Card Sort Analysis

**Federal Government Agency\*** 

**Website Re-Architecture** 

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### 1 Introduction

The Federal Government Agency\* (ABCDE\*) enlisted Company\* to conduct a comprehensive rearchitecture of abcde.gov/wxyx\*.

As part of this process, Company\* evaluated the Information Architecture (IA) of the Wxyz\* section to learn how content is currently organized and where that organization presents possible problems and issues.

As a result of this analysis, Company\* recommended refining the IA of abcde.gov/wxyx\*. To help guide the refinement of the IA, Company\* conducted a "card sort" test to collect feedback from representative site users to guide the new IA, gain insight into how users think about abcde.gov/wxyx\*'s information and its relevance to them, obtain user input on how content categories should be labeled, and understand the differences between how internal ABCDE\* employees and external users organize and categorize abcde.gov/wxyx\* content.

The technique known as a "card sort" is a user-centered design method that helps discern how users think about content and categories. Information gleaned from a card sort influences the information design process to help generate an overall information structure and inform navigation, menus and labeling. For a detailed description of the components of the card sort and the test process, please see Appendix A.

#### **Card Sort Elements**

Based on stakeholder interviews and analysis of the ForeSee customer satisfaction survey results and Google analytics, Company\* identified 11 pre-defined categories for the closed card sort. These categories were presented to users in random order, to reduce bias:

- 1. Dietary Supplements
- 2. Wxyz\* Defense & Emergency Response
- 3. Illness & Outbreaks
- 4. Guidance, Compliance & Regulations
- 5. Ingredients
- 6. Labeling
- 7. Nutrition
- 8. Packaging
- 9. Recalls & Alerts
- 10. Science & Research
- 11. Pathogens & Contaminants

Company\* then identified 39 sub-topics and specific content examples to use as the "cards" for this card sort. These cards were picked from a variety of sources: analysis of ForeSee Customer Satisfaction survey data; top 100 pages based on Google Analytics data from the last six months; and top search queries. These cards were considered to be a representative sampling of abcde.gov/wxyx\* content at various levels of granularity. Some cards represent content that lives outside of abcde.gov/wxyx\* (e.g., "Recalls") but is considered important for users of abcde.gov/wxyx\*. This list of cards is not intended to be comprehensive of all of the major areas

of content abcde.gov/wxyx\* has, but representative of main areas of concern to the site users and ABCDE\* strategic initiatives.

### 2 Summary of Findings

Through this card sort test, Company\* has learned:

- 1. There are several card topics for which audiences selected categories that do not match where the content currently lives. This indicates a weak association between the card topic and where the topic lives in the current website. The locations of these types of content should be carefully considered in the re-architecture of abcde.gov/wxyx\*.
- 2. Results indicate that across all audiences, participants are confused about which category to select for several topics. This indicates that users of the website would experience similar confusion when seeking information on these topics. In the re-architecture of abcde.gov/wxyx\*, this issue could be addressed by increasing cross-reference links for these topics.
- 3. For some cards, the card sort participants had little agreement on the category the topic should be most associated with. This indicates that users might seek the same information from different paths on the site. In the re-architecture of abcde.gov/wxyx\*, this issue could be also be addressed by increasing cross-reference links for these topics, which would facilitate the "findability" of each topic.
- 4. Numerous participants in the card sort commented that many cards could fit into more than one category, further illustrating the importance of good cross-referencing within the IA.
- 5. For the most part, the different participant groups sorted the cards into the same categories. However, when there are exceptions, the results show that the internal (ABCDE\* employees) and external participants were categorizing content differently. Internal Users were more likely to select the location where the topic could be found in the current website. This is most likely caused by their increased familiarity with the current website and ABCDE\* organizational structure. External users were likely to put content where they intuitively would seek to find it.
- 6. Internal and external users were often confused about where to sort content that currently lives in the "Resources for You" section. This indicates that Resources for You is an inappropriate section to make the "home" for any piece of content. Instead, any topic viewed in the "Resources for You" section should be only a cross-referencing link.

