

**Baseline Survey of the UBC Food System:  
Public Opinion to Inform Food System Targets**

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**April 2012**

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**Scenario 5: Baseline Survey of the UBC Food System  
Public Opinion to Inform Food System Targets**

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### **Abstract**

*As part of the University of British Columbia’s Food Systems Project our group conducted a survey to determine baseline knowledge, attitudes and practices of the Campus community. For our methods we used convenience sampling to target the ideal 1000 participants in our survey. Participants engaged in either web based surveys or hard copy surveys to measure their attitudes, behaviour and knowledge about the UBC food system. 413 individuals participated in our survey with 117 filling out hard copy surveys and 296 doing web-based surveys. We found that there was a lot of opportunity to increase knowledge about food sustainability on campus as well as a definite need to improve student’s actual practices within the UBC food system. But there is interest and demand for this information.*

### **Introduction**

The UBC Food Systems Project (UBCFSP) is a collaborative, community based action research (CBAR) project with the aim to improve food system sustainability and food security. The Faculty of Land and Food Systems jointly initiated this project with

UBC's Sustainability Office's "Social, Ecological, Economic and Development Studies" (SEEDS) program (Baker-French, 2009). In its aim to critically assess the environmental, social and economic sustainability of the UBC campus food system the UBCFSP proposed a baseline survey of the entire UBC food system. The UBCFSP has been working for the past ten years to improve the UBC food system, and measure progress. Our team has worked closely with Sophia Baker-French, who is the Food System Coordinator, as well as Liska Richer, who works with Campus Sustainability and Victoria Wakefield, who is the purchasing manager for UBC Housing and Hospitality Services to develop and implement a survey. We also worked with UBC Food Services (UBCFS) and the AMS Food and Beverage Department (AMSFBD) to create our survey. A key component to creating this survey was using key indicators from the UBCFSP's "Vision for a Sustainable Food System" which was developed by UBCFSP project partners and previous Land and Food System (LFS) students (See Appendix A).

Connections can be made between global, national, regional, and local food systems so by looking at the knowledge, attitudes and behaviours of participants in the UBC food system we are able to make connections to communities outside of UBC. Food systems can experience an array of vulnerabilities due to insecure and unsustainable social, economic and environmental practices. The knowledge gained by this survey and the entire UBCFSP will help to spread awareness and educate consumers about their food systems. The food eaten by most North Americans has travelled from everywhere around the globe (Kloppenborg, Hendrickson and Stevenson, 1996). This literal distance from their food is also distance from their knowledge. Most North American consumers only have a vague idea about where, how, and by whom the food they purchase was produced

and handled (Kloppenburger *et. al.*, 1996). Advancements made in the field of agriculture have revolutionized food production, however this industrialization brings with it huge losses to biodiversity, water and soil contamination and depletion, climate change and more (McLaughlin and Mineau, 1995). Also, despite our ability to produce enormous amounts of food the world is still experiencing epidemics of malnutrition and famine. The gap between North America's overconsumption and many developing countries chronic hunger is growing. Through the UBCFSP the campus community is taking responsibility and making changes on the local level, with the hope that it will inspire changes in a broader context. As long as consumers remain ignorant about their food system, agribusinesses hold all the power. When consumers are unaware, they can't make positive changes (Kloppenburger *et. al.*, 1996). By increasing awareness about the global food system on a local level we hope to instill a sense of connection to the land and inspire individuals to make behavioural changes to increase the sustainability of their local food systems.

This survey will be used to obtain baseline data about the campus community's knowledge, opinions and actual behaviours in regards to sustainable food systems. By surveying a wide variety of consumers within the UBC food system we will be able to assess the environmental, economic and social sustainability practices of the campus community to determine where the campus food system is performing well and where it can still be improved upon.

This report begins by briefly explaining the background of the UBCFSP and identifying our problem statement and the importance of our research. Following this is our justifications on how our scenario relates to the UBCFSP Vision Statement. Included

in this section is a description on how individual members of this group's different value assumptions have influenced our perceptions of the scenario. Next is a walkthrough of our methodology for creating and distributing this survey, followed by a discussion of our findings. Lastly, along with our conclusion, we provide recommendations to key stakeholders, and future students who wish to continue with this project.

### **Value Assumptions and the UBCFSP Vision Statement**

Through our time here at UBC the Faculty of Land and Food System has helped to instill a sense of community with its students. Concepts of sustainability in all its forms (economic, social and environmental) have become deeply ingrained in our value systems through our academic coursework and community involvement. Outside of LFS most of us have encountered classes where we are expected to sit silently and be lectured, where we are offered very limited control over what and how we are expected to learn. Through LFS we are given the opportunity to interact with community based projects and case studies and use the tools we have acquired over the years to work towards solutions. Personal experiences dictate what values students hold and what each finds most relevant. By coming together in LFS and sharing our experiences we become privy to perspectives other than our own. Our project is enriched by the group's differences. Every cultural perspective, every academic discipline, every religion, every ethical position and every personal experience, provides a new way of looking at a problem. Each peels back a previously unseen layer and offers a better view of the solution.

As a group we come into this project with a range of different academic disciplines and cultural backgrounds, however we all agree on the importance of the UBCFSP's Vision Statement. Each of the principles in the Vision Statement is working

towards preserving and enhancing both human and ecosystem health, which is something that all of us believe to be incredibly important. Our task of developing a survey for the UBC food system is consistent with the principles of the UBCFSP Vision Statement and works especially well with number 6, “Fosters awareness, understanding, and personal responsibility within the community of every component from production to disposal.” Our survey will allow us to give an overview of how members of our campus community are participating in many components of the system.

### **Methodology**

For our project we decided to use convenience sampling for our survey. Convenience sampling is when participants are selected at the convenient accessibility to the researcher (Yu & Cooper, 1983). We classified our sampling as convenience sampling through group discussion and with the help of Sophia Baker-French. We targeted places such as the SUB, the UBC Bookstore, Koerner Library, Irving K. Barber Learning Centre and Woodward Library, as well as UBC Residences, which include Walter H. Gage, Place Vanier, Totem Park and Marine Drive as they are subject to a lot of campus traffic. By targeting places that were convenient for our research as opposed to surveying through a random method, we allowed potential bias into our sample. A downside to convenience sampling, because it is a non-random sample, is that there is a limited attempt to ensure accurate representation of population. Therefore it is possible that by only surveying our targeted places, biases could potentially arise.

We had two different ways in which our survey could be completed. We had both hard copy versions (See Appendix B) as well as an online version, which we emailed out the link to (See Appendix B). We decided to carry out both hard copy versions and web

based versions for multiple reasons, which will be mentioned a little further into the methods. For the web-based version, we were instructed to use the Enterprise Feedback Management (EFM) program to construct and analyze our survey. We also included a Quick Response (QR) code and poster with tabs that contained the link to the online survey, which could be torn off to help advertise our survey. A QR code is a type of bar code, which can be scanned by devices such as iPhones, Androids and Blackberry's or other devices such as iPods and iPads. Once our QR code was scanned, it would lead directly to our web survey or directly to our link to the web survey depending on what kind of device was used or what kind of application was used. In addition, the poster had tabs with the link to our survey that can be torn off (See Appendix B). We used the website "TinyURL" to compress the original web link of our survey since it was too long. We did this because we felt that typing in a long web link into the URL would discourage participants from partaking in our survey.

Our target population included faculty members, students, staff members and others. We felt that the faculty members, students and staff members made up most of the UBC campus. We included an others section to include people who didn't fall within the first three categories. People within the others category could include construction workers, alumni and/or even visitors to UBC. If they purchase and consume food on UBC then they still participate in the UBC food system. Therefore we felt it was important to include a section for others in our survey. A limitation to our target population is that there was no guarantee that all of them would be reached. Our ideal was to make our survey known to everyone in our target population; however, this was



simply not possible, as we did not have access to the email addresses of everyone on campus.

We targeted residential areas such as Totem, Vanier, Gage and Marine Drive as individuals who live on campus are huge contributors to the UBC food system. We also targeted libraries, which include Koerner, Irving and Woodward as they are central locals for students to study. Additionally, we targeted the SUB, classrooms, social networks, and the UBC Bookstore. Specifically for the distribution and advertisement of our web-based surveys, we distributed to the UBC Residences through the UBC Residence Facebook page. A limitation here is that originally we thought we were able to get the RA's of the residences to email everyone else who lived within their residences. However, there were privacy issues we came across and thus we were not able to target each one of them individually. We also distributed and advertised our web survey to all our classes through our Vista accounts. A downside to this is that we were only limited to sending our survey to our classes. Most of our classes were LFS based and thus biases could be introduced once again. In addition we advertised our survey through personal social networking, which included all our Facebook pages and encouraged friends to share the link on their Facebook pages (See Appendix B). A limitation here is that there was a potential for someone who didn't participate in the UBC food system to partake in our survey, which would affect our results. We targeted other participants in UBC by advertising our survey through UBC Blogs such as the LFSUS Blog as well advertising to UBC faculty pages. For our hard copy surveys, we targeted the UBC Bookstore, the SUB, classrooms, Irving, Koerner and Woodward library, study areas and the UBC Residence Commons Block in an attempt to avoid the bias of Faculty buildings.

