



Semester 5
17 june 2024

USABILITY TESTING REPORT

**Product Suggestion Tool
for Low Pressure Studio B.V.**

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Introduction

E-commerce product suggestion/recommendation tool is a pretty common way for the companies that are operating an online store to improve their customers user experience, as well as satisfaction with a product. This solution allows users to provide input to the system, thanks to which they'll be provided with products that will suit their needs best. Bataleon is a company that is making snowboards and snowboard related equipment and they are in need of such a tool. The primary goal of making it is to improve user satisfaction with a product, and decrease return rate, by providing users with products that are most suitable for their needs. This report is based on user testing performed by potential users using Bataleon product suggestion tool in a natural environment. This user testing is aimed at validating assumptions on usability of a product, and using actual users to eliminate any errors.

The goal of this research report is to answer a research question 7, which is : How can user testing and feedback be incorporated in the design process of product suggestion tool to ensure the final product meets client's needs?

Methodology

Currently there is already a working version of a product suggestion tool developed for Bataleon which is going to be used for testing. Testing itself is going to consist of asking 4 to use the product suggestion tool in both online and offline environments.

Users are going to be asked to fill in the product suggestion tool the way that they would fill them in. Users that have tested the system offline are also going to be asked to fill in the details 2 more times, selecting an options that they haven't picked before. This way we can increase the number of test runs with one user, which will help us in identifying any bugs that might occur, as well as gathering more of users' opinions. Only the offline users are going to be asked to do so because in the offline setting we can gather more data and users opinions, and it should provide more

insights from users perspective. Testing will be recorded with screen and voice recording software, and additional notes will be taken during the testing when necessary.

RESULTS

Ronald

First person that has given me the courtesy of being a user in this scenario was Ronald, my company mentor. He is an experienced snowboarder Ronald was a great candidate to verify the system from the perspective of an experienced user.

During the first testing his first choice was to pick an intermediate level of advancement, since that is what he felt he qualified for. This has allowed him to answer the majority of questions. The next question was asking about camber, so he decided to pick a medium option. While he was selecting this option I noticed an error in the UI. The names on card-buttons were correct, however green buttons at the bottom of card-buttons should contain the same information as their counterparts above. Instead they contained options for the shape of the board of "Twin", "directional twin" and "directional", in a place where "low", "medium" and "high" options for camber should be. This error has also occurred in other questions and since been corrected. After selecting the option for middle camber, Ronald has received a question about flexibility of a snowboard. He stated that he likes the soft snowboards, and that was the option that he picked. In the question about favorite terrain, he has picked the "groomed" option. While filling in the details regarding his weight and boot size, he has noticed that a function that is responsible for changing label for "pounds" or "kilograms" doesn't work. We have agreed that it would be better to simply include "weight" in the label, instead of stating which measuring system is currently active. I have also noted that despite picking a measuring system for boots, the available options are still showing all measuring options for boots, instead of showing only the one that was picked by the user. This issue is still required to be fixed. After finalizing his sizing, he has clicked a button that is responsible for performing functions and displaying the results. He didn't receive any direct match, but the system has still delivered an outcome, for which the snowboard that should match his needs best, was Party Wave-164.

In the second round of testing Ronald has picked an "Advanced " option, this way he has answered all questions that are included in the Product suggestion tool. This has led him to question about shape, in which he decided to pick Directional Twin. In a question about camber, similarly as before he has picked a medium option. He also selected a medium option for flexibility, and a powder option for terrain which ultimately led him to the final question about sizing. He had put an input of 95 kilograms for weight and 10.5 for boot size using an American boot sizing system.

He didn't receive any direct match but the system provided him with the best available board which is Bataleon 20Y Board - 156, which is a special board which was released last year to celebrate 20 years of Bataleon as a brand.

In a third round of testing Ronald has picked a Beginner option for Level question, because he didn't fill in the product suggestion tool with this option yet. This time in a terrain option he has picked Groomed, since he felt that this terrain is more appropriate for beginner users. In the sizing options, similarly like before he has given input of 95 in weight using metric system, and 10.5 for Boot sizing using american male boot sizing system. He didn't receive any direct match, but the system has still delivered an outcome, for which the snowboard that should match his needs best, was Party Wave-164.

Agnieszka Wiszniowska

Second person that tested the product suggestion tool for usability testing was my mum Agnieszka. She doesn't have experience in snowboarding and was a good candidate to test the "beginner". This test was performed in an online environment, therefore she has filled in her details only once.

At first she chose the beginner option, since she doesn't have any experience in snowboarding. This has led her to receive only questions about terrain and sizing. In the terrain question she has chosen the powder option. During the selection of sizing she has noticed that the label is not changing between kilograms and pounds, and I have explained that this issue is already known and that I'll correct it soon, however I have left it there for now in order to ensure that all of the testing users are using the same version of program. After filling in the details regarding sizing she has not received any direct match, but the closest available option that the system provided was Party Wave-164.