The following pages provide information about the findings from the ABCDE\* card sort.

### **3 Card Sort Findings**

### 3.1 Participation and Responses

Participants for the ABCDE\* card sort test were recruited through email subscription lists and an internal staff email. The exercise took each participant approximately 10 to 15 minutes to complete. Audience segmentation was achieved through targeted recruitment using audience-specific email lists and corresponding URLS for each of the targeted groups. All participants were volunteers. For a complete description of audience identification and participant recruitment efforts, please refer to Appendix A.

A total of 2679 users participated in the card sort exercise. The breakdown of participants from the various user groups was as follows:

General Public/Health Educators: 1727 responses

Regulated Industry/Science Experts: 909 responses

Internal ABCDE\* Employees: 43 responses

### 3.2 Key Findings

Below is a table showing the summary of findings. For each card, the table lists where the content currently lives in the site, the most popular category selected by all audiences for that card, and each audience's selection for where it should live. For example, for the card with the description "Adverse Event Reporting for Dietary Supplements", the table shows where that content currently lives and each audience's selections for where that card topic should be placed. In this example, the audience selections match up with where the content currently lives.

Colors are used to indicate significant responses. The significance of these responses are described below the table.

Card/Category	Where Content Lives Now	All Audiences	General Public/ Health Educators	Reg. Industry/ Scientists	Internal
Submissions on bioengineered new plant varieties	Biotechnology	Science/Research (68%)	Science/Research (68%)	Science/Research (68%)	Science/Research (44%)
Genetically engineered plants for Wxyz* and feed	Biotechnology	Science/Research (59%)	Science/Research (57%)	Science/Research (62%)	Science/Research (51%)
Adverse Event Reporting for Dietary Supplements	Dietary Supplements	Dietary Supp (58%)	Dietary Supp (56%)	Dietary Supp (61%)	Dietary Supp (72%)
Dietary Supplement Alerts	Dietary Supplements	Dietary Supp (53%)	Dietary Supp (53%)	Dietary Supp (53%)	Dietary Supp (51%)
Why Wxyz* facilities must register w/ ABCDE* under the Bioterrorism Act	Wxyz* Defense & Emergency Response	Guid/Comp/Reg (47%)	Guid/Comp/Reg (47%)	Guid/Comp/Reg (47%)	Guid/Comp/Reg (67%)
Advice for restaurants reopening after a hurricane	Wxyz* Defense & Emergency Response	Wxyz* Def/Emerg Resp (64%)	Wxyz* Def/Emerg Resp (64%)	Wxyz* Def/Emerg Resp (65%)	Wxyz* Def/Emerg Resp (72%)
Industry Guidance for Wxyz* Contact Substances	Wxyz* Ingredients & Packaging	Guid/Comp/Reg (69%)	Guid/Comp/Reg (70%)	Guid/Comp/Reg (69%)	Guid/Comp/Reg (58%)
Wxyz* & color additives - how they are regulated	Wxyz* Ingredients & Packaging	Guid/Comp/Reg (49%)	Guid/Comp/Reg (52%)	Guid/Comp/Reg (45%)	Ingredients (49%)