Specifically in the SUB, we attempted to survey during peak hours and busy days. Peak hours included hours around 12pm when everyone would go for lunch. As well we attempted to survey during Tuesdays and Wednesdays, which were the days where most traffic goes through the SUB according to Liska Richer. With the distribution of the QR code and Posters we targeted the UBC Residences, the UBC Bookstore, Koerner and Irving library, the SRC (Student Recreation Centre), Brock Hall, the SUB bulletin boards and face-to-face invitation.

We decided to use web-based surveys because of its high efficiency in the sense that we can send the survey out to a large number of people in a matter of seconds. In addition, web based surveys are very easy to analyze in comparison to hard copy surveys, as the EFM program we used compiled all the data for us. It is also low cost, both economically and environmentally, in the sense that we do not have to print out a large number of paper copy surveys. The downside to our web-based survey is that there is very low interaction meaning that we are not present to be able to answer questions that participants may have or clarify any awkwardly worded questions. Another downside is that basic computer skills are required for participants to fill out our survey. Finally, web based surveys are easily disregarded and can be deleted easily by participants.

We also included hard copy surveys so that we can be present if they had any questions and thus have more interaction with participants and we also felt that there would be a lower refusal rate for the hardcopy surveys when asked directly as opposed to by email. Compared to easily disregarding an email people are less likely to refuse a personal invitation to participate in a survey. Some downsides to our hard copy survey is that approaching individuals and asking if they would like to participate in our survey is

very time consuming. Also, we can only target a small population at a given time. With hard copies, it is also very tedious to analyze the data. Having to look through all the hard copies individually and analyze the data is also time consuming. Finally, costs were higher because we needed to print out a lot of hard copy surveys.

We also used QR codes and posters with tabs that can be torn off containing a web link to our survey. We found the QR codes to be attractive and convenient. People walking by with devices such as smart phones could easily scan our code and participate in our survey. With that being said, the code would lead them directly to our web based survey and thus the results would be easy to analyze. We also felt that the tear off tabs were convenient because if they did not have a device that would be able to scan the bar code or if they did not have enough time to scan the bar code, they could tear off the tab and fill in the survey later. Again, this would lead to the web based survey and thus data would be easy to analyze. A downside to the QR code is that not everyone has a device that is able to scan the code, although hopefully the rip off tab helped to mediate this limitation. In addition, our poster could easily be bypassed since it was letter-sized paper. With that being said, another downside is that other posters could easily cover our poster. Finally, our QR code and poster could also be taken down.

In order to attract people to participate in our survey, we decided to include some incentives. We advertised that by participating in our survey, the participant would be entered in a draw with a chance to win a gift card to the UBC Bookstore. All they would have to do is fill in their name and include their email address and phone number to be included in the draw with a chance to win.

In total we had sampled 413 individuals on the UBC campus. We had launched our survey on the afternoon of Friday March 16, 2012. We had officially ceased access to participate in the survey on the evening of March 31, 2012. Therefore we had the survey up and running for about two weeks before we had analyzed the data. In total with respect to both hard copy and web-based surveys, after the quarter mark of the two weeks, we had roughly 90 surveys completed. After two weeks we had roughly 210 surveys completed. After the three quarter mark of the two-week period we had roughly 300 surveys done. By the end of the two-week period we had completed a total of 413 surveys. Therefore the response rate totaled to about 100 participants biweekly for the two weeks we had the survey running. The aim of our survey was to target 1000 individuals on campus. Another limitation we came across which affected our number of response was the two week period in which we conducted our survey. If the survey was accessible for more than two weeks, there potentially could have been more respondents.

## **Findings**

Surveys were handed out to a combined total of 413 participants. 117 of these were surveyed via hard copy surveys, while the remaining 296 were captured using our online survey. Questions were grouped into 10 categories and shall be presented as such here. See Appendix C for graphical representation.

“Food purchasing” was our first category, and it contained two questions. Question 1, “Do you purchase food items for immediate consumption on the UBC Campus?” 397 of the participants answered “Yes”, while 15 answered “No”. Question 2 asked, “How often do you purchase food on campus?” 10 answered “Almost never”, 20

answered “At least once a semester”, 63 answered “At least once a month”, a majority of 202 answered “At least once a week”, and finally 96 answered “At least once a day”

“Location of food purchase” contained 3 questions. Question 3 of our survey asked the participants “When purchasing food or drink for immediate consumption on the UBC campus, which food establishments do you purchase foods from most often? (Select your top 2)” The list contained 23 food outlet examples. 311 answered “UBC Sub (not including Pacific Spirit Place)”, 138 answered “Tim Hortons”, 131 answered “Starbucks”, 81 answered “Pacific Spirit Place”, 72 answered “Ike’s Café”, 9 answered “Café Perugia”, 1 answered “Café Moa”, 14 answered “IRC Snack bar”, 1 answered “Law Café at Allard Hall”, 24 answered “The Loop Café at CIRS”, 2 answered “Neville’s”, 12 answered “Niche Café”, 3 answered Pond Café, 13 answered Reboot Café, 8 answered “Sauder Exchange Café, 13 answered “Stir it Up”, 24 answered Triple O’s, 2 answered “Trek Express”, 1 answered “Sage Bistro” 15 answered “The Point Grill” 16 answered Totem Park” 50 answered “UBC Village Food Outlets” and 24 answered “Vanier’s.” Our next two questions focused on reasoning for choice of food establishments. Question 4 asked, “What is your most important consideration when selecting the food establishment you just indicated?” 141 answered, “Price”, 127 answered “Location”, 9 answered “Speed of Service”, 43 answered “Nutrition”, 64 answered, “Taste”, and 14 answered “Other”. Question 5 asked, “What is your second most important consideration when selecting the food establishments you just indicated?” 98 answered “Location”, 125 answered, “Price”, 44 answered “Speed of Service”, 62 answered “Nutrition” 68 answered “Taste” and 3 answered Other”

“Packaging and reusable containers” had 9 questions. Question 6 asked, “Have you ever brought your own coffee mug instead of using a disposable paper cup when purchasing drinks on campus?” A majority of 204 answered, “Yes”, 156 participants answered “No”, and lastly 39 participants responded with “I do not purchase drinks on campus.” Question 7 asked, “How often do you bring your own coffee mug when purchasing drinks on campus?” 22 participants answered “Almost never”, 25 participants answered “At least one a semester”, 53 participants answered “At least once a month”, 55 of participants answered “At least once a week” and finally 50 participants answered “At least once a day”. Question 8 asked, “Have you ever brought your own container instead of using a disposable take-away container when purchasing food on campus?” 117 of participants answered, “Yes”, while a majority 281 participants answered “No”. Question 9 asked “How often do you bring your own container for food when purchasing food on campus?” 33 of participants answered “Almost never”, 22 of participants answered “At least once a semester”, 23 of participants answered “At least once a month”, 35 of participants answered “At least once a week” and lastly 5 participants responded with “At least once a day. Question 10 asked “Do any campus food businesses offer discounts for bringing your own coffee mug on campus?” A majority of 284 participants answered “Yes” while 99 participants answered “No”. Question 11 asked “Do any businesses offer discounts for bringing your food container on campus?” 160 of responses were “Yes” while the remaining 214 were “No”. Question 12 asked, “Do you bring your own mug or containers to get discount?” 66 of responses were “Yes” while a majority 125 of responses was “No”. Question 13 asked, “Have you ever heard of the Eco-to-go program?” 100 of responses answered “Yes” while a majority 283 responses answered

“No”. Question 14 asked, “Are you a member of the Eco-to-go program?” Only 19 of responses were “Yes” while 93 of responses were “No”.

In the next category of “Dietary choices and menu items”, 11 questions were asked. Question 15 of our survey asked “Do you know what a vegetarian diet is?” 374 of responses were “Yes”, while 24 were “No”. Question 16 asked, “Are you a vegetarian?” 32 of responses were “Yes”, while 345 answered “No”. Question 17 asked, “Do you purchase vegetarian foods when available?” 71 of responses were “Yes, almost always”, 119 of responses were “No, almost never”, while 118 of responses were “Sometimes”. Question 18 asked “Do you know what a vegan diet is?” 348 of responses were “Yes”, while 50 responses were “No”. Question 19 asked, “Are you vegan?” Only 8 responses were “Yes”, while 340 responses were “No”. Question 20 asked, “Do you purchase vegan foods when available?” 16 of responses were “Yes, almost always”, 203 responses were “No, almost never” and 131 responses were “Sometimes”. Question 21 asked, “Why do you choose vegan and/or vegetarian menu options? 48 of responses were “Ethical/Animal welfare reasons, 39 of responses were for “Environmental reasons”, 117 responses were for “Personal Health Reasons”, 77 of responses were for “Taste preference” and 76 of responses were for “Other reasons not mentioned here”. Question 22 asked, “Do you know what organic food is?” 388 of response answered “Yes”, while 11 answered “No”. Question 23 asked “Are you aware of any organic food or drink items on campus?” 249 of responses answered “Yes” while 142 of responses were “No”. Question 24 asked, “Have you ever purchased organic foods on campus?” 249 of responses were “Yes” while 142 responses were “No”. Question 25 asked, “How often do you buy organic food or drink on campus?” A majority of 218 answered “Almost

never”. 43 responses were “At least once a semester”, 69 responses were “At least once a month”, 50 responses were “At least once a week”, and 6 responses were “At least once a day”.

