Use Cases

Use Case:	Set up system accounts
Primary Actor:	Administrator
Goal in context:	To set the system to authenticate users – Professors and TA's to login
Preconditions:	• System has been programmed for a username and password login for the administrator and he/she logs in using those credentials • System has been programmed to add details for instructors and assign unique credentials to them
Trigger:	The administrator decides to set up system by adding the Professors and TA's who must be able to access the system for the course for a particular semester
Scenario:	Administrator: Observes state of system Administrator: Enters own username and password Administrator: Selects "Add Instructors" Administrator: Adds Professors and TA's with required details Administrator: Observes feedback from system through newly created credentials for instructors and notification – "Instructors added"
Exception:	1. System is not ready: Administrator makes sure the system is initiated with login screen 2. Username/Password is incorrect (System notifies through error message): Administrator reenters correct username and password 3. Username/Password not recognized: Administrator must enter email registered to account and then is redirected to setting a new username/password 4. Name of Professor/TA not entered (System notifies through error message): Administrator enters correct name for appropriate instructor 5. Email of Professor/TA not entered or incorrect email mentioned (System notifies through error message): Administrator enters correct email id for the instructor
Priority:	Essential, must be implemented
When available:	First increment
Frequency of use:	Once/twice per semester – as per need to add instructors
Channel to actor:	Via system interface
Secondary actors:	None

Open issues:	1. Should there be a way to deactivate login if admin enters incorrect credentials above a certain threshold number of times?
	2. Should the system display additional instructions/error messages?
	3. Should the system time out on inactivity of administrator while using system – adding instructors

Use Case:	Login to system
Primary Actor:	Professor, TA
Goal in context:	To enter/login to system by entering correct credentials
Preconditions:	• Administrator has added instructors to system by entering correct details, received unique credentials and forwarded the same to the professors and TAs for access
	• System has been programmed for a username and password login for Professors and TAs (both have different privileges)
Trigger:	The Professor/TA decide to enter system and begin plagiarism check for an assignment/view reports for the same
Scenario:	Professor/TA: Observes state of system
	Professor/TA: Enters own username and password and select "Log in"
	Professor/TA: Observes feedback from system through notification – "Login successful"
Exception:	1. System is not ready: Professor/TA makes sure the system is initiated with login screen or contacts Administrator
	2. Username/Password is incorrect (System notifies through error message): Professor/TA reenters correct username and password
	3. Username/Password not recognized: Professor/TA must enter email registered to account and then is redirected to setting a new username/password
	4. Email for reset Username/Password not received: Professor/TA must enter correct email address associated with account or contact Administrator
Priority:	Essential, must be implemented
When available:	First increment
Frequency of use:	Many times per day
Channel to actor:	Via system interface

Secondary actors:	Administrator
Open issues:	1. Should the system have any additional authentication other than username and password? Is the "I am not a Robot" captcha required? 2. Should there be a way to deactivate login if Professor/TA enters incorrect credentials above a certain threshold number of times? 3. Should the system display additional instructions/error messages? 4. Should the system resend reset credentials email after a particular time-period or if user notifies system that he/she has not received the email

Use Case:	Calculate plagiarism
Primary Actor:	Professor/TA
Goal in context:	To calculate plagiarism for a set of files or directories
Preconditions:	• Instructor is logged in his/her account
Trigger:	The Professor/TA decides to calculate plagiarism for the class for a particular assignment
Scenario:	• Professor/TA: Enter Name of Test • Professor/TA: Enter Repository's URL that houses the assignments • Professor/TA: Select "Calculate" to compute plagiarism for all assignments from repository at URL entered • Professor/TA: The Professor/TA observes system and waits for the results to be generated
Exception:	1. Entered URL is not correct: Professor/TA will reset the textbox and enter correct URL 2. Files not found at the given URL: Professor/TA will check whether the entered URL is correct and whether files are present 3. File type not supported by our system: System notifies the Professor/TA that "File type not supported." The Professor/TA get to choose an action against the incorrect file 4. The Professor/TA selects "Calculate Plagiarism" multiple times thereby causing the system to function

	inefficiently: Submit button would be disabled after one click 5. The plagiarism calculation process stalls, page becomes unresponsive: restart test or contact administrator
Priority:	Essential, must be implemented
When available:	First increment
Frequency of use:	Up to the Professor/TA
Channel to actor:	Interface
Secondary actors:	Administrator
Open issues:	1. Is there any pop up or alert message to alert professor/TA about the system time out? 2. Should system show an error message if there are incorrect number of files in repository/files not submitted by student? 3. Can user stop data import before calculation(Do you want to continue(OK/Cancel))? 4. Should the system display additional instructions/error messages?

Use Case:	Generate and view current test report
Primary Actor:	Professor, TA
Goal in context:	To make the system generate and view report of current plagiarism test
Preconditions:	• System has run the plagiarism check over all the files in the repository
Trigger:	The Prof/TA decides to generate and view the report for the current test run
Scenario:	Prof/TA: Observes system to check whether plagiarism check is in process/complete Prof/TA: Once plagiarism check is complete, instructor selects Generate and View report
Exception:	1. Error in generation of report: recalculation of plagiarism /contact administrator 2. Report not visualized appropriately: recalculation of plagiarism/contact administrator

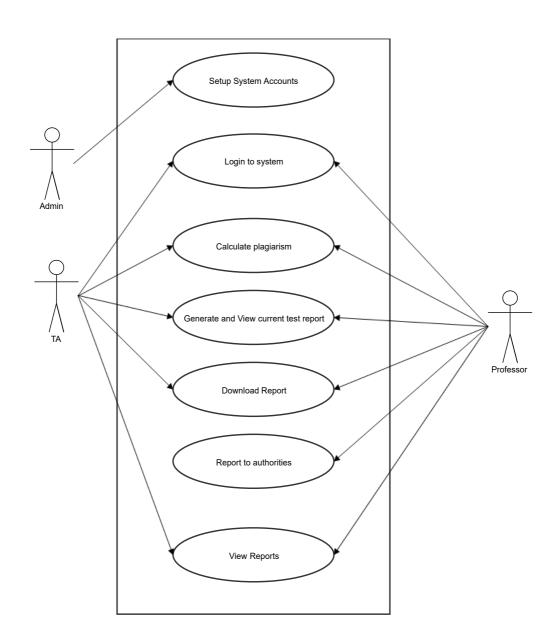|	
Priority:	Essential, must be implemented
When available:	First increment
Frequency of use:	Up-to Professor, TA
Channel to actor:	Via system interface
Secondary actors:	Administrator
Open issues:	1. Should there be a report even if there is not a single severe plagiarism case – plagiarism calculated is not above threshold? 2. Should the system download report immediately on generation of report without user intervention? 3. Should the report consist of the names of students in each case of the report?

Use Case:	Download report
Primary Actor:	Professor, TA
Goal in context:	To download the plagiarism report
Preconditions:	• System should have already calculated and generated the report for plagiarism
Trigger:	The Prof / TA decides to download the report /case generated
Scenario:	Professor/ TA: observes if the report is generated Professor/TA: Selects cases to be downloaded Professor/ TA: Clicks on download to download a copy/copies of the report/case
Exception:	• Report cannot be downloaded: Contact administrator • Report generated and downloaded is erroneous and unorganized: Download report again/contact administrator
Priority:	Essential, must be implemented
When available:	First increment
Frequency of use:	Up to Professor, TA
Channel to actor:	Via system interface
Secondary actors:	Administrator

Open issues:	1. Should the system download report in particular format or it must give the user a choice of format? 2. Should the system display additional instructions/error messages?

Use Case:	Report to authorities
Primary Actor:	Professor
Goal in context:	Reporting students to the authorities
Preconditions:	• The Plagiarism report has been generated • Plagiarism is severe – some cases must be reported
Trigger:	The Professor/TA discuss and decide on students and cases to be reported
Scenario:	• Professor: Decides to report plagiarism based on threshold/severity of case • Professor: Selects cases to be attached to an email to be sent to authority • Professor: Enter the recipient's email (OSCCR, for instance)
Exception:	• Email of the authority not entered or incorrect email mentioned (System notifies through error message): Professor enters correct email of the authority • Report/case cannot be attached in the email: Contact administrator
Priority:	Essential, must be implemented
When available:	First increment
Frequency of use:	Up to the Professor
Channel to actor:	Interface
Secondary actors:	Administrator
Open issues:	1. Should there be any additional information other than reports that must be added or attached to the mail to be sent to the authority? 2. Should there be an alternate representation of each case if size of case file is too large for the email? 3. Should the system display additional instructions/error messages?

Use Case:	View Reports
Primary Actor:	Professor/TA
Goal in context:	To view history of plagiarism check reports (previously run tests)
Preconditions:	• Instructor is logged in his/her account
Trigger:	Professor/TA has decided to view reports for plagiarism check
Scenario:	Professor/TA: Decide to view a particular test report Professor/TA: Choose report that he/she wants to view Professor/TA: Observes feedback from system
Exception:	1. No reports under view history: Professor/TA might not have run the tests till now or contact admin 2. Files in view history are not getting opened: Contact admin
Priority:	Essential, must be implemented
When available:	First increment
Frequency of use:	As and when required
Channel to actor:	Via system interface
Secondary actors:	Administrator
Open issues:	1. Should the system show some error message if history is not available before directing to the view reports page? 2. Should the system display additional instructions/error messages?

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