Test Automation description:

Structure:

There are 4 files .side (selenium ide) that can be test on the test environment after the user to be test is logged.

- AddMember(Owner).side: Test for the add member feature, it generates randomly the name, last name and email of the member to be created. After is finish the process it validates that the variables generated are present on the members tab, to verify that the member was successful added.

Video of the automation: https://youtu.be/adi4ivr5qCQ

- AddMember(Advisor): Same test than the owner but with the difference that the advisor do not have option to select the advisor when creating a new household and the option to add to a current household works.

Video of the automation: https://youtu.be/v6PB0stMooU

- Delete: Test for deleting a member, it creates a member with "deletetest" as name and last name, and a random email. After it delete the generated user and verify that the member is not present on the member list.

Video of the automation: https://youtu.be/Ql4ck5Ga_3Q

- Edit: Test for editing a existing member, it change all the data (name, last name, number) with random values and after it verify that the member has all the random values present to validate that the edition was successful.

Video of the automation: https://youtu.be/vp7EhRTNPqc

Variable	Description
Name	Name randomly generated to test the
	feature
LastName	LastName randomly generated to test the
	feature
Email	Email randomly generated to test the
	feature / The automation validate that it is
	present on the member page, to verify
	that the member was successful added

Part 4: Case Studies

Case Study 1

You are faced with a problem where Advisors, Owners, and PMs report that they cannot add new members to households. Describe the steps you would take to investigate and resolve the problem.

Answer:

As first step I would ask for all the preconditions, states, users, parameters, data and interactions that the users do to recreate the scenario where the users are reporting the problem.

Once I can simulate the error in an internal environment, I can know what is the exactly problem, then I would identify in which part of the system is the error to report it with the specific area or create a solution if it is under my scope.

After one solution is developed, I would test it to ensure that it solve the problem and do not generate new problems, doing regression and functional testing.

Once the solution is tested then I can document all the investigation being specific with the scenarios and parameters in case that is needed for a future problem.

Case Study 2

The functionality of editing household members is intermittently failing, allowing users to edit members who already have investment accounts.

What measures would you take to identify the root cause and prevent similar issues in the future?

Answer:

I would attempt to replicate the issue in a controlled testing environment. This would involve simulating the different scenarios reported by users, including various combinations of household members, investment accounts, and any other relevant parameters.

I would analyze system logs during the times the issue occurs to identify any anomalies or error messages that could provide insight into the root cause. This can help pinpoint whether the failure is due to data validation, system performance, or a specific code path.

If applicable, I would review recent code changes or deployments that might have introduced the issue. Understanding the context of these changes can help in identifying whether they correlate with the reported problems.

I would assess the data integrity of the household member records, focusing on those with investment accounts. This involves checking for any inconsistencies or corruption in the database that might lead to unexpected behavior during the editing process.

While investigating the root cause, I would consider implementing temporary workarounds or fixes that could minimize the impact on users, ensuring they can continue their work without significant disruptions.

I would work closely with the development team to discuss findings and potential coderelated issues. Collaboration is essential to ensure that any fixes implemented are effective and do not introduce new problems.

Once a root cause is identified, I would thoroughly test any solutions or patches in a staging environment to ensure they resolve the issue without causing other functionalities to fail.

To prevent similar issues in the future, I would recommend implementing monitoring tools that can track the performance of the editing functionality and alert the team to any anomalies in real time.

Finally, I would document the entire investigation process, including findings, actions taken, and solutions implemented. This documentation will serve as a reference for future incidents and can help in improving overall system stability.

Debugging

Describe your process for identifying and resolving a problem where the edit and delete buttons are shown for members who already have an investment account.

Answer:

I would analyze the code responsible for rendering the edit and delete buttons. This involves checking the conditions under which these buttons are displayed and ensuring they align with the defined business logic. I would look for conditional statements that check whether a member has an investment account.

To better understand the state of the member's account, I would ensure that appropriate logging is in place. If necessary, I would add additional logs to capture the relevant details when the buttons are being rendered. This would help me trace any discrepancies in logic.

Then I would write unit tests specifically designed to validate the logic that controls the visibility of the edit and delete buttons. This would include test cases for members with and without investment accounts to ensure that the buttons behave as expected in all scenarios.

In addition to unit tests, I would conduct integration tests to verify that the interaction between the backend and frontend is functioning correctly. This would ensure that the data about investment accounts is correctly passed and interpreted by the frontend.

I would check the database to confirm that the investment account statuses are being stored and retrieved correctly. This might involve executing queries directly to ensure that the expected data is present for each member.