For the “Waste” section of the survey, 15 questions were asked. Question 26 of our survey asked, “How often do you use disposable products such as plastic or paper plates and cups?” 40 of responses were “Almost never”, 33 of responses were “At least once a semester”, 80 of responses were “At least once a month”, 178 of responses were “At least once a week” and 66 of responses were “At least once a day”. Question 27 asked, “Do you know what recycling is?” A majority of 395 answered “Yes” while 2 answered “No”. Question 28 asked “Are you aware of any recycling bins that are located on campus?” A majority of 392 answered “Yes” while 7 answered “No”. Question 29 asked, “Do you use recycling bins on the UBC Campus?” A majority 381 answered “Yes” while 16 answered “No”. Question 30 asked “Do you find it convenient to recycle on the UBC Campus?” A majority 309 answered “Yes” while 73 answered “No”. Question 31 asked, “How often do you recycle plastic forks, spoons, or knives on the UBC Campus?” A majority 120 answered “Almost never”, 36 answered “At least once a semester”, 60 answered “At least once a month”, 108 answered “At least once a week”, and 56 answered “At least once a day”. Question 32 asked, “When you do not recycle plastic forks, spoons and knives, why not?” 161 answered, “They are not recyclable”, 159 answered I do not know where to recycle them”, 130 answered, “It is not convenient to recycle them” and 15 answered, “Recycling is not that important to me”. Question 33 asked, “How often do you recycle products, such as sushi containers, on the UBC Campus?” 177 answered “Almost never”, 41 answered “At least once a semester”, 64



answered “At least once a month”, 76 answered “At least once a week” and 35 answered “At least once a day”. Question 34 asked, “Do you know what composting is?” A majority 378 answered “Yes” while 21 answered “No”. Question 35 asked “Are you aware of any compost bins located on the UBC Campus?” A majority 294 answered “Yes”, while 83 answered “No”. Question 36 asked, “Do you use compost bins on the UBC Campus?” 247 answered “Yes” while 60 answered “No”. Question 37 asked “Do you find it convenient to compost on the UBC Campus?” 162 answered “Yes” while 99 answered “No”. Question 38 asked, “When you do not compost, why you not compost on campus do?” 92 answered, “I do not know where to put compostable items”, 96 answered “I’m not sure what items can be compostable”. 159 answered, “It is not compostable” and 10 answered, “Composting is not that important to me”. Question 39 asked, “Which of the following items can be placed in the green compost bins found on the UBC Campus?” 140 answered “Chopsticks”, 130 answered “Coffee Stir sticks”, 202 answered “Paper bag”, 242 answered “Napkins”, 195 answered “Bones from Meat products”, 238 answered “Teabags”, 23 answered “To Go Cups”, 7 answered “Metal flatware (forks, knives, spoons), and 106 answered “To Go hot beverage cups”. Question 40 asked “Please indicate if the following statement is true or false: it does not matter which bin (garbage, recycling or compost) I put an item in because all the bins will be sorted anyway.” 19 answered “Yes” while 374 answered “No”.

“Campus events” contained 7 questions. Question 41 asked “Are you aware of food-related events such as Meet Your Maker, the Blueberry Festival, the Apple Festival, FarmAde or other similar event on campus?” 219 answered “Yes” while 180 answered “No”. Question 42 asked, “Have you ever attended or participated in one of these events?”

113 answered “Yes”, while 280 answered “No”. Question 43 asked, “How did you hear about these events?” A majority 140 answered “Through friends”, 77 answered “In class”, 68 answered “Bulletin board”, 122 answered “Emails from UBC”, 34 answered UBC Events website”, 14 answered “AMS website”, and 68 answered “Other”. Question 44 asked “Have you ever purchased food from the UBC Farm?” 95 answered “Yes”, while 299 answered “No”. Question 45 asked “How often do you purchase food from the UBC Farm?” 8 answered “Once a week”, 19 answered “1-3 times a month”, 65 answered “A few times a year (less than once a month)”, 271 answered “Never” and 29 answered, “I don’t know”. Question 46 asked “Are you aware of the Saturday morning Markets at the UBC Farm?” 151 answered “Yes”, while 244 answered “No”. Question 47 asked “Are you aware of the UBC Farm market on Wednesdays at 12 pm by the bookstore?” 169 answered “Yes”, while 228 answered “No”.

“Information Availability” contained 2 questions. Question 48 asked “Are you interested in having more information about the food you purchase on campus?” 232 answered “Yes”, while 165 answered “No”. Question 49 asked, “What type of information are you interested in?” 203 answered “Nutrition”, 171 answered “Location of where product was grown or produced (food miles, food origin)”, 151 answered “Where product was prepared (i.e., campus made)”, 159 answered “Organic”, 69 answered “Cultural Information (Kosher, Halal, etc.)”, 137 answered “Fair-Trade”, 66 answered “Vegan”, and 83 answered “Vegetarian” and 13 answered “Other”

“Sustainable food products” includes 4 questions. Question 50 asked, “How often do you purchase Fair Trade products on campus?” 124 answered “Almost never”, 29 answered “At least once a semester”, 46 answered “At least once a month”, 48 answered

“At least once week”, 14 answered “At least once a day” and 130 answered “I do not know”. Question 51 asked, “How often do you purchase certified organic food on campus?” 141 answered “Almost never”, 35 answered “At least once a semester”, 44 answered “At least once a month”, 47 answered “At least once week”, 9 answered “At least once a day” and 118 answered “I do not know”. Question 52 asked, “How often do you purchase locally produced food on campus?” 103 answered “Almost never”, 36 answered “At least once a semester”, 49 answered “At least once a month”, 38 answered “At least once week”, 13 answered “At least once a day” and 153 answered “I do not know”. Question 53 asked “Would you be more likely to purchase food from an outlet that uses produce from UBC Farm” 261 answered “Yes”, and 125 answered “No”.

“Information sharing” contained 4 questions. Question 54 asked, “Are you interested in knowing more about the foods you purchase on the UBC campus?” 250 answered “Yes”, while 143 answered “No”. Question 55 asked, “What would be the best way to learn more about the food you purchase at UBC?” 177 answered “Brochure, table tent, or display located where you purchase or eat your food”, 82 answered “Newspaper (i.e. Ubyssy)”, 78 answered “Campus event or presentation”, 95 answered “Classroom lecture/guest speaker”, 188 answered “Product labels”, 10 answered “Study groups”, 42 answered “Talking to seller/farmer”, 50 answered “Tour of farms”, 188 answered “Web pages/the internet (UBCFSP blog, Food provider websites, QR codes)” and 12 answered “Other”. Question 56 asked, “Have you ever heard of the UBC Food Systems Project before?” 106 answered “Yes”, while 284 answered “No”. Question 57 asked ‘How did you hear about the UBC Food Systems Project?’ 15 answered “UBC SEEDS Program”, 57 answered, “Land, Food, and community III course (LFS 450)”, 8 answered “Online

Blog”, 13 answered “UBC Farm/LFS Orchard Garden”, 8 answered “Presentations”, and 26 answered “Other”.

“Demographics” contained 3 questions. Question 58 asked “Whom do you represent in the UBC Food System?” 350 answered “Student”, 29 answered “UBC Staff”, 8 answered “UBC Faculty Staff”, and 4 answered “Other”. Question 59 asked, “Which faculty do you represent?” This was a write in question in which the participants wrote their own answer. Most popular answers were 124 from Land and Food Systems faculty, 71 from the Faculty of Science, and 59 from the Faculty of Arts. Lastly, question 60 asked, “Do you live on Campus?” 86 answered “Yes”, and 307 answered “No”.

## **Discussion**

### **Food Purchasing & Location of Food Purchasing**

Unsurprisingly almost 100% of the people who chose to participate in our survey have purchased food within the UBC food system. The majority of respondents said they purchased food or drinks at least once a week or once a day. It is safe to say that the UBC food system plays an important role in the community at UBC. Also unsurprisingly the top two reasons for consumers were location and price. Students are often on extreme budgets with the cost of higher education so cheap food is always a high priority and busy days running all around campus for classes make location almost equally as important. Knowing these two things it is important that we make sure sustainable food choices are offered at reasonable prices, and are widely distributed across campus.