Card/Category	Where Content Lives Now	All Audiences	General Public/ Health Educators	Reg. Industry/ Scientists	Internal
Generally Recognized as Safe	Wxyz*	Guid/Comp/Reg	Guid/Comp/Reg	Guid/Comp/Reg	Ingredients
(GRAS) Notification Program	Ingredients & Packaging	(41%)	(40%)	(44%)	(49%)
Information about Wxyz* Additives	Wxyz* Ingredients & Packaging	Ingredients (55%)	Ingredients (51%)	Ingredients (62%)	Ingredients (74%)
List of Wxyz* Additives showing their regulatory status	Wxyz* Ingredients & Packaging	Ingredients (42%)	Ingredients (35%)	Ingredients (52%)	Ingredients (72%)
Database of Generally Recognized as Safe (GRAS) Substances	Wxyz* Ingredients & Packaging	Ingredients (30%)	Guid/Comp/Reg (28%)	Ingredients (42%)	Ingredients (79%)
Sodium Reduction Initiative	Wxyz* Ingredients & Packaging	Nutrition (51%)	Nutrition (48%)	Nutrition (56%)	Nutrition (60%)
Wxyz* Safety Modernization Act (FSMA) implementation progress	Wxyz* Safety	Guid/Comp/Reg (70%)	Guid/Comp/Reg (66%)	Guid/Comp/Reg (77%)	Guid/Comp/Reg (77%)
FAQs about the Wxyz* Safety Modernization Act (FSMA)	Wxyz* Safety	Guid/Comp/Reg (69%)	Guid/Comp/Reg (64%)	Guid/Comp/Reg (77%)	Guid/Comp/Reg (88%)
Interstate milk shippers certified by state authorities	Wxyz* Safety	Guid/Comp/Reg (66%)	Guid/Comp/Reg (66%)	Guid/Comp/Reg (64%)	Guid/Comp/Reg (79%)
Hazard Analysis & Critical Control Point (HACCP)	Wxyz* Safety	Guid/Comp/Reg (45%)	Guid/Comp/Reg (32%)	Guid/Comp/Reg (67%)	Guid/Comp/Reg (86%)
Investigation of a Salmonella outbreak	Wxyz* Safety	Illness/Outbreak (64%)	Illness/Outbreak (62%)	Illness/Outbreak (67%)	Illness/Outbreak (79%)
Book about major causes of Wxyz*borne illness	Wxyz* Safety	Illness/Outbreak (50%)	Illness/Outbreak (49%)	Illness/Outbreak (52%)	Illness/Outbreak (47%)
Information about Wxyz* Allergens	Wxyz* Safety	Ingredients (21%)	Ingredients (20%)	Ingredients (22%)	Ingredients (28%)
Info for general public about mercury in fish and shellfish	Wxyz* Safety	Path/Contam (43%)	Path/Contam (42%)	Path/Contam (44%)	Path/Contam (56%)
Analysis of arsenic in rice and rice products	Wxyz* Safety	Path/Contam (38%)	Path/Contam (38%)	Science/Research (42%)	Path/Contam (56%)
Info related to recall of cantaloupes with Listeria	Wxyz* Safety	Recalls & Alerts (67%)	Recalls & Alerts (65%)	Recalls & Alerts (70%)	Recalls & Alerts (72%)
Current Good Manufacturing Practices (CGMPs)	Guidance, Compliance & Regulatory	Guid/Comp/Reg (79%)	Guid/Comp/Reg (75%)	Guid/Comp/Reg (86%)	Guid/Comp/Reg (91%)
Register your Wxyz* Facility with the ABCDE*	Guidance, Compliance & Regulatory	Guid/Comp/Reg (79%)	Guid/Comp/Reg (81%)	Guid/Comp/Reg (75%)	Guid/Comp/Reg (81%)
Fish and Fishery Products Hazards and Controls Guidance	Guidance, Compliance & Regulatory	Guid/Comp/Reg (71%)	Guid/Comp/Reg (68%)	Guid/Comp/Reg (77%)	Guid/Comp/Reg (88%)
Guide for Wxyz* companies about the proper labeling of Wxyz* products	Guidance, Compliance & Regulatory	Labeling (65%)	Labeling (59%)	Labeling (76%)	Labeling (79%)
Guidance document about labeling allergens in Wxyz* products	Guidance, Compliance & Regulatory	Labeling (53%)	Labeling (48%)	Labeling (62%)	Labeling (58%)
Information about Importing Wxyz* Products into the United States	International Activities	Guid/Comp/Reg (75%)	Guid/Comp/Reg (73%)	Guid/Comp/Reg (79%)	Guid/Comp/Reg (84%)
Claims that can be made for Wxyz*s and dietary supplements	Labeling & Nutrition	Dietary Supp (43%)	Dietary Supp (46%)	Dietary Supp (37%)	Dietary Supp (42%)