After making initial adjustments, I would perform manual testing in a development or staging environment to verify that the issue is resolved in a real-world scenario.

Once I identify and resolve the issue, I would conduct a code review with other developers. This peer review process helps ensure that the solution is robust and does not introduce new issues.

Finally, I would document the problem, the solution implemented, and any changes made to the code. Proper documentation is essential for future reference and for keeping the development team informed.

TEST TITLE	PRIORITY	TEST CASE ID	TEST NUMBER	TEST DATE
Add Member	HIGH	1	1	07/31/2024
FUNCTIONALITY		TEST DESIGNED BY	TEST EXECUTED BY	EXECUTION DATE
Household management, Add Member		Juan Diaz	Juan Diaz	07/31/2024

TEST DESCRIPTION	TEST DEPENDENCIES	TEST CONDITIONS
Test for the functionality of the add member feature	Being logged with a role with the permissons to add a member	Test Environment of the Zoe Finnancial Dashboard

TEST CONTROL

For this test, we will start from the point where the user is already logged in with a role that permits access to add members. The correct functioning of roles and login permissions will be tested in a separate test.

STEP ID	STEP DESCRIPTION	Input	EXPECTED RESULTS	ACTUAL RESULTS	PASS / FAIL	ADDITIONAL NOTES
1	Get from the home page to the add member screen	Click/ Look for the button	Being redirected to the add client screen after clicking	After clicking on "Add Client" the webapp redirects to the add client screen	PASS	On the UI it says add client intead of add member
2	Select an Advisor	Click/ Look for the search bar	If the search bar is clicked it should show the available advisors, and after one advisor is selected the next button should be enable	After the search bar is clicked it show the available advisors, after selected the next button is enable	PASS	There is just one advisor available on the test environment, in order to test diferent scenarios such as change the selected advisor, it would be necesary to have more advisors available.
3	Create new household	Household: Email, First name, Last name, Phone number	Click on "Add new household", be redirected to the screen where the user can put the client information, validate that the data is in the proper format and then confirm the info and it do not allow new clients with the email of one existing client	The page is redirect to the add client information where the user can fill the form, it validates the regular expressions such as email and phone number and it also validate if the area code is from USA, and if the email address is on file it shows an	PASS	After finishing this step the new client is succesfull created and the process is finished
3.2	Add to existing household (On the Add Client process)	Click/ Look for the button	After clicking on "Add new household" be redirected to the screen where the user can select between the existing households to select one and finish the process, and it do not allow new clients with the email of one existing client	Even if there are households in the enviroment, the searchbar do not show them, it shows a blank option wich if is selected it redirects to a error page	FAIL	Error detail: Cannot read properties of undefined (reading 'length')
3.3	Add to existing household (On the pipeline tab)	Household: Email, First name, Last name, Phone number	Be able to navigate to /pipeline/memeber screen/household tab and then using the add new member option fill the form with the new client info and after confirmed see the new member on thand it do not allow new clients with the email of one existing client	On the pipeline page the add memeber option display the form to add the new member to the household and the fields validate the proper format of the data and if the email address is on file it shows an alert	PASS	It just let create a new household, there is not option to select a existing client from other household

TEST TITLE	PRIORITY	TEST CASE ID	TEST NUMBER	TEST DATE
Edit Member	HIGH	1	1	07/31/2024
FUNCTIONALITY		TEST DESIGNED BY	TEST EXECUTED BY	EXECUTION DATE
Household management, Edit Member		Juan Diaz	Juan Diaz	07/31/2024

TEST DESCRIPTION	TEST DEPENDENCIES	TEST CONDITIONS
Test for the functionality of the Edit member feature	Being logged with a role with the permissons to edit a member	Test Environment of the Zoe Finnancial Dashboard

TEST CONTROL

For this test, we will start from the point where the user is already logged in with a role that permits access to edit members. The correct functioning of roles and login permissions will be tested in a separate test.