### **Packaging and Reusable Containers**

Eco-to-Go is a program where consumers can exchange a membership card for a temporary food container (UBC Food Services, N/A). Once a member is done with the

container, they need only drop the dirty container off at a food outlet to get their card back (UBC Food Services, N/A). Membership is only \$5 plus tax with no expiry date or annual renewal, however there is a replacement fee for a lost or damaged card (UBC Food Services, N/A). This program is available at Totem and Vanier's Dining Rooms, and all participating UBC Food Services locations (UBC Food Services, N/A). It is a great food sustainable initiative for anyone who lives, works, or eats on campus. However, with only 24% of participants knowing about Eco-to-Go, we cannot properly assess the impact it has on the UBC food system. We also found that only 5% of our participants were members of this program, therefore the program is not as effective as it could be. With increased awareness we will hopefully be better able to assess the effectiveness of the program.

### **Dietary Choices and Menu Items**

Most participants stated they knew what vegetarian and vegan diets meant however most also said they were not vegetarian or vegan. However, the lack of practicing vegetarians and vegans did not prevent people's preference for wanting vegetarian choices. The top reasons for individuals choosing vegetarian meal options were for personal health reasons and taste preference.

Most of our participants knew what organic foods were, however, not everyone is willing to purchase it. As price is the second most important food factor in UBC's food system, it may be the reason for lower consumption of organic foods. As participants prefer to purchase vegetarian or vegan food alternatives because of personal health reasons, it can probably be said that participants would also like to purchase organic for those same reasons. However, the price of foods is more important than the health

benefits of organic foods.

## **Waste**

From our results we noticed that the majority of the participants know what recycling is and recycle when they can. However, our data shows that not every participant recycles even though they know what recycling is. This puts into question why there are some participants not recycling. Our follow-up question identifies that the top two reasons are that participants do not know which items can be recycled and that they sometimes can't find a recycling bin. However, UBC does attempt to educate the UBC food community by providing information labels on recycling bins and attempts to provide many recycling bins across campus to promote recycling. However the gap that we have found between knowledge and practices leads us to believe that there is still room for improvement.

Like recycling, composting differs in the number of participants who know what composting is to the number of participants who compost. However with composting, less people said they knew what composting was, and less people said they composted. With this, we can identify that there needs to be more improvement in educating people in the UBC food system on what composting is. Participants had trouble identifying which items were compostable at the UBC food system. The UBC food system has labels identifying some products that are recyclable, however, better labels may be required based on the results of the uncertainty of which items can be composted. Like recycling the top two reasons why participants did not compost were the lack of knowledge of what was compostable, and the convenience of finding a compost bin.

## **Campus Events**

Less than half the participants were aware of food-related events around campus. Many have never attended any of these events, nor have they purchased food from the UBC farm or know of the farm's produce market events in front of the UBC Bookstore. This lack of awareness indicates that UBC food-campus related events are not being advertised well enough.

### **Information Availability**

From the results we can see that participants are interested in knowing more about the UBC food system. More than half of the students want to know more information on the food product itself. In terms of obtaining more knowledge about foods on campus in general, more than half of our participants also want to learn more. With the most popular method of learning about food knowledge on campus being online sources. We are uncertain why more participants did not know information about foods when their preferred source to find this information is currently available.

### **Sustainable Food Products**

For many sustainable food products, the majority of participants stated they "almost never" purchased sustainable foods products, or "did not know" whether they were buying sustainable food products. From what participants previously said about information availability, there is interest in knowing about local, organic and fair trade food products. Therefore food outlets should emphasize sustainable food options and provide signs so consumers are aware of what they are purchasing.

### **Information Sharing**

Participants provided three main methods for which they prefer to find out more information about the UBC food system. Brochures and information tables, food product

labels, and internet webpages. Though these are the top three choices, some of these methods are already currently being used. Websites and QR codes are currently being used on campus to offer coupons and deals near food outlets, and on the UBC website but they should also be utilized as a way to spread awareness about the food system.

### **Demographics**

There were biases in the demographics of our survey. Our participants were mainly students and although the UBC food system consists of many other people, such as staff, teachers, and visitors, they did not have high representation in our survey. For students and faculty we also asked what faculty/department they represented, however, not every participant answered this question. As discussed in methods, participants were collected through Vista class mail and social networks, which created a bias towards certain faculties. We were not able to massively distribute the survey link through UBC, and had to search up and individually post our survey link to faculty blogs. However, not every faculty allowed non-members to post.

We encountered a lot of skipped responses while looking through our surveys, which we assume is due to the length of the survey. These skipped questions could have had an effect on our results. As the project improves over the years and more data is collected, we will be able to gain a better understanding of the UBC food system.

### **Recommendations**

- By 2022, we will have no cross contamination of the garbage/composting/recycling by having explicit labels and signage and increasing the number of recycling and compost bins. For UBC Waste Management.
- By 2017, we will have increased knowledge with respect to organic food, local food, and fair-trade food by explicitly labeling where food is grown, and how it is



grown and prepared. For UBCFS and AMSFBD.

- By 2017, we will have increased the attendance of food-related campus events through advertisement in lecture rooms, brochures, guest speakers, posters, and emails from UBC and web pages/blogs on the internet. For UBC and Campus Sustainability.
- By 2017, we will have increased the behaviour with respect to bring reusable containers on the campus through advertisement of food outlet discounts and Eco-to-go program. For UBC and Campus Sustainability.
- By 2020, we will have increased the use of produce from UBC Farm, as students would more likely to purchase food from food outlets that utilize local farmer's products. For UBC Farm, UBCFS and AMSFBD.

### **Scenario Evaluation**

We thought that this project was important to the UBCFSP as a whole. After working with the UBC food system for so long, it is important to step back and look at the system as a whole in order to see where changes are still needed most. We spent a lot of time making sure that our community partners were able to comment on our survey for every draft. However, we encountered some confusion with the community partners, as each gave slightly conflicting instructions. For a while we were told to focus only on actual behaviours and practices within the food system, however a few versions into the survey draft that changed and we had to factor in knowledge and attitudes.

We were initially disappointed by only reaching 413 participants when our goal was for 1000 responses, but we do feel that this was a decent sample size given the short time we had the survey live (two weeks). Hopefully working off of our survey and giving themselves more time, next years survey group will be able to reach the 1000 participant objective.

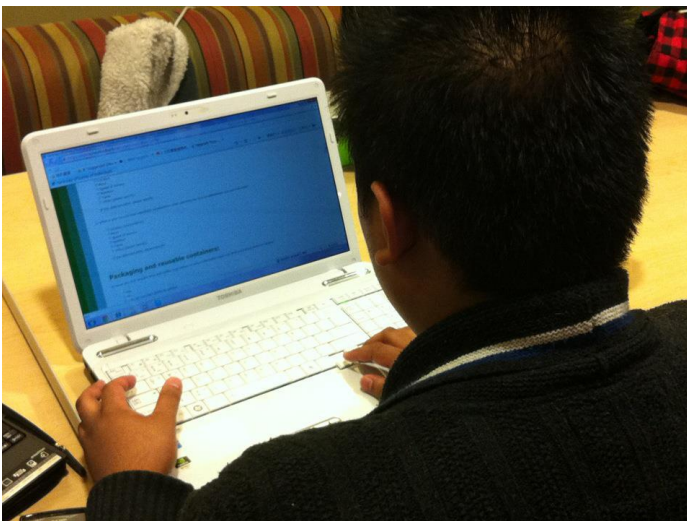
- We recommend that that next years survey group set up an advertised booth in the SUB or the UBC Bookstore where they can gather survey participants. If they spend a few hours at the booth, a few times a week they should be able to garner a lot of responses.
  - The busiest days for the SUB are Tuesdays and Wednesdays around 12:00pm
- The survey should be shortened to encourage participation and either made more specific or split into multiple surveys, each asking about one component of the food system.
- Next years group should try to get the survey live earlier so that they have more time to collect data and analyze their results.

## Media Release

### UBC Food System Project

April 2012

#### Project Title: **Baseline Survey of Behaviours and Attitudes of UBC Food System Community Members**



*Quote: "If consumers are unaware of the problem how can that work to fix it. Help the UBC food system function in a sustainable way by participating and filling out our survey!"*

#### Description:

As part of the University of British Columbia's Food Systems Project we created and implemented a general survey for the entire UBC campus community to determine knowledge, attitudes and practices of people who participate in the UBC food system. With this survey we will be able to assess areas of the food system that are currently

working well, along with areas that can still be improved upon. For our methods we used convenience sampling to target participants for our survey. Participants engaged in either web based surveys or hard copy surveys to measure their attitudes, behaviour and knowledge about the UBC food system. 413 individuals participated in our survey with 117 filling out hard copy surveys and 296 doing web-based surveys. We found that there was a lot of opportunity to increase knowledge about food sustainability on campus as well as a definite need to improve student's actual practices within the UBC food system. But there is interest and demand for this information.

