



# UltraBoost Case Study

Difficulty Rating: Beginner

25 June 2015



# Introduction

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Ultraboost is a manufacturer of health food and sports supplements. Their head office is based in São Paulo, Brazil, and domestic sales account for the majority of their trade. In an attempt to broaden their customer base, Ultraboost has asked you to produce a marketing questionnaire in support of their latest product: Ultraboost Energy Jam.

The questionnaire needs to be able to collect the following information about each participant:

- Contact details.
- Personal information about current health and fitness aspirations.
- Existing knowledge of the Ultraboost company, their product catalogue and the new Energy Jam product.

After the individual has answered all of the questions, they should be presented with a summary of their answers. If they are happy with these answers, they can submit them to Ultraboost, at which point an e-mail containing the answers will be sent to the Ultraboost marketing team.

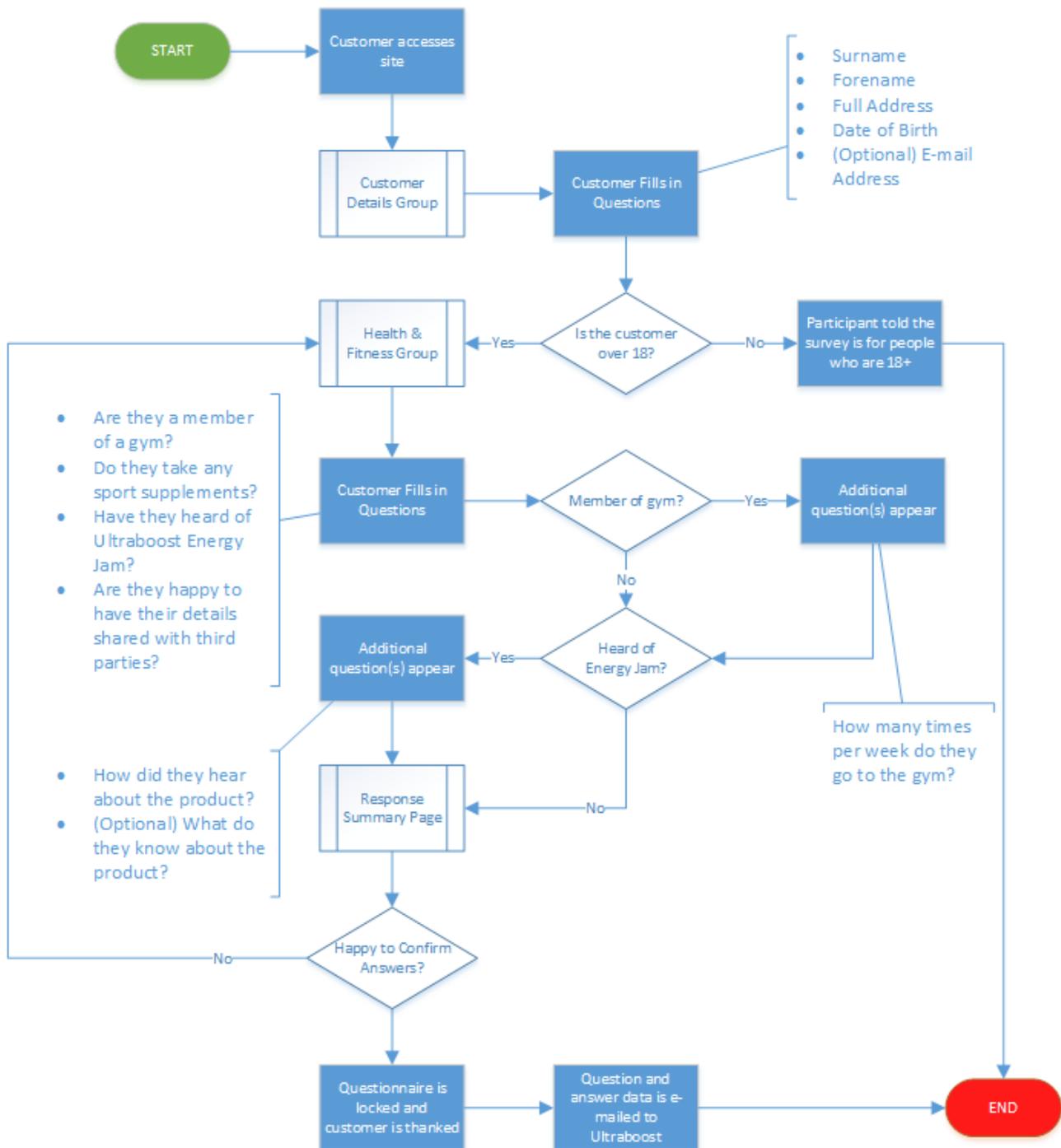


Figure 2-1: The proposed Ultraboost questionnaire flow.