Mania Szpikowska

Third person that has tested the product suggestion tool was a friend of mine, Mania Szpikowska. She doesn't have any experience in snowboarding, therefore she was a good candidate for testing a "Beginner" option.

Her first choice was to pick a beginner option in the question about "Level". This option provided her with questions about terrain and sizing. In a terrain option she has picked a powder option. When filling out sizing questions she has picked pounds as a preferred unit of measurement, but as a manual input for weight she has written 52, which would sum up to around 25 kg. For boot size she has picked american units of measurement, and selected 7.5 in male boot size. She has not received any direct match, but the closest available option that the system provided was Party Wave-164.

In the second round of testing she has chosen Advanced for level, which has led her to receive all available questions. In shape option she has picked a directional twin, and for camber, a high option. In the flexibility she has chosen soft, and for terrain she picked a groomed option. This time she has provided a more appropriate input of 52 while selecting kilograms as a unit of measurement for weight. For boot size she has picked 7.5 in american male boot size. No direct results were found, but the closest option that system has found was board finder product 2-156.

In the third round of testing Mania has picked the intermediate option. In the camber option she has picked a low option, and in flexibility a soft option. During this process she has noted that the green buttons at the bottom of the card cards have the wrong labels assigned to them. For the terrain she has picked the Groomed option. In the sizing she has included a kg as a unit of measurements with 52 for its value, and for the boot size she has picked a female american boot sizing system and 7.5 for the size itself. She has not received any direct match, but the closest available option that the system provided was Party Wave-164.

Aleksandra Oniško

Fourth person that has tested the product suggestion tool was a friend of mine, Aleksandra Oniško. She has over five years of experience in snowboarding, making her a good candidate for testing the 'Advanced' option.

At first she picked “Advanced” for her level of advancement. Then she proceeded with selecting “Directional Twin” for the shape of the board, and “high” for Camber. For the flexibility she has chosen the “Soft” option, and then in terrain, she has chosen “Groomed”. In sizing she has inputted 70 using kilograms, and 42 in european sizing. She has not received any direct match, but the closest available option that the system provided was board finder product 2-156. After the testing she revisited the “Flexibility” question and has noted that one of the options does not have labels attached to them, namely “High” option. This error has since been fixed.

DISCUSSION

Thanks to user testing several problems were uncovered. Issue that appears from the moment that a user enters the website is the lack of descriptions. It was noted on several occasions, by nearly all users that have tested the product, and it's an easy problem to fix. Another easily fixable problem that was spotted during the testing was that the green buttons that are located on the bottom of the card-buttons do not have

the same labels as the options that they should represent. By looking at recordings, all which you can find at the User Testing Recordings folder you can easily see that some questions have this problem and some don't. The question about Advancement level, and question about shape have appropriate labels in green buttons, but after that problems begin to appear. In questions about camber and flexibility all of the green buttons have labels that were meant to be included in "shape" question, and instead of displaying "low", "medium", "high" or "soft", "medium", "stiff" they display "Twin", "Directional Twin" and "Directional". This problem has since been solved.

The biggest spotted problem is with the system that is supposed to provide user with matches. During the testing there wasn't a single occurrence when the system has given the user a direct match, every time it has given the user the closest match available. Moreover during both official testing as well as when I have tried testing the product suggestion tool myself, a majority of provided closest matches were the Party Wave - 164. During the official testing this board was provided as a match to the user 5 out of 8 times. A Party Wave-164 board is a board aimed for users within intermediate-advanced range, therefore might not be entirely suitable for a beginner user, yet it was provided to them on 3 separate occasions. This might indicate that the system that distributes points to the boards might need to be altered. Most likely cause for this is located somewhere in a system that is adding scores to the boards based on user input. Currently for each parameter that the board is fulfilling, the score is being increased by 1. However, there are some issues with this solution. Firstly, in the question about terrain, users are being asked to select the terrain that they prefer. This solution would work pretty good if the boards simply had a terrain that they're meant for in a shopify database, however that is not the case. Instead they contain a rating of 0-10 for 5 different terrains. Another element that is supplementing the problem is the sizing. Despite many different approaches and multiple attempts, no matter how I approach the issue, both the Boot Sizing range and Weight range are not giving me appropriate numbers. Instead they're displaying either "-3 -3" or are displaying appropriate numbers, but are not performing necessary calculations to receive an outcome, instances of both you can find at Appendix A. Possible solution to this issue could be implementation of a system that is selecting boards that have a high rating of the option that is selected by the user, Cleay, one of my company mentors has suggested that rating to be 8 or higher.

In terms of answering a research question nr 7, I believe that this report provides sufficient proof that usability testing, performed by multiple potential users of a product is adequate in providing valuable feedback in terms of product suggestion tools' functionality as well as performance of the User interface.

Appendixes

Appendix A

Boot Size Range: -3 - 3

Weight Range: -3 - 3

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bootSizeRange: [Number(23.0)-3,Number(23.0)+3],  
weightRange: [Number(51.0)-3, Number(51.0)+3]
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