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- Baker-French, S. (2009). *The UBC Food Systems Project -UBCFSP- Summary Report 2009*. Retrieved on April 6, 12 from <http://blogs.landfood.ubc.ca/foodsystemproject/files/2010/08/UBCFSP-SummaryReport20091.pdf>
- Kloppenburger, J.J., Hendrickson, J., and Stevenson, G.W. (1996). "Coming in to the Foodshed." *Agriculture and Human Values*, 13, 33-42.
- McLaughlin, A. and Mineau, P. (1995). "The Impact of Agricultural Practices on Biodiversity." *Agriculture, Ecosystems & Environment*, 55, 201-212.
- UBC Food Services. (N/A). Eco - To Go: Container Exchange Program. Retrieved April 8, 2012, from UBC Food Services: <http://www.food.ubc.ca/sustainability/eco-to-go>
- Yu, J., & Cooper, H. (1983). "A Quantitative Review of Research Design Effects on Response Rates to Questionnaires." *Journal of Marketing Research*, 20(1), 36-44.

## Appendices

### **Appendix A: Vision Statement for a Sustainable UBC Food System**

1. Must protect and enhance the diversity and the integrity of the natural ecosystem and resources that supports it.
2. Relies on local inputs when possible, where inputs and waste are recycled and/or composted locally.
3. Is a secure system that provides food that is affordable; available; accessible; culturally, ethically, and nutritionally appropriate and safe; and can adapt to changes.
4. Nourishes the present generation to provide for healthy diets that do not compromise the food security of present or future generations.
5. Nurtures feelings of community and promotes enjoyment of food around the food table.
6. Fosters awareness, understanding, and personal responsibility within the community of every component from production to disposal.
7. Contains a balance of imported and local foods that come from socially and ecologically conscious producers to ensure long-term financial viability.

8. Consumers, food workers, and educators are made aware of the reciprocal impacts that the UBC food system has on surrounding food systems.

### Appendix B:

Sample Survey-See attached Word Document

### Sample QR Response Poster



### EFM Survey Tools

Account:  
Password:

### Gmail

Account:  
Password:

### Example of Email and Facebook Advertisement



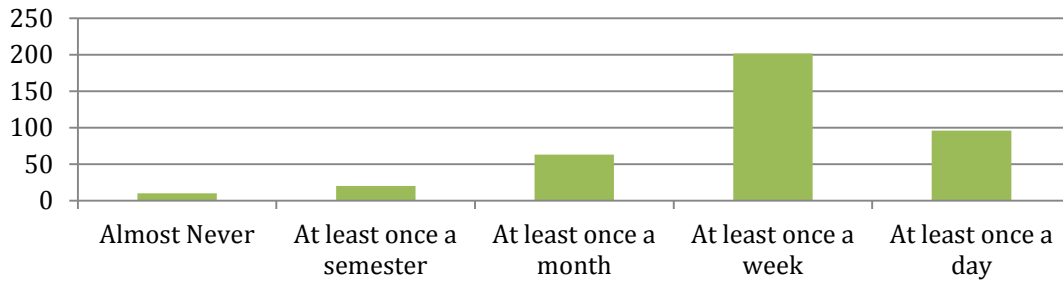
## Appendix C: Results

See attached Excel Spreadsheets for raw data

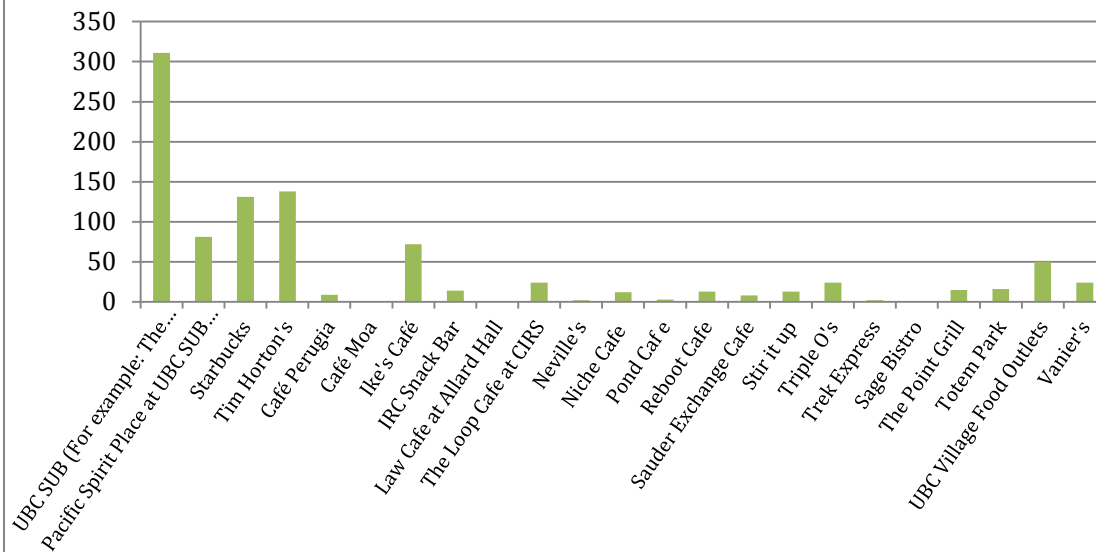
### 1. Do you purchase food items for immediate consumption on Campus?



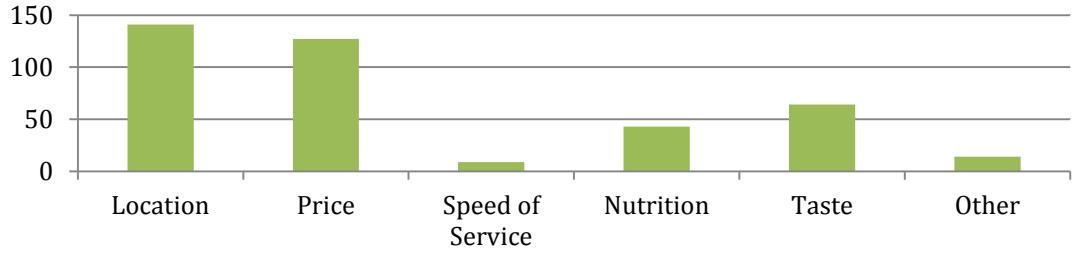
### 2. How Often do you purchase food on campus?



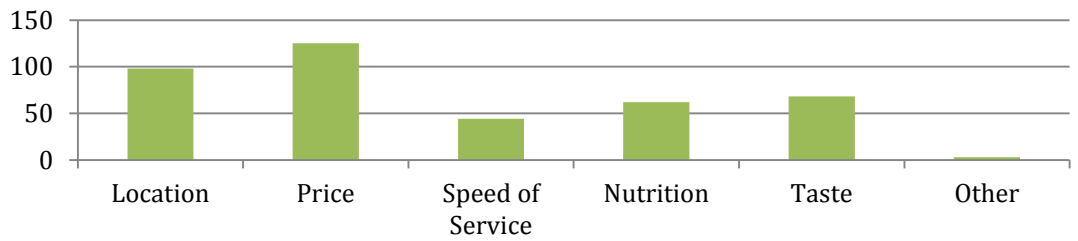
### 3. When purchasing food or drink for immediate consumption on the UBC Campus, which food establishments do you purchase foods from most often?



**4. What is your most important consideration when selecting the food establishments you just indicated?**



**5. What is your second most important consideration when selecting the food establishments you just indicated?**

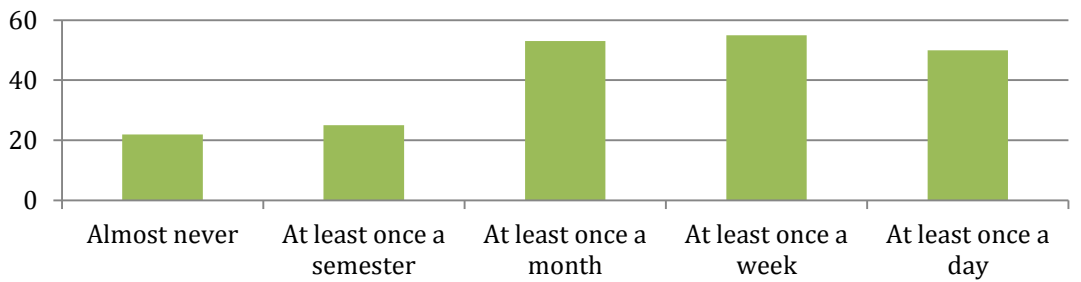


**6. Have you ever brought your own coffee mug instead of using a disposable paper cup when purchasing drinks on campus?**



- Yes
- No
- I do not purchase drinks on campus

**7. How often do you bring your own coffee mug when purchasing drinks on campus?**

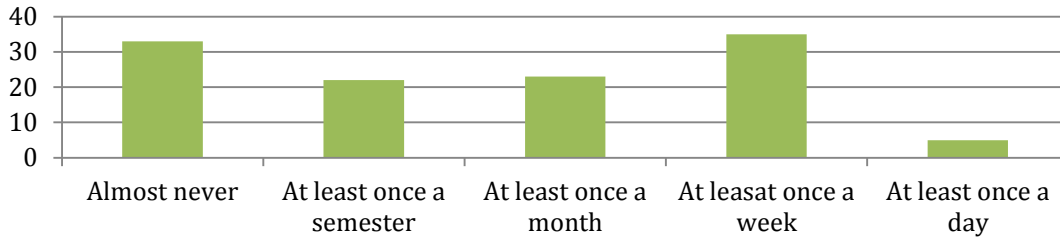


**8. Have you ever brought your own container instead of using a disposable take-away container when purchasing food on campus?**