Card/Category	Where Content Lives Now	All Audiences	General Public/ Health Educators	Reg. Industry/ Scientists	Internal
Nutrition Information for Raw Fruits, Vegetables, and Fish	Labeling & Nutrition	Nutrition (79%)	Nutrition (76%)	Nutrition (83%)	Nutrition (90%)
Consumer info about Wxyz* and water safety during hurricanes	Resources For You	Wxyz* Def/Emerg Resp (72%)	Wxyz* Def/Emerg Resp (74%)	Wxyz* Def/Emerg Resp (67%)	Wxyz* Def/Emerg Resp (72%)
Guides for People at Risk of Wxyz*borne Illness General info about Trans Fat on the	Resources For You Resources For	Illness/Outbreak (52%) Labeling (48%)	Illness/Outbreak (49%) Labeling (46%)	Illness/Outbreak (55%) Labeling (52%)	Illness/Outbreak (67%) Nutrition (51%)
Nutrition Facts Label Wxyz* Facts for Consumers: Wxyz* Allergies: What You Need to Know	You Resources For You	Nutrition (19%)	Nutrition (20%)	Nutrition (16%)	Illness/Outbreak (21%)
Risk Assessment /Safety Assessment	Science & Research	Guid/Comp/Reg (36%)	Guid/Comp/Reg (34%)	Guid/Comp/Reg (39%)	Science/Research (58%)
Manual of microbiological analysis procedures	Science & Research	Science/Research (51%)	Science/Research (55%)	Science/Research (45%)	Science/Research (53%)
Recalls, Market Withdrawals & Safety Alerts	Safety	Recalls & Alerts (90%)	Recalls & Alerts (90%)	Recalls & Alerts (91%)	Recalls & Alerts (91%)
Warning Letters to companies about violations	Guidance, Compliance & Regulatory	Guid/Comp/Reg (55%)	Guid/Comp/Reg (58%)	Guid/Comp/Reg (48%)	Guid/Comp/Reg (51%)

#### 3.2.1 Results Differ from Current IA

In the table above, there are several card topics for which audiences selected categories that do not match where the content currently lives. In these cases, the audience selections are highlighted in orange. For example, for the card with the description "Why Wxyz\* facilities must register w/ ABCDE\* under the Bioterrorism Act", respondents selected "Guidance, Compliance & Regulations", rather than where the content currently lives, under "Wxyz\* Defense & Emergency Response".

In such cases, the findings indicate that there is a weak association between the card topic and where the topic lives in the current website. The locations of these topics should be carefully considered in the re-architecture of the abcde.gov/wxyx\* section, because it is likely to be a current source of confusion and frustration for website audiences. The card sort topics with weak associations to their current locations include:

- Why Wxyz\* facilities must register w/ ABCDE\* under the Bioterrorism Act
- Industry Guidance for Wxyz\* Contact Substances
- Wxyz\* & color additives how they are regulated
- Generally Recognized as Safe (GRAS) Notification Program
- Database of Generally Recognized as Safe (GRAS) Substances
- Sodium Reduction Initiative
- Wxyz\* Safety Modernization Act (FSMA) implementation progress
- FAQs about the Wxyz\* Safety Modernization Act (FSMA)
- Hazard Analysis & Critical Control Point (HACCP)
- Information about Wxyz\* Allergens

- Analysis of arsenic in rice and rice products
- Info related to recall of cantaloupes with Listeria
- Guide for Wxyz\* companies about the proper labeling of Wxyz\* products
- Guidance document about labeling allergens in Wxyz\* products
- Information about Importing Wxyz\* Products into the United States
- Claims that can be made for Wxyz\*s and dietary supplements
- Consumer info about Wxyz\* and water safety during hurricanes
- Guides for People at Risk of Wxyz\*borne Illness
- General info about Trans Fat on the Nutrition Facts Label
- Wxyz\* Facts for Consumers: Wxyz\* Allergies: What You Need to Know
- Risk Assessment /Safety Assessment

### 3.2.2 Cards with Low Agreement

Occasionally the results also show that across the audiences participating in the card sort, there is distinct confusion about which category should be selected as a place to store that topic. The card topics for these rows are highlighted in green.

