PA01-Implementing an Object-Oriented Program with Unit Tests:
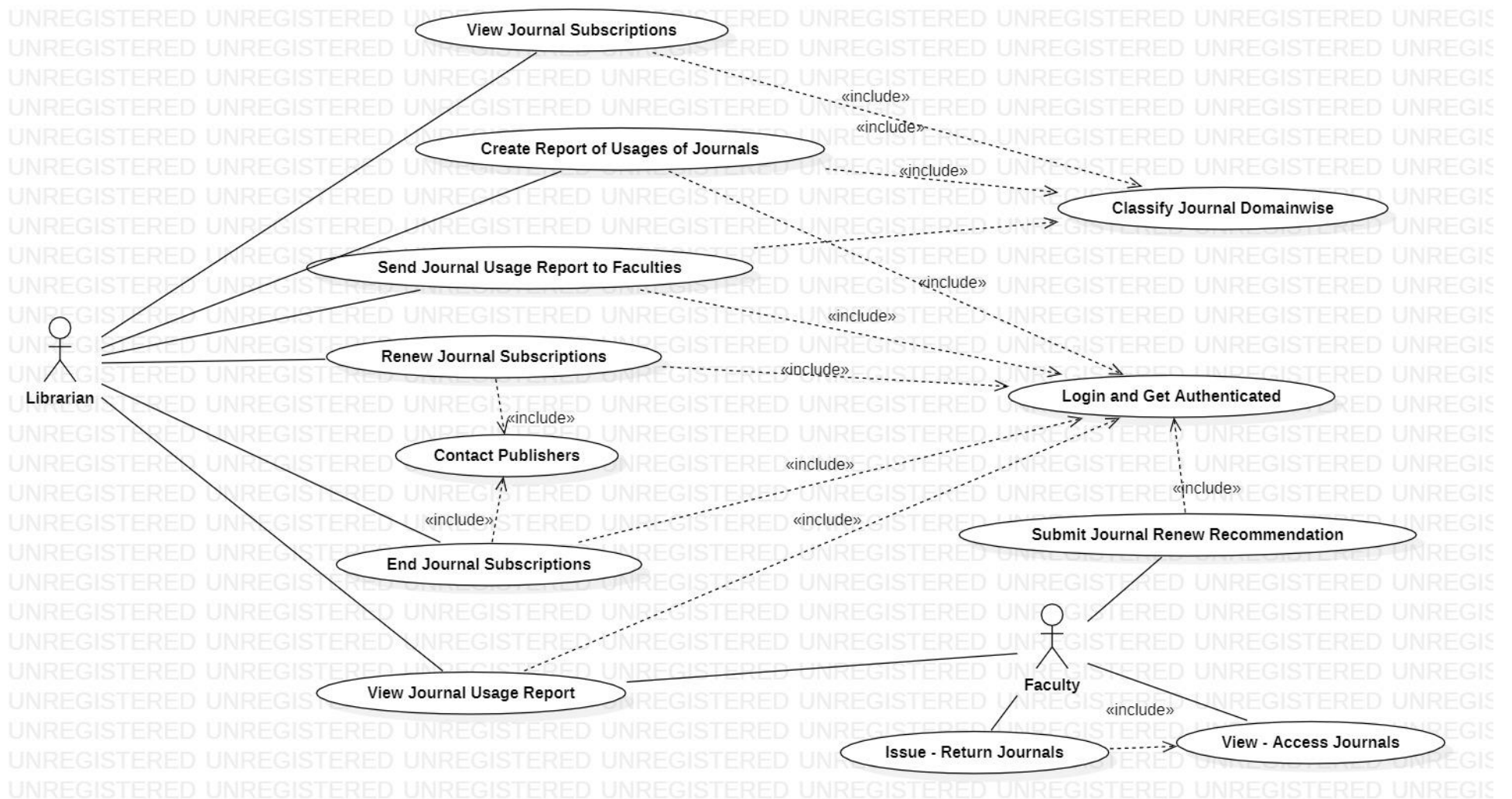
Example: Library (Journal Subscription Extension)

The librarian assesses existing research journal subscriptions every year to create a report about usages of each of the journal (hard copy / online). The report is shared with all the faculties based on the domains under which each journal aligns with. The faculty is supposed to recommend the journals for continuation or end of subscription. Based on the faculty recommendations the renewal of subscription is submitted to the respective publishers by the librarian. The subscription fees are paid for the journals to be renewed and request to end the subscription with request to refund deposit is sent for the journals whose subscription is to be ended.

Usecase Diagram

CRC Cards:

Class: Librarian	
Responsibilities	**Collaborator**
Login	
View Journal Subscriptions	Journal
Create Usage Report	Journal JournalIssue Domain
Email Usage Report to the Faculties	Faculty Domain Email
Create Recommendation Report	Recommendation
Renew Journal Subscription	Journal Publisher
End Journal Subscription	Journal Publisher

Class: Faculty	
Responsibilities	**Collaborator**
Login	
Submit Journal Subscription Renewal Recommendation	Recommendation

Class: Journal	
Responsibilities	**Collaborator**
View - Access Journals	Journal

Class: JournalIssue	
Responsibilities	**Collaborator**
Issue Journal	Faculty
Return Journal	Faculty

Class: JournalSubscription	
Responsibilities	**Collaborator**
View Subscription	

Renew Subscription	
End Subscription	

Class: Domain	
Responsibilities	**Collaborator**
Add / Update Domain	

Class: Recommendation	
Responsibilities	**Collaborator**
Renew / End Subscription	Journal

Class: Publisher	
Responsibilities	**Collaborator**
Add / Update	
Return Contact Details	

Class Diagram: