

Test Name	Test Intention	What went wrong	The error	How error was fixed
addcredit 03	Test to confirm if the username that the admin wants to add credit to actually exists within the system	Existing user check was not implemented		Implemented read file method to look for user (findUser(token))
addcredit 04	Test to confirm whether the amount of credit added is at most equal to \$1000.00 in a given session.	Credit amount more than \$1000.00 was accepted	Entering string crashed the program	Create a method called "constraintAmount()" which takes in the amount, maximum and minimum and returns true if constraint met else false. This decides if the transaction should proceed further.
addcredit 05	Test to confirm if the amount of credit to be added onto an account is greater than \$0.00	0\$ and negative credit amounts were accepted.	Entering string crashed the program	
Refund 01	Test to confirm money being refunded is more than 0 credit amount.	0\$, negative, and credit amounts over 1000000 were accepted.	Entering string crashed program	Used constraintAmount() function to prevent credit entries below 1 and over 1000000. Added condition to allow only digit entries.
Refund 03	Check if buyer is current user/ exists	Refunded money to a non-existing buyer		Implemented read file method to look for user (findUser(token))
Refund 04	Check if seller is current user/ exists	Deducted money to from a non-existing seller		Implemented read file method to look for user (findUser(token))
create 02	Test to confirm whether username of	Created duplicate users		Used (findUser()) function to check for already existing user.

	newly created user is unique.			
create 03	Test to check whether the character count of the newly created user is within 15 characters.	Accepted usernames exceeding 15 character count		Created a method called "constraintStringLength()" which takes in the name, maximum and minimum and returns true if constraint met else false. This decides if the transaction should proceed further.
create 04	Test to check if the character count of a newly created user is greater than zero.	Accepted empty username fields		Used "constraintStringLength()" method to check if name length is greater than 0 characters
create 05	Test to check if a newly created user does have a User Type which allows certain privileges like buying or selling.	Any string was accepted.		Included a condition which checks for user type in the 4 types allowed.
Delete 02	Test to check if any outstanding tickets for purchase or sale are cancelled before deletion of the account.	Did not cancel outstanding ticket sales, tickets remained in event's file		Used function findUser() in events file to make sure the individual's sale offers are deleted!
Delete 03	Test to confirm that the username of the account to be deleted must be the name of an existing user	Attempted deletion of non-existing users.		Used function findUser() to search for an existing user.
Delete 06	Test to confirm if the user that is deleting an account does not have the same username	Allowed admins to delete themselves		Included a condition checker, which prevents admin from trying to delete himself!

	(basically no self-deletion).			
Buy 02	Test if maximum of 4 tickets are purchased and no more!	Accepted negative, 0 and more than 4 tickets.	Used 'or' operator instead of 'and' when checking both max and min(1)	Used constraintAmount() function to meet maximum requirement of 4 tickets.
Buy 04	Test if confirmation page is displayed in the form of Yes or No	The confirmation feature was not implemented		Added feature to ask for confirmation from buyer before proceeding and any other input would close transaction with error message
Buy 06	Check if seller and event exists in event's file.	Did not check the existence of event or seller before purchasing!		Used findUser() to check for existing offer in event's file
Sell 02	Test to verify the maximum length of an event title does not exceed 25 characters	Accepted empty string and strings with more than 25 characters		Used constraintStrLength() to check for restrictions.
Sell 04	Test to verify the maximum price for a ticket sale does not exceed 999.99\$	Accepted values more than 999.99\$	Entries other than digits crashed program	Used constraintAmount() to check for restrictions. Added condition to allow only digit entries.
Sell 06	Test to verify the maximum number of tickets for sale does not exceed 100 tickets	Accepted negative, 0 and more than 100 tickets as input	String entries crashed program	Used constraintAmount() to check for restrictions. Added condition to allow only digit entries.
Sell 08	Ascertain no further transactions are accepted on a new ticket for sale until the next session.	Kept accepting more transactions.		Implemented way to make the session end automatically after a sell transaction and write to Daily Transaction file.
Login 00	Test to confirm a transaction other than login is not	Login transaction was not implemented		Implemented loop that would only accept "login" or "exit"

	accepted before a login	resulting in username first being entered		command else would ask to re-enter command.
Login 01	Test to see if login functions properly	Running the software begins with an unexpected entry of the user name when it should not.	When entering input with spaces, it registers them as 2 different inputs. So we added <code>getline(cin)</code> This resulted in more errors.	We used <code>cin.clear()</code> and <code>cin.sync()</code> to fix these double enteries before each <code>getline(cin)</code> statements.
Login 02	Test to see if constraints are met (15+ character & empty usernames)	Unnecessary access to user data file for obvious constraint restrictions		Added additionally conditions to check for username basic constraints before accessing user file for efficiency.