In such cases, the findings indicate that audiences are confused about where the card topic is most likely to be found in the website. The topic either has associations with more than one area in the website, or the card sort participants were unable to find any distinct category it should be associated with from those provided. The treatment of these topics should be carefully considered in the re-architecture of abcde.gov/wxyx\* because the audiences are confused about where to find these topics, and the content may have more than one potential "home" in the website. For these reasons, audiences may not be finding a topic when they select their path of navigation, and there is no cross-referencing link or helpful guide to what they seek. This can be source of great frustration for abcde.gov/wxyx\* website audiences.

In the re-architecture of abcde.gov/wxyx\*, increasing cross-reference links for these topics will help users find each of the possible "homes" for topics. The card sort topics with multiple, weak, or missing associations include:

- Wxyz\* & color additives how they are regulated
- Generally Recognized as Safe (GRAS) Notification Program
- Database of Generally Recognized as Safe (GRAS) Substances
- Analysis of arsenic in rice and rice products
- General info about Trans Fat on the Nutrition Facts Label
- Wxyz\* Facts for Consumers: Wxyz\* Allergies: What You Need to Know
- Risk Assessment /Safety Assessment

For some cards, the card sort participants had little agreement on the category the topic should be most associated with. In the table below, the "highest" percentage of agreement across the audiences remained below 50%.

This is another issue that can be addressed in the re-architecture of abcde.gov/wxyx\* by increasing cross-reference links for these topics. This will facilitate "findability" of each topic. When more than one location has a strong association with a topic, increased cross-referencing can be used to associate the topic with another location where more content on that topic exists. Numerous participants in the card sort commented that many cards could fit into more than one category. This further illustrates the importance of good cross-referencing within the IA.

Cards with no clear "winner"	Most Popular Category	2 <sup>nd</sup> Most Popular Category
Analysis of arsenic in rice and rice products	Pathogens & Contaminants (38%)	Science & Research (37%)
Claims that can be made for Wxyz*s and dietary supplements	Dietary Supplements (43%)	Labeling (23%)
Database of Generally Recognized as Safe (GRAS) Substances	Ingredients (30%)	Guidance, Compliance & Regulations (28%)
Wxyz* & color additives - how they are regulated	Guidance, Compliance & Regulations (49%)	Ingredients (31%)
Wxyz* Facts for Consumers: Wxyz* Allergies: What You Need to Know	Nutrition (19%)	Ingredients (15%) & Labeling (15%)
General info about Trans Fat on the Nutrition Facts Label	Labeling (48%)	Nutrition (35%)
Generally Recognized as Safe (GRAS) Notification Program	Guidance, Compliance & Regulations (41%)	Ingredients (16%)
Hazard Analysis & Critical Control Point (HACCP)	Guidance, Compliance & Regulations (45%)	Wxyz* Defense & Emergency Response (22%)
Info for general public about mercury in fish and shellfish	Pathogens & Contaminants (38%)	Recalls & Alerts (14%)
Information about Wxyz* Allergens	Ingredients (21%)	Labeling (18%)
List of Wxyz* Additives showing their regulatory status	Ingredients (42%)	Guidance, Compliance & Regulations (29%)
Risk Assessment /Safety Assessment	Guidance, Compliance & Regulations (36%)	Wxyz* Defense & Emergency Response (26%)
Why Wxyz* facilities must register w/ ABCDE* under the Bioterrorism Act	Guidance, Compliance & Regulations (47%)	Wxyz* Defense & Emergency Response (43%)

### **3.2.3** Different Results Across Audiences

For the most part, the different card sort audiences sorted the cards into the same groups, with a few exceptions. These differences most often occurred between internal (ABCDE\* employees) and external participants. The examples in the table below show that Internal Users were more

likely to select the location where the topic could be found in the current website. This is most likely caused by their increased familiarity with the current website and organizational structure.