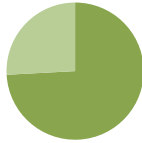


■ Yes  
■ No

**9. How often do you bring your own container for food when purchasing food on campus?**

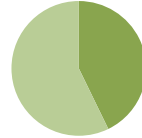


**10. Do any campus food businesses offer discounts for bringing your own coffee mug on campus?**



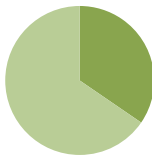
■ Yes  
■ No

**11. Do any businesses offer discounts for bringing your food container on campus?**



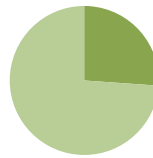
■ Yes  
■ No

**12. Do you bring your own mug or containers to get discount?**



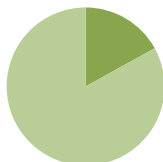
■ Yes  
■ No

**13. Have you ever heard of the Eco-to-go program?**



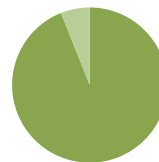
■ Yes  
■ No

**14. Are you a member of the Eco-to-go program?**

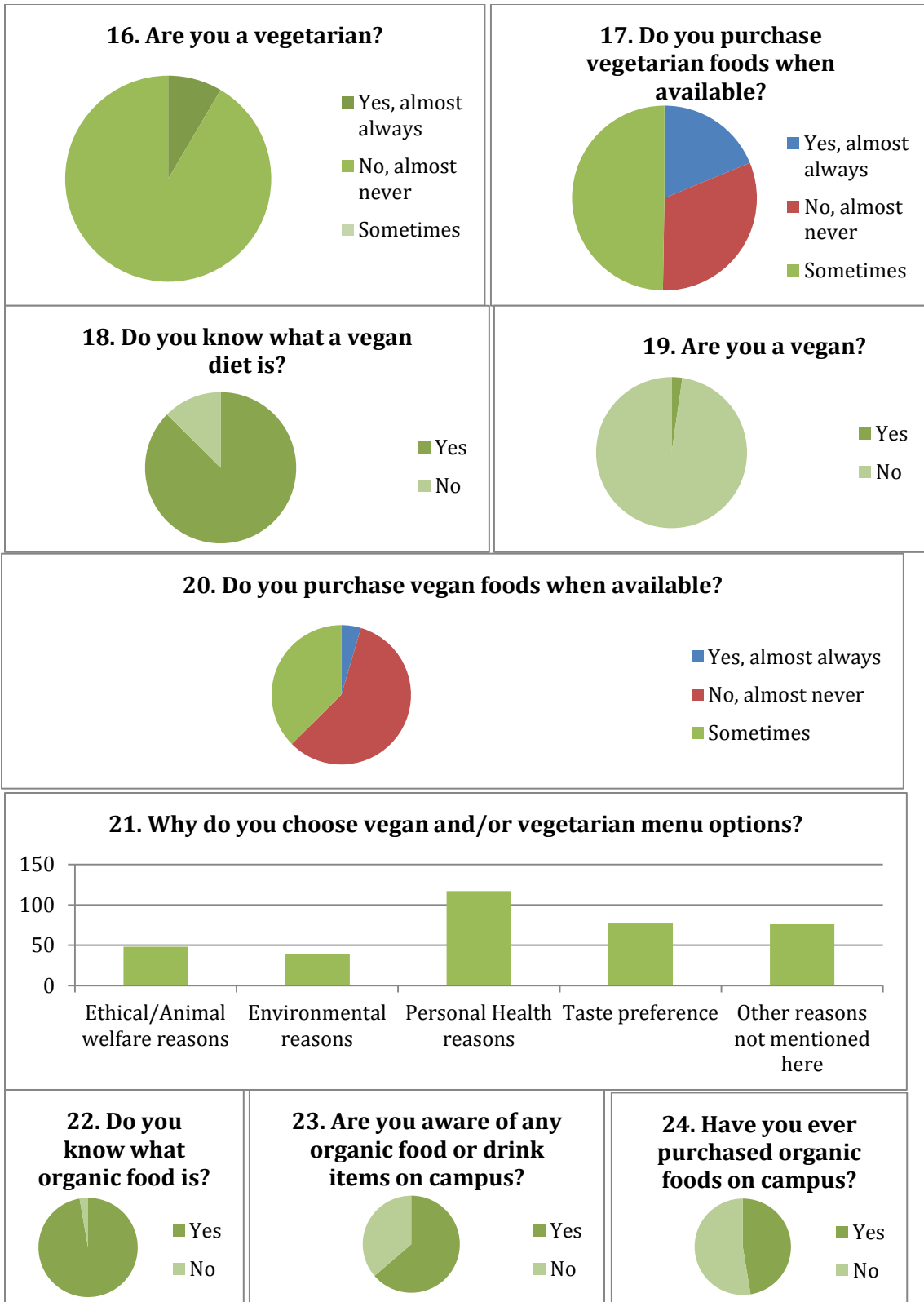


■ Yes  
■ No

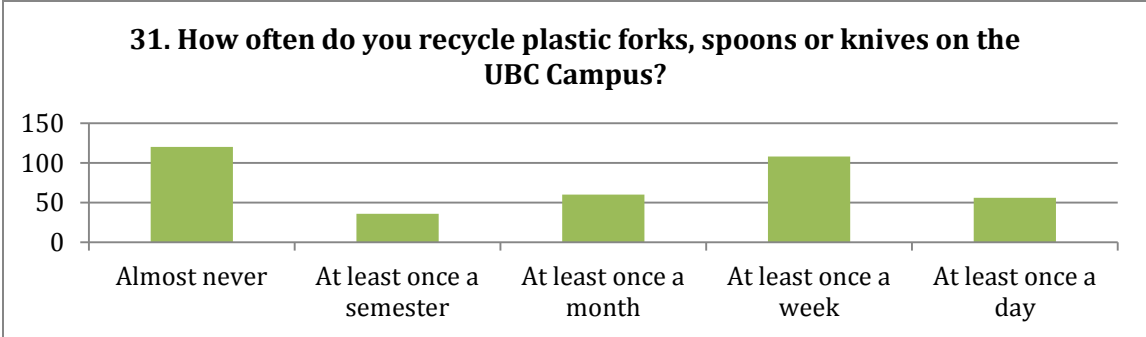
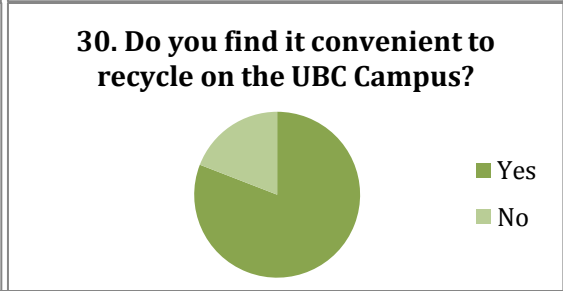
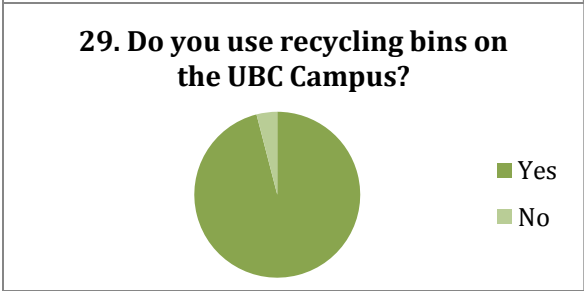
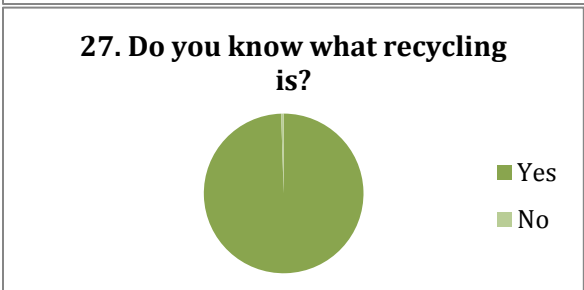
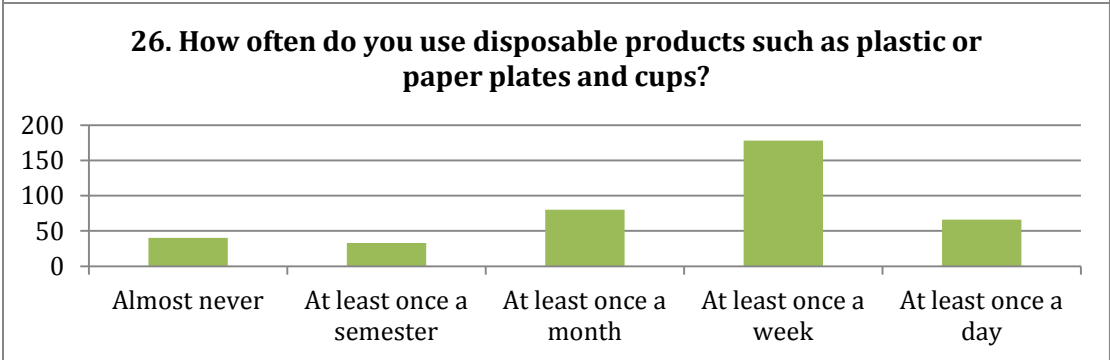
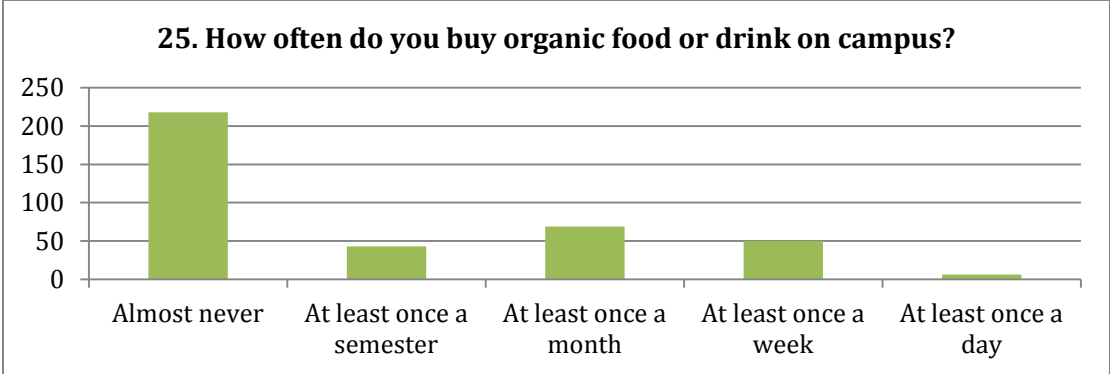
**15. Do you know what a vegetarian diet is?**