STEP ID	STEP DESCRIPTION	Input	EXPECTED RESULTS	ACTUAL RESULTS	PASS / FAIL	ADDITIONAL NOTES
1	Navigate to pipeline/ client menu / household tab	Click	Being able to navigate to the expected route	After clicking on the steps of the path the app redirects the user to the screen where the edit function is	PASS	No additional notes
2	Edit the member	Memeber new info: Name, Last name, Phone number	After clicking on edit beside the member, be able to edit all the client's information except for the email, due to business logic. The next button should be enabled just if a change was made in the client information	The form let the user edit the infomation except for the email and it brings the current information of the client, the next button is enabled after a change is made	PASS	The form keeps the data validation on the fields to make sure that the user enter proper information
3	Confirm the new info	Step 2	See the new information of the client after edited	The information of the client is updated through the different screens	PASS	After the confirmation the process is finished

TEST TITLE	PRIORITY	TEST CASE ID	TEST NUMBER	TEST DATE
Delete Member	HIGH	1	1	07/31/2024
FUNCTIONALITY		TEST DESIGNED BY	TEST EXECUTED BY	EXECUTION DATE
Household management,				

TEST DESCRIPTION	TEST DEPENDENCIES	TEST CONDITIONS
Test for the functionality of the Delete member feature	Being logged with a role with the permissons to edit a member	Test Environment of the Zoe Finnancial Dashboard

For this test, we will start from the point where the user is already logged in with a role that permits access to delete members. The correct functioning of roles and login permissions will be tested in a separate test.

TEST CONTROL

STEP ID	STEP DESCRIPTION	Input	EXPECTED RESULTS	ACTUAL RESULTS	PASS / FAIL	ADDITIONAL NOTES
1	Navigate to pipeline/ client menu / household tab	Click	Being able to navigate to the expected route	After clicking on the steps of the path the app redirects the user to the screen where the delete function is	PASS	No additional notes
2.1	Delete the first memeber	Click	After clicking on the trash can icon beside the client, the system delete the information of the client.	There is not trashcan icon beside the client or any other option to delete it	FAIL	This step applies for the first member added to the household
3	Delete a member added after the household was created	Click	After clicking on the trash can icon beside the client, the system delete the information of the client.	After clicking on the trashcan icon a pop up request the confirmation of the action, after confirmed the client is removed from all the screens	PASS	After the confirmation the process is finished

TEST TITLE	PRIORITY	TEST CASE ID	TEST NUMBER	TEST DATE	
Roles and Permissions, household management	HIGH	1	1	07/31/2024	
FUNCTIONALITY		TEST DESIGNED BY	TEST EXECUTED BY	EXECUTION DATE	
Roles and Permissions		Juan Diaz	Juan Diaz	07/31/2024	
TEST DESCRIPTION		TEST DEPENDENCIES	TEST CONDITIONS		TEST CONTROL
Test to garantee that all the roles have the proper permissions	_	User credentials for the different roles to be tested	Test Environment of the Zoe Finnancial Dashboard		The test will be divided between the different roles, the permissions are described below

Roles and Permissions:

Advisor, Owner, and PM: These roles can add, edit, and delete members in a household. However, if a member already has a completed investment account, they cannot edit or delete that member. Emails cannot be duplicated.

Client: Clients can only view the list of household members. They do not have permissions to add, edit, or delete members.

Advisor / Owner / PM

3	STEP DESCRIPTION	Input	EXPECTED RESULTS	ACTUAL RESULTS	PASS / FAIL	ADDITIONAL NOTES	TEST DATE
1	Login	Login credentials	Log in the website wiht the credentials provided to for the specify role	The credentials are valid and the dashboard shows the name of the user	PASS	No additional notes	07/31/2024
2	Add member	Household information	The specify role can add the new member on the "Add client" button and in the pipeline screen on "Add new member"	The role is able to create new members on the "Add new Client/ New household" and "Pipeline/ New member/"	PASS	The role have the permission for add members, but not all the screens work for add new members, for more detail refer to Add memeber Test	07/31/2024
3	Edit member	Household information	On the pipeline screen the role is able to edit the member info	The role is able to edit the info	PASS	For more detail with the edit process refer to Edit memeber test	07/31/2024
3	Delete member	Click	On the pipeline screen the role is able to delete the member	The role is able to delete the client	PASS	For more detail with the edit process refer to Delete memeber test	07/31/2024

Client

STEP ID	STEP DESCRIPTION	Input	EXPECTED RESULTS	ACTUAL RESULTS	PASS / FAIL	ADDITIONAL NOTES	TEST DATE
1	Login	Login credentials	Log in the website wiht the credentials provided to for the specify role	The credentials are valid and the dashboard shows the name of the user	PASS	No additional notes	07/31/2024
2	Add member	Household information	This role is not able to add a new member in either of the screens	The role is not able to add the new client	PASS	No additional notes	07/31/2024
3	Edit member	Household information	This role is not able to edit a member in either of the screens	The role is not able to edit the info	PASS	No additional notes	07/31/2024
3	Delete member	Click	This role is not able to delete member in either of the screens	The role is not able to delete the client	PASS	No additional notes	07/31/2024