However, in two cases, for the "Resources for You" sections (highlighted in green in the below table), both Internal Users and External Users were confused about which category was most closely associated with the card topic. This indicates that Resources for You is an inappropriate section to make the "home" for any piece of content. Instead, any topic viewed in the "Resources for You" section should be only a cross-referencing link.

Cards sorted differently by internal vs. external users	Where Content Lives Now	External Users	Internal Users
Wxyz* & color additives - how they are regulated	Wxyz* Ingredients & Packaging	Guidance, Compliance & Regulations (49%)	Ingredients (49%)
Wxyz* Facts for Consumers: Wxyz* Allergies: What You Need to Know	Resources for You	Nutrition (19%)	Illness/Outbreak (21%)
General info about Trans Fat on the Nutrition Facts Label	Resources for You	Labeling (48%)	Nutrition (51%)
Generally Recognized as Safe (GRAS) Notification Program	Wxyz* Ingredients & Packaging	Guidance, Compliance & Regulations (41%)	Ingredients (49%)
Risk Assessment /Safety Assessment	Science & Research	Guidance, Compliance & Regulations (36%)	Science/Research (58%)

### 3.2.4 Guidance, Compliance & Regulations

"Guidance, Compliance & Regulations" was the most popular category into which participants sorted cards. This category was the most popular choice for 14 of the 39 cards (36%), and the second most popular choice for 8 cards (21%). Many participants suggested in their comments that "Guidance, Compliance & Regulations was too broad a category and should be broken up, often suggesting that Guidance and Regulations be separated from Compliance.

Users often sorted guidance information about a particular topic into that topic's category, if available. For example, the card "Guidance document about labeling allergens in Wxyz\* products" was most often sorted into "Labeling" (53%), with "Guidance, Compliance & Regulations" coming in second at 32%. However, many cards for guidance and regulatory information that did not fit into a specific topic (e.g., Wxyz\* Safety Modernization Act or Current Good Manufacturing Processes) were sorted by users into the "Guidance, Compliance & Regulations" section. Company\*'s recommendation is for all Guidance information to live in the same section (Guidance & Regulation), but it is imperative to provide up-to-date cross-referencing for guidance and regulatory information in all of the other categories/sections of abcde.gov/wxyx\*.

## 4 Next Steps

The results from the card sort test will contribute to the creation of an updated and refined IA for abcde.gov/wxyx\*. The new IA will then be tested in the upcoming wireframe usability tests.

### Appendix A - Card Sort Setup

The technique known as a "card sort" is a user-centered design method that helps discern how users think about content and categories. Information gleaned from a card sort influences the information design process to help generate an overall information structure and inform navigation, menus and labeling. For the ABCDE\* card sort, Company\* utilized a "closed" card sort, in which categories and their labels are pre-defined and participants are asked to drag cards representing examples of content into those categories. This is in contrast to an "open" card sort in which participants create their own categories by dragging cards into groups that make the most sense to them and then labeling each of the categories they create.

### **Participation and Responses**

Participants for the ABCDE\* card sort test were recruited through email subscription lists and an internal staff email. Audience segmentation was achieved through targeted recruitment using audience-specific email lists and corresponding URLS for each of the targeted groups. All participants were volunteers.

The card sort test attempted to gather as many participants as possible through ABCDE\* outreach efforts, for maximum data collection and statistical validation of the results. Three different links for the card sorts were sent out: one for General Public/Health Educators, one for Regulated Industry/Science Experts, and one for internal ABCDE\* employees. The content of each card sort was the same—having the three different links allows comparisons between user groups to be made during the analysis of the card sort results.