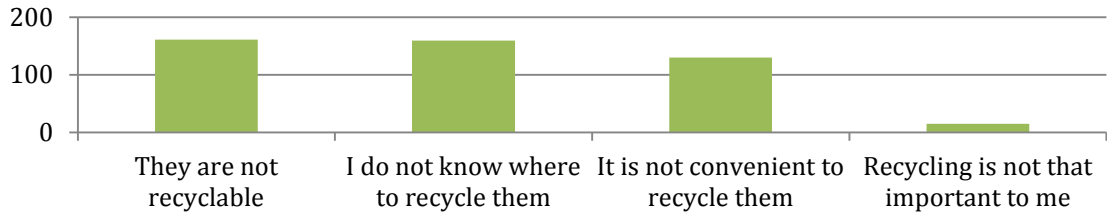
■ Yes  
■ No



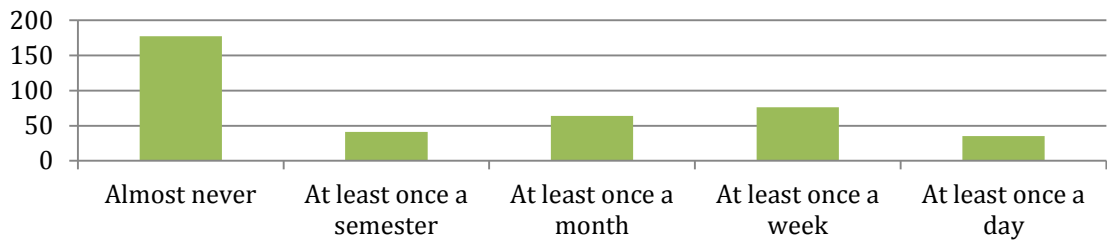




**32. When you do not recycle plastic forks, spoons and knives, why not?**



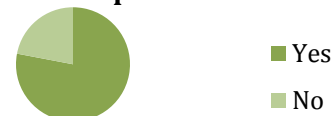
**33. How often do you recycle plastic products, such as sushi containers, on the UBC Campus?**



**34. Do you know what composting is?**



**35. Are you aware of any compost bins located on the UBC Campus?**



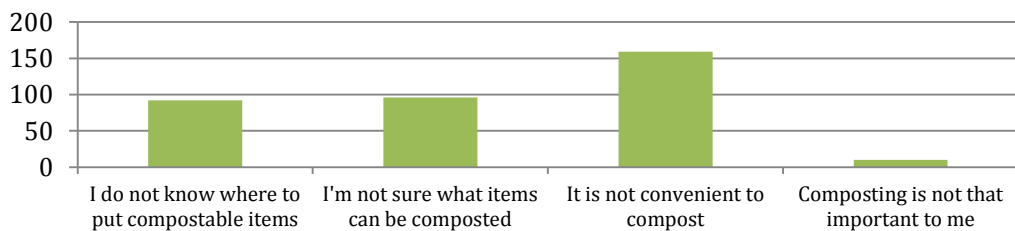
**36. Do you use compost bins on the UBC Campus?**



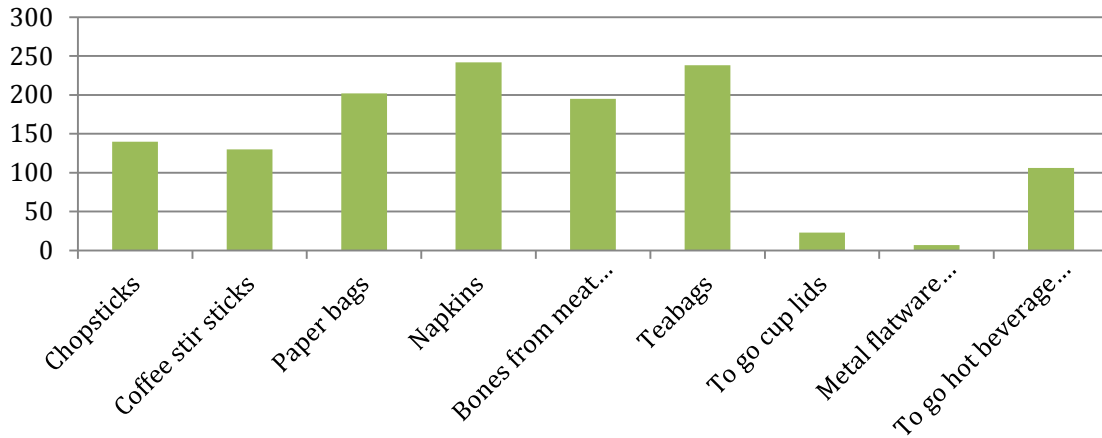
**37. Do you find it convenient to compost on the UBC Campus?**



**38. When you do not compost, why do you not compost on Campus?**



**39. Which of the following items can be placed in the green compost bins found on the UBC campus?**



**40. Please indicate if the following statement is true or false: It does not matter which bin (garbage, recycling, or compost) I put an item in because all the bins will be sorted later anyway**



■ 1 ■ 0

1=True, 0=False

**41. Are you aware of food-related events such as Meet Your Maker, the Blueberry Festival, the Apple Festival, FarmAde or other similar event on campus?**



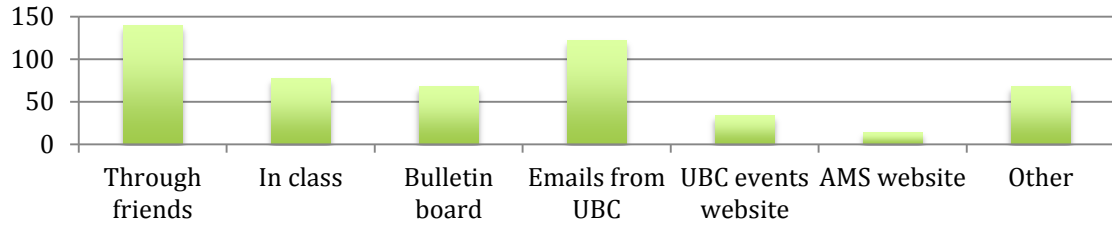
■ Yes ■ No

**42. Have you ever attended or participated in one of the events?**



■ Yes ■ No

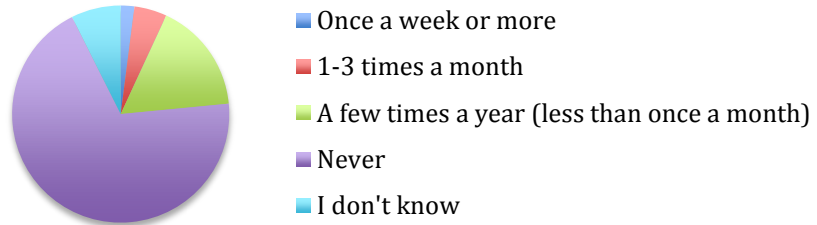
**43. How did you hear about these events?**