## Building the Basic Model Structure

The UltraBoost questionnaire model will contain three question groups: two forms for gathering information, and a third form for presenting an overview of the participant's answers.

Each question group will contain a range of different questions with types appropriate for the information being gathered. Some of these questions are unique enough that they will be added individually, while others are similar enough that they can be added in bulk.

## Creating the Initial Question Groups

Start by adding two **Form**-type question groups to your model. The first will be used to gather contact details, while the second will capture information about the person's health and fitness habits. Give each group a name that suits and identifies its purpose, and set the number of columns in both forms to 2.

As with all new question groups, your forms will be **Checked In** and unavailable for edit, so make sure you check them out before attempting to edit them. Remember to check all question groups in afterwards, to get yourself into the habit of making content available to other editors when you have finished with it.

Before you start to populate your forms with questions, you should add **Navigation Buttons** that will allow people to move back and forth between the groups. The Ultraboost marketing team have asked for the contact details form to appear first, so make sure you set this form as your model's **Startup Group**.

## Adding Questions

Now you have the foundation of your questionnaire, you can start to create content for the participant to read and fill in. You have been asked to add questions to the **Contact Details** form that collect the following information about the participant:

Information	Question Optional?	Form Column
Surname	No	1
Forename	No	2
House number and Street Name.	No	1
District	Yes	1
Town/City	No	1
Postcode	No	1
Country	No	1
Date of birth	No	2
E-mail address	Yes	2



You may find it easier to add **Free Text** questions to this group using the **Create Questions (From CSV)** method.

The **Health and Fitness** form, meanwhile, should contain questions that gather the following information about the participant:

Information	Question Optional?	Form Column
Whether they are currently member of a gym.	No	1
How many times per week they attend their gym (Multiple Choice).	No	1
Whether they currently take any form of sports supplement.	No	1
Whether they are familiar with Ultraboost Energy Jam.	No	2
How they heard about the product (Multiple Choice).	No	2
A brief sentence or two describing what they know about the product.	Yes	2
Whether they are happy to be contacted by third parties in relation to the information gathered by the questionnaire.	No	2



Don't add any responses to the multiple choice questions yet - these are discussed during the next section of the case study.

Ensure that for each question you assign a **Type** that is appropriate for the information you intend to collect. For example, you should use an **Email** question to collect the customer's e-mail address, rather than a **Free Text** question. This helps to ensure that the response to this question is in the correct format.

Next, add all of the questions you have created so far to the **Expression Parser**. This is so their values can be used later when you create your questionnaire's summary form.

Add a narrative to the second column of the health and fitness form, and populate it with text informing the customer that Ultraboost would like to share their information with third parties in line with Ultraboost's privacy policy. Place the narrative immediately above the question that asks them to confirm they are happy for their information to be shared.

## Adding Responses to Multiple Choice Questions

In the **Health and Fitness** form, add four responses to the question that asks how the customer found out about Ultraboost Energy Jam:

- Internet advert
- Radio advert
- E-mail campaign
- Word of mouth

Next, use the **Number Range** method to add numeric answers from 0 to 7 to the question that asks how many times per week the customer visits their gym.

Finally, add a default placeholder response to the question asking how the customer first heard about Energy Jam. Ensure this response cannot be left as the customer's chosen answer to the question.



You might wonder what the customer is supposed to pick if they have never heard of the product, but this contradiction will be addressed later in the case study when conditional visibility is applied to the question.

## Enhancing the Questionnaire

Now you have a basic questionnaire structure, you are going to start adding a layer of automation to your model. This includes dynamically hiding questions depending on the customer's answers to earlier ones, and ensuring that the customer satisfies the legal age requirement to participate in the marketing survey.

### Adding Question Attributes

Assign **Visibility Expression** attributes to the following questions, where the visibility of each question depends on the corresponding condition being met:

Question	Only appears when...
"How many times per week do you visit the gym?"	The answer to "Are you currently a member of a gym?" is <b>"Yes"</b> .
"How did you first hear about the product?"	The answer to "Have you ever heard of Ultraboost Energy Jam?" is <b>"Yes"</b> .
"Optionally, tell us what you already know about Ultraboost Energy Jam."	The answer to "Have you ever heard of Ultraboost Energy Jam?" is <b>"Yes"</b> .



Remember that in order for a visibility expression to work correctly, the respective trigger question must be added to the expression parser and made to post back to the web server.

## *Validating the Customer's Age*

Create a **Validator** question in the **Contact Details** question group, and assign an attribute that ensures the person filling in the questionnaire is at least 18 years of age. You will need to write an expression that uses today's date and the customer's date of birth. Ensure the validator text makes it clear to the customer that Ultraboost products are unsuitable for people younger than 18.

## **Concluding Your Questionnaire**

When the customer has finished filling in your questionnaire, they should be provided with some feedback. Specifically, they will be presented with a form that summarises their answers and gives them the option to go back and correct any mistakes.

As soon as the customer is happy that their answers are correct, they should click a button to both confirm this fact and submit their answers. Submitted answers will be e-mailed to the Ultraboost marketing team, who can use the collected data to inform the Energy Jam campaign.

## *Writing a Confirmation E-mail Template*

The people at Ultraboost are only interested in the question and response data from each submitted questionnaire, so there is no need to create a professional-looking e-mail or include any kind of pleasantries such as "Dear Sir".

Build an **E-mail Template** that writes the keyword of each question twice in succession, where the second instance of each keyword is wrapped by a pair of tildes so the question's value appears rather than the literal keyword itself. To make the data easier to read, you should separate the literal and dynamic keywords using appropriate formatting, such as a colon and a single space.

Give the e-mail template a suitable subject and a keyword, then save it for later use.

## *Building Your Summary Form*

Create a third **Form**-type question group to serve as your questionnaire's summary. Place a narrative at the top of the page to thank the customer for taking part in the questionnaire. The narrative should also ask the customer to review their answers before either returning to an earlier part of the questionnaire to make corrections, or confirming their answers for submission.

Next, add a series of **Read-Only Text** items to the summary. Each one should correspond to a question that the customer has been asked during the questionnaire. Using attributes, map the answer of each question to the corresponding read-only text. There is a lot of information to display, so consider carefully the order in which the answers should appear, and whether or not the summary would be best split into multiple columns.

Add another navigation button to the **Health and Fitness** form. The customer should be able to use this button to progress to the **Summary Form**. Then, add a navigation button to the summary form to allow the customer to return to their questionnaire and change their answers as needed. Give the second button a caption that makes it clear they will be able to change their answers.

Finally, add a regular button to the bottom of your summary page. This button allows the customer to submit their answers, resulting in the following:

- The buttons for returning to an earlier part of the questionnaire and submitting the answers should be disabled using **Enable Expression** attributes, to prevent changes being made or the questionnaire being submitted a second time.
- An e-mail containing the customer's responses should be sent to an e-mail address representing the Ultraboost marketing team.
- An additional narrative question should appear, confirming the questionnaire has been submitted and thanking the customer once more. A suitable **Visibility Expression** will need to be applied to this narrative after you have created it.



Enable expression and visibility expression attributes rely on a particular condition being met. One of the best ways of implementing them in this example is to create a variable whose value starts off as 0, and changes to 1 when the user submits their responses. Both types of attribute can rely on the value of this single variable.

Create all of the questionnaire elements required to fulfil the submission process. Don't forget you can use semicolons to create **Multi-line Expressions** that accomplish all of the above with a single button click.

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Actions	
Attributes	✓
CDS	
Data Processing	
Data Source Grids	
Data Sources	
Documents	
E-Mail Templates	✓
Language Translations	
Model Scheduler	
Model Variables	✓
Output Designer	
Rating Definitions	
Repeating Question Groups	
States	
Users/Roles/Workgroups	
Validators	✓

## Abstract

The UltraBoost Energy Jam case study is a demonstration of some of KnowledgeKube's core features. The finished product allows collection of data, while simple automation demonstrates how different features of KnowledgeKube can be used together to create a dynamic user experience.

During this study you will construct a marketing questionnaire for a fictional health food company called UltraBoost. Users of the questionnaire are asked to provide contact details together with information about their health and lifestyle. Upon completion of the questionnaire, an e-mail containing the participant's responses will be e-mailed to Ultraboost for use with their marketing campaign.

## Prerequisites

Other than an understanding of the KnowledgeKube features covered herein, there are no prerequisites to this case study.