### **External Particpants:**

External participants (General Public/Health Educators and Regulated Industry/Science Experts) were recruited through the following GovDelivery email subscription lists:

- ABCDE\* Constituent Update
- ABCDE\* News for Educators
- Color Certification Reports
- Dietary Supplements & Wxyz\* Labeling
- ABCDE\* Color Additive News
- Wxyz\* Safety Alerts
- Interstate Certified Shellfish Shippers
- Interstate Milk Shippers
- Wxyz\*Safety.gov

On November 7, 2012, ABCDE\* sent out the following request for participation via the various email subscription lists:

"The Federal Government Agceny is working to improve and enhance the Wxyz\* section of the ABCDE\* website. User feedback is a key element driving enhancements to the Wxyz\* section, and we are looking to you for help.

One of our first tasks is to improve the organization of information on the site. You can help us by participating in a "card sort" exercise to help us better understand how information should be categorized and organized on abcde.gov/wxyx\*. Can you spare approximately 15 minutes to participate online?

The card sort is very intuitive and no web design expertise is needed. Please consider helping us by choosing the most appropriate link from the two below and proceeding through the task. The card sort will be available for the next 4 business days and will close on Tuesday, November 13.

General Public and Health Educators use this link (<a href="http://bit.ly/TuAI5Z">http://bit.ly/TuAI5Z</a>).

Regulated Wxyz\* industry and policy/science experts use this link (<a href="http://bit.ly/TuADiM">http://bit.ly/TuADiM</a>)."

### **Internal Participants:**

Company\* provided a separate URL for ABCDE\* employees to perform the card sort for internal purposes. On November 8, 2012, ABCDE\* sent out the following request for participation to all of the different office directors within ABCDE\*:

"Dear office director,

As you know, the ABCDE\* Web Team is working to enhance and improve the Wxyz\* section of the ABCDE\* website. Your office's feedback is a key element driving enhancements to the web site, and we are looking to you for help.

One of our first tasks is to improve the organization of information on the site. You can help us by participating in an online "card sort" exercise to help us better understand how information should be categorized and organized on abcde.gov/wxyx\*.

### How you can help:

- Can you spare approximately 15 minutes to participate in the card sort online?
- And would you please forward this to your staff and encourage them to participate as well?

The card sort is very intuitive and no web design expertise is needed. To participate in the card sort, please go to: <a href="https://company\*ux.optimalworkshop.com/optimalsort/ABCDE\*-int">https://company\*ux.optimalworkshop.com/optimalsort/ABCDE\*-int</a>

Thank you in advance for your assistance. The card sort will be available for the next 3 business days and will close on Wednesday, November 14.

**IMPORTANT:** Please do NOT forward this link to individuals outside of ABCDE\*. If you know of individuals outside of ABCDE\* who would like to participate, let me know as soon as possible. We have a separate card sort area for their input."

#### **Card Sort Text**

Introductory text and instructions were provided to the participants to introduce and explain the test. Thank you text was shown after the participants completed the test.

### **Introductory Text:**

"Welcome to the ABCDE\* (<a href="www.abcde.gov/wxyx">www.abcde.gov/wxyx\*</a>) website architecture improvement effort. Thank you for helping us make our website easier to use! Your input will help us to create a more logical and easy to use abcde.gov/wxyx\*.

This activity shouldn't take longer than 10 to 15 minutes to complete. The results of this exercise are anonymous and will be used solely for the purpose of improving abcde.gov/wxyx\*. Your responses will help us to organize the content found here. Find out how on the next page..."

(image removed for confidentiality)

Figure 1: Welcome Text at beginning of card sort

#### Instructions:

"Your task is to organize a list of items into groups that belong together.

On the next screen you'll see the list of items. Grouping them is easy. Follow these steps:

- 1. Click on an item from the list on the left
- 2. Drag the item into the workspace on the right and drop it into the category it most closely matches
- 3. Repeat for all of the items
- 4. You do NOT need to use all of the categories. Use only the categories that make sense to you. If you do not know where to sort something, leave it in the list on the left
- 5. Feel free to add any additional feedback or thoughts in the comments area

To view these instructions at any time during the card sort, click the 'View instructions' link at the bottom of the page.

This is what it will look like: (See <u>Figure 2</u> for images) Click continue to begin the exercise..."

