

System Operations

- login(email, password)
 - viewAvailableInstructorOfferings()
 - selectOffering(offering)
 - createOffering(lesson, capacity, location, timeslot)
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Contract CO1: login

Operation: login(email, password)

Cross References: Use Case: Process Offerings

Preconditions: User already has an account.

Postconditions:

- The user's session state is change to 'logged in' based on credential verification (attribute modification)
 - A session is associated with the user's account for the duration of their interaction with the system (association formed)
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Contract CO2: viewAvailableInstructorOfferings

Operation: viewAvailableInstructorOfferings()

Cross References: Use Case: Process Offerings

Preconditions: User is an instructor.

Postconditions:

- List of available offerings is retrieved according to the instructor's specialization and availabilities (association formed)
 - List of available offerings is displayed to instructor (association formed)
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Contract CO3: selectOffering

Operation: selectOffering(offering)

Cross References: Use Case: Process Offerings

Preconditions: The list of available offerings has at least one offering.

Postconditions:

- Status of selected offering is modified to 'not available' so that it is not available for other instructors to select (attribute modification)
 - Instructor associated with the offering selected (association formed)
 - The offering is made public to clients (instance creation)
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Contract CO4: createOffering

Operation: createOffering(lesson, capacity, location, timeslot)

Cross References: Use Case: Process Offerings

Preconditions: User is the admin.

Postconditions:

- A new offering is created with the specified lesson, capacity, location and timeslot (instance creation)
- The offering is associated with the specified lesson (association formed)
- The offering is associated with the specified location (association formed)
- The offering is associated with the specified timeslot (association formed)
- The location's availability for the timeslot is updated according to the offering created (attribute modification)
- The offering's capacity is set to the specified number (attribute modification)
- The offering is marked as 'available' for instructors to view and select (attribute modification)