**44. Have you ever purchased food from the UBC Farm?**



**45. How often do you purchase food from the UBC Farm?**



**46. Are you aware of the Saturday morning Markets at the UBC Farm?**



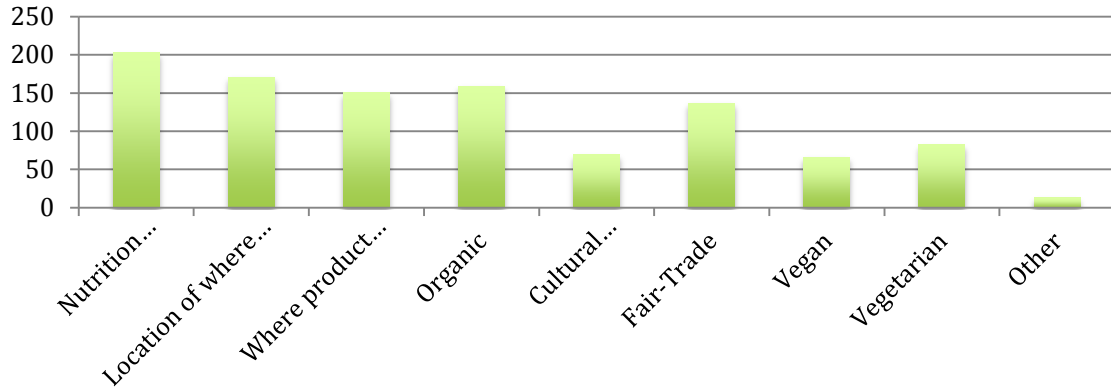
**47. Are you aware of the UBC Farm Market on Wednesdays at 12 pm by the bookstore?**



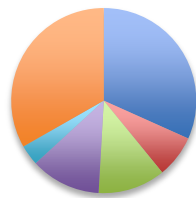
**48. Are you interested in having more information about the food you purchase on campus?**



**49. What type of information are you interested in?**



**50. How often do you purchase Fair Trade products on campus?**



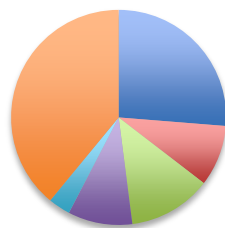
- Almost never
- At least once a semester
- At least once a month
- At least once a week
- At least once a day
- I do not know

**51. How often do you purchase certified organic food on campus?**



- Almost never
- At least once a semester
- At least once a month
- At least once a week
- At least once a day
- I do not know

**52. How often do you purchase locally produced food on campus?**



- Almost never
- At least once a semester
- At least once a month
- At least once a week
- at least once a day
- I do not know

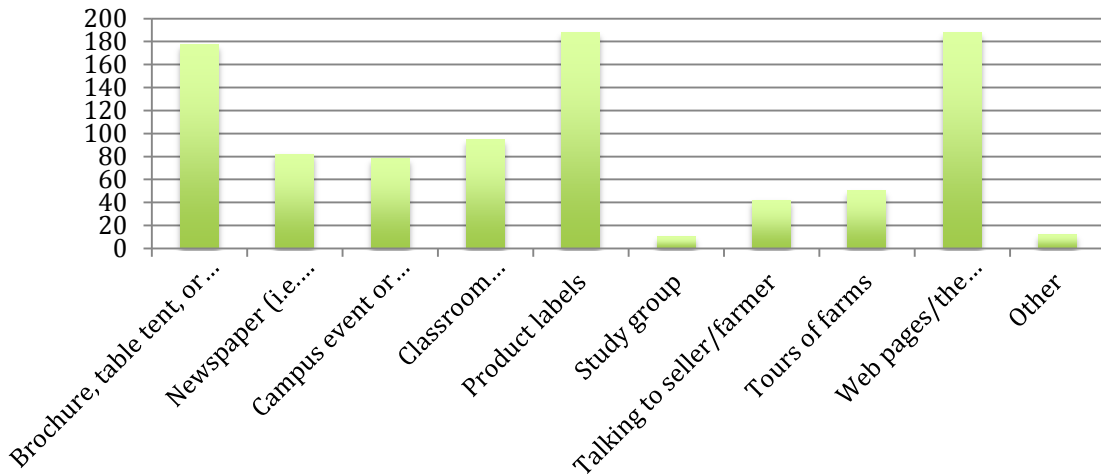
**53. Would you be more likely to purchase food from an outlet that uses produce from UBC Farm?**



**54. Are you interested in knowing more about the foods you purchased on the UBC Campus?**



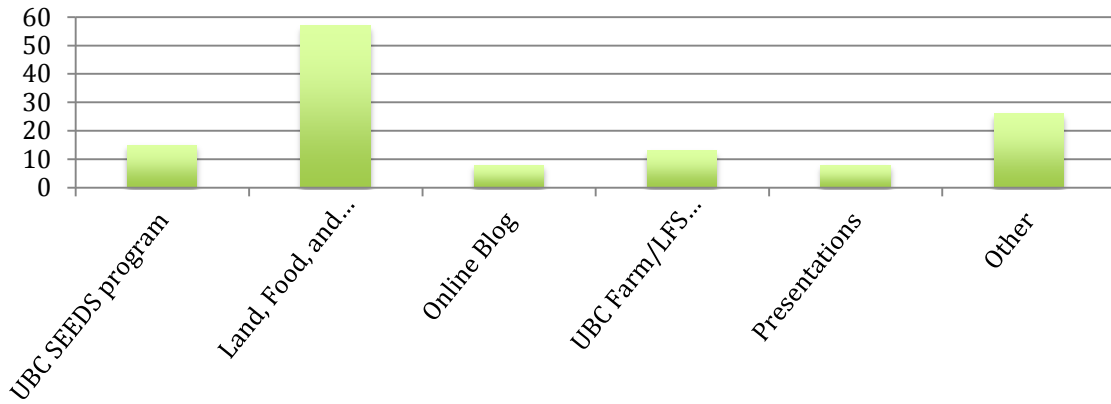
**55. What would be the best way to learn more about the food you purchase at UBC?**



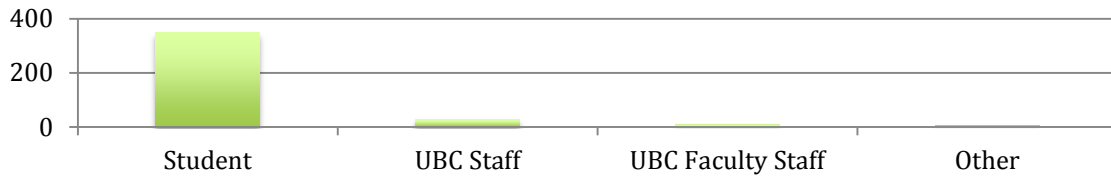
**56. Have you ever heard of the UBC Food Systems Project before?**



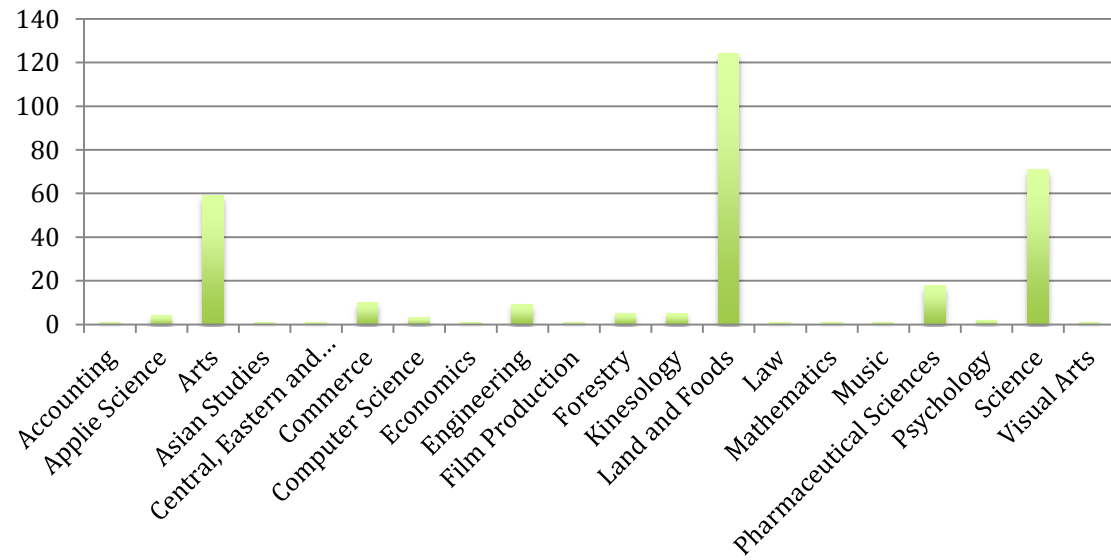
**57. How did you hear about the UBC Food Systems project?**



**58. Whom do you represent in the UBC Food System?**



**59. Faculty**



**60. Do you live on Campus?**



■ Yes    ■ No