(image removed for confidentiality)

Figure 2: card sort Instructions

#### **Thank You Text:**

"All done! Thanks again for your participation. Your feedback is incredibly useful in helping to determine how our content should be organized, to make the abcde.gov/wxyx\* website easier to use.

You may now close this window or navigate to another webpage."

(image removed for confidentiality)

Figure 3: Thank You text at end of card sort

#### **Card Sort Elements**

Based on stakeholder interviews and analysis of the ForeSee customer satisfaction survey results and Google analytics, Company\* identified 11 overall category areas to serve as the pre-

defined categories of this closed card sort. These categories were presented to users in random order, to reduce bias:

- 12. Dietary Supplements
- 13. Wxyz\* Defense & Emergency Response
- 14. Illness & Outbreaks
- 15. Guidance, Compliance & Regulations
- 16. Ingredients
- 17. Labeling
- 18. Nutrition
- 19. Packaging
- 20. Recalls & Alerts
- 21. Science & Research
- 22. Pathogens & Contaminants

Company\* then identified 39 sub-topics and specific content examples to use as the "cards" for this card sort. These cards were picked from a variety of sources: analysis of ForeSee Customer Satisfaction survey data; top 100 pages based on Google Analytics data from the last six months; and top search queries. These cards were considered to be a representative sampling of abcde.gov/wxyx\* content at various levels of granularity. Some cards represent content that lives outside of abcde.gov/wxyx\* (e.g., "Recalls") but is considered important for users of abcde.gov/wxyx\*. This list of cards is not intended to be comprehensive of all of the major areas of content abcde.gov/wxyx\* has, but representative of main areas of concern to the site users and ABCDE\* strategic initiatives. See the table below for a list of all cards.

Participants will not be required to sort all cards into the buckets to complete the test. The cards will be provided to the participants in a random order. Participants will also have a freetext field to enter additional comments about the card sort, if desired.

Genetically engineered plants for Wxyz* and feed		
Submissions on bioengineered new plant varieties		
Dietary Supplement Alerts		
Adverse Event Reporting for Dietary Supplements		
Why Wxyz* facilities must register w/ ABCDE* under the Bioterrorism Act		
Advice for restaurants reopening after a hurricane		
Information about Wxyz* Additives		
List of Wxyz* Additives showing their regulatory status		
Industry Guidance for Wxyz* Contact Substances		
Generally Recognized as Safe (GRAS) Notification Program		
Database of Generally Recognized as Safe (GRAS) Substances		
Wxyz* & color additives - how they are regulated		
Sodium Reduction Initiative		

Info related to recall of cantaloupes with Listeria
Investigation of a Salmonella outbreak
Information about Wxyz* Allergens
Book about major causes of Wxyz*borne illness
Analysis of arsenic in rice and rice products
FAQs about the Wxyz* Safety Modernization Act (FSMA)
Wxyz* Safety Modernization Act (FSMA) implementation progress
Hazard Analysis & Critical Control Point (HACCP)
Interstate milk shippers certified by state authorities
Info for general public about mercury in fish and shellfish
Current Good Manufacturing Practices (CGMPs)
Guide for Wxyz* companies about the proper labeling of Wxyz* products
Guidance document about labeling allergens in Wxyz* products
Fish and Fishery Products Hazards and Controls Guidance
Register your Wxyz* Facility with the ABCDE*
Information about Importing Wxyz* Products into the United States
Nutrition Information for Raw Fruits, Vegetables, and Fish
Claims that can be made for Wxyz*s and dietary supplements
General info about Trans Fat on the Nutrition Facts Label
Guides for People at Risk of Wxyz*borne Illness
Consumer info about Wxyz* and water safety during hurricanes
Wxyz* Facts for Consumers: Wxyz* Allergies: What You Need to Know
Manual of microbiological analysis procedures
Risk Assessment /Safety Assessment
Warning Letters to companies about violations
Recalls, Market Withdrawals & Safety Alerts

(image removed for confidentiality)

Figure 4: Card Sort Exercise Sample Screen