather	provides data

Extracting the Attributes

Concept	Attributes	Attribute Description
ChangeCoverO perator	- weather information	Show updated city weather

Domain Model for UC-10 (delete)

Extracting the responsibility

Responsibility Description	Type	Concept Name
Coordinate actions of all concepts associated with a use case, a logical grouping of use cases, or the entire system and delegate the work to other concepts.	D	Controller
Keyboard and mouse input values	K	InputEntry
Check if the entered city is in the user's city list	D	My City List
Remove the city from the list	K	My City List
Show the list of cities updated by the user	D	Display Interface

Extracting the Associations

Concept Pair	Association description	Association name
InputEntry <-> Controller	Keyboard and mouse input values	conveys data
Controller <-> My City List	Check if the entered city is in the user's city list	provides data
Controller <-> My City List	Remove the city from the list	provides data
My City List <-> Display Interface	Show the list of cities updated by the user	generates data

Domain Model for UC-11 (Authenticate User)

Extracting the responsibility

Responsibility Description	Type	Concept Name
Coordinate actions of all concepts associated with a use case, a logical grouping of use cases, or the entire system and delegate the work to other concepts.	D	Controller
Request data for authentication accounts	K	RequestData
Storage location for registered accounts	K	AccountStorage
The requested account.	D	AccountChecker
Send to the client.	D	Sender
Receive data from the client.	D	Reciever
Successful/failed authentication information data	K	AuthenticateData

Extracting the Associations

Concept Pair	Association description	Association name
Reciever <-> Controller	Passes the received RequestData to the controller.	conveys data
RequestData <-> Reciever	RequestData is forwarded to Reciever.	conveys data
Controller <-> Sender	Passes the AuthenticateData to be sent to the client to the Sender.	conveys data
AuthenticateData <-	The authenticatedATA passes to the	conveys data

> Sender	Sender.	
Controller <-> AccountChecker	Pass the RequestData to the AccountChecker.	provides data
AccountChecker <-> AccountStorage	Store request data to the account to verify the requested account.	requests data
AccountChecker <-> AuthenticateData	Data about the requested account authentication.	generates data

Extracting the Attributes

Concept	Attributes	Attribute Description
RequestData	- Request Type - Account Data	- The type of account authentication request, for account registration or login - Information about the account requesting authentication