ANALYSIS OF RESULTS FOR A RECYCLING SURVEY OF STUDENTS ON THE UI CAMPUS

by

The students in BUS378: Project Management, Spring 2011
Instructor: Tracie Lee

CONTENTS

INTRODUCTION

This report has been prepared for Darin Saul, Director of the University of Idaho Sustainability Center (UISC), by the students in the Spring 2011 edition of BUS378: Project Management. In this report, we provide the results of a recycling survey conducted across the University of Idaho's Moscow campus on Thursday, January 27th at 12:30 pm. Included is information about how the survey instrument was developed, our process for organizing courses to be surveyed, and methods used to collect and analyze the data. Also included are summary charts of the survey data, an analysis of the results, and two recommendations for the UISC as it moves forward with the UI Waste Minimization strategic initiative.

METHODOLOGY AND SCOPE OF PROJECT

BUS378: Project Management students were asked to collect data about UI students' attitudes and behaviors towards waste minimization, as part of the UI's efforts in a strategic initiative for waste minimization. The university spends $800,000 each year throwing things away. Darin Saul, our project sponsor, estimates that even with the costs of running a recycling and composting program, if we can reduce our trash volume by as much as 40%, we will have a net benefit of nearly $100,000 per year for the university.

Dr. Saul gave us a choice between a survey on recycling, and a survey about electronic waste. A team of students selected our final draft of the survey about recycling habits, as this seemed more relevant to students. Once the survey was selected, the 37 students in BUS378: Project Management completed the following tasks over the course of three class periods:

- All students took both surveys to determine average time to complete original surveys
- A team of students edited the recycling survey
- A team of students developed a script to use in introducing the survey to classes
- A team of students developed the topics to include in this report
- A team of students developed a PowerPoint file to share high-level results
- A team of students identified classes starting at 12:30 pm on Thursdays
- A team of students developed an email to be used in asking faculty for class time
- The instructor emailed faculty and kept track of which ones agreed to the survey
- A team of students separated the class into survey teams of 1 to 3 students
- The instructor printed 1,190 surveys (one page, front-and-back)
- The survey teams picked up blank surveys, went to classes and gave the surveys
- The survey teams entered raw survey data into an Excel file
- All survey results were collated into a single file
- A preliminary report was given to Dr. Saul, based on 291 surveys, on January 27th
- A final report was provided to Dr. Saul on February 2nd

Our instructor, Tracie Lee, emailed the faculty members who teach 31 classes which had a start time of 12:30 pm on Thursdays, enrollments of more than 20 students, and which represented a diversity of colleges and courses, 100- through 500-level. We received permission to survey 21 classes, covering 11 course prefixes. Total student enrollment in these classes was 1,184 students, including BUS378, our own class. See the table at right for a complete list of classes surveyed.

On the day that surveys were administered, we arrived at our designated classrooms, and at 12:30 pm, gave a brief introduction, then handed out the surveys to students in the classroom. We collected the surveys and returned to our classroom.

Multiple students entered raw survey data simultaneously into a form in MS Excel. This drop-down / click button form allowed us to speed up the data entry process and reduced human data entry errors.

A total of 920 surveys were collected in less than half an hour. The remaining 35 surveys were collected from BUS378 students during class on Tuesday, February 1st. The excel file with all raw survey data, this complete report, and all of the completed surveys have been provided to Dr. Saul.

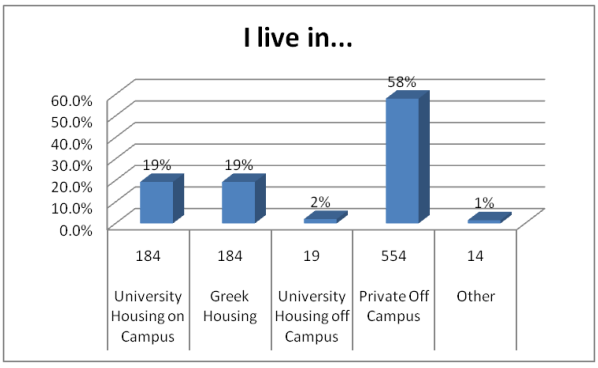
Table 1: Surveyed Courses

Class #	Professor
ACCT 492	Darryl Woolley
ACCT202	K.D. Hathaway-Dial
ANTH (HON) 220	Stacey L. Camp
ANTH 220	Stephen Mark Yoder
Arch 254 / ID 254	Roman Montoto, Randall Teal, Xiao Hu
BUS 414	James Forbes
BUS 428	Michael McCollough
BUS378	Tracie Lee
COMM 101	Robert Sean Parker, Diane L. Carter
COMM 432	Annette L. Folwell
CORE 163	Kenneth V. Faunce
CORE 171	Georgia Johnson
CORE 175	Edwin E. Krumpe
ECON 340	Jon Miller
ECON 385	Steven Peterson
Edci 301	Shannon McGowan
Hist 404	Dale Graden
Hist 424 / 524	Adam Sowards
Jamm 378	Glenn Mosley
POLS 449	Lisa Carlson
PSYC 305	Jamie Christel Nekich

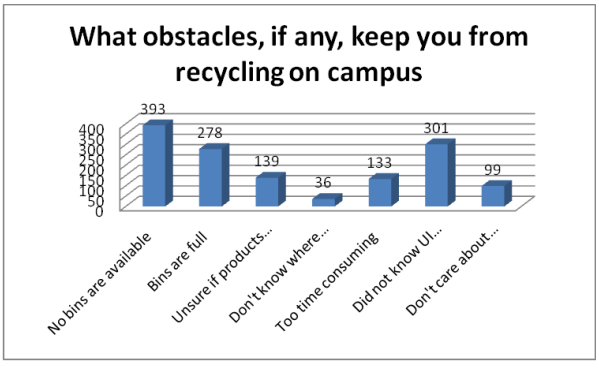
SUMMARY OF RESULTS

The tables in this section are based on the results of 955 students surveyed in classes that were held on Thursday, January 27th and Tuesday, February 2nd at 12:30 pm. Students included 121 freshmen, 256 sophomores, 255 juniors, 243 seniors, 63 super-seniors, 16 graduate students, and 1 faculty member. For a complete list of questions in the survey, see Appendix A.

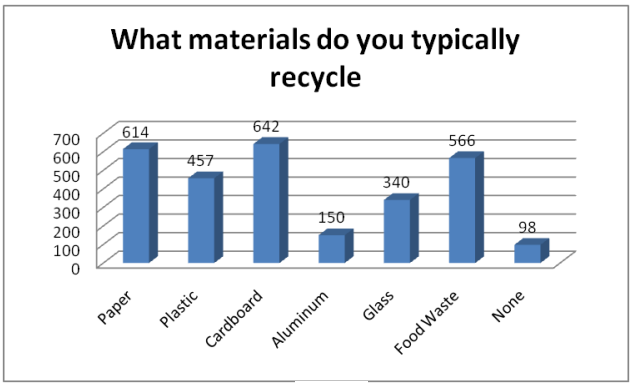
The data collected from the survey represents approximately 10% of total UI students on the Moscow campus.



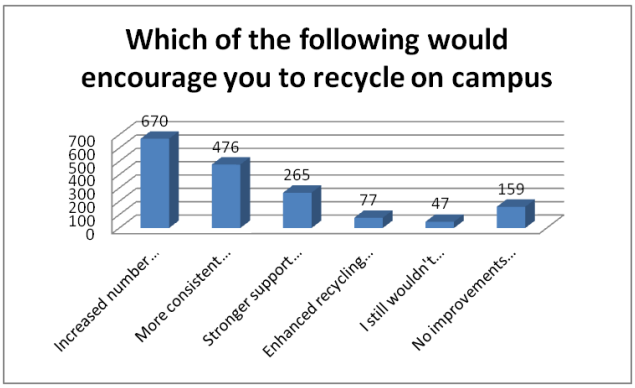
(1)



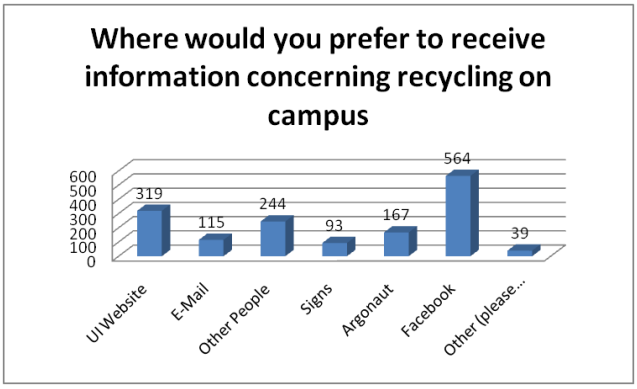
(2)



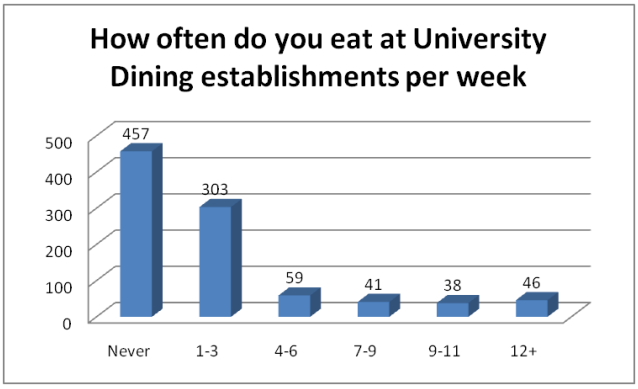
(3)



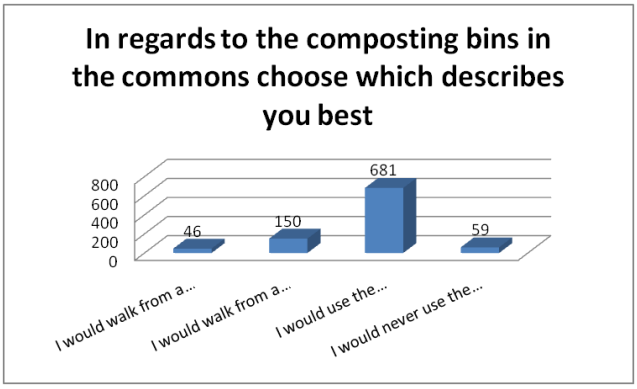
(4)



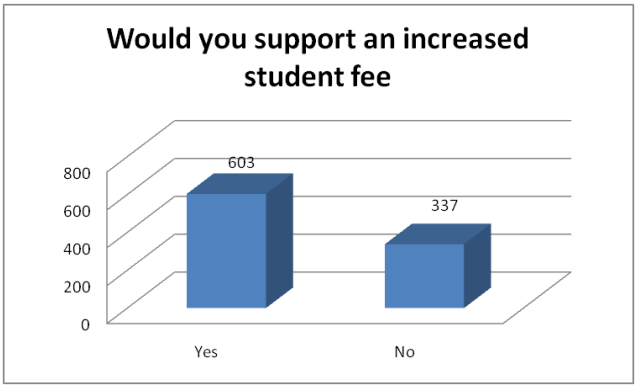
(5)



(6)



(7)



(8)

Graph (7) shows the behavior of students regarding the proximity of composting bins and the likelihood students will travel to another part of campus to use such bins. According to the data attained from the question relating to graph (7) most students would use the composting bin in the Commons if they ate in the Commons.

ANALYSIS OF DATA

After entering the data into a filterable spreadsheet, we looked for distinguishable relationships between different sets of data. The first data point is that of the total 955 surveyed, 857 people concluded they recycle at least one material consistently. That's a high rate for recycling in a community. Two thirds of those surveyed recycle cardboard and paper, and more than half recycle plastic. These are materials which are frequently used in the colleges, yet not all buildings provide locations for students to recycle these materials.

Students who live on campus are generating recyclable content in their daily lives, not just in the classroom. Of the 368 students surveyed who live on campus, 270 suggested there needs to be an increase in the visibility and quantity of recycling bins on campus and more support from the University.

The data also show that students would prefer to receive information about where and what to recycle via Facebook and the UI Website. This response provides important information on how best to deliver information to your target audience.

RECOMMENDATIONS

The analysis of data has shown that almost 90% of those surveyed already recycle, whether at home or on campus, and the biggest obstacle to recycling on campus is the lack of recycling bins and the lack communicating the importance of recycling at UI. There is a link missing in the chain of students continuing their recycling habits on campus. One possible way to inform students about the importance of recycling at UI, how and what they can recycle, and recycling locations on campus, is a mass email to UI students requesting that they join a UISC Facebook page. The Facebook page could contain updates on attaining UISC's goal of a 40% recycling rate, and could provide facts on the amount of waste we accumulate in a given period of time and how the waste can effect or possibly benefit the school if recycled properly. Another recommendation would be to host sustainability competitions and post updates on Facebook of the progress made by each Greek house/dorm hall to recycle the most goods within a semester. It seems that the most successful sustainability initiatives at UI and other universities are the ones that have the highest student participation and create the sense of urgency that sustainability effects the present, not just the future. For a few examples of other land-grant universities' sustainability initiatives, see Appendix B.

The excel spreadsheet which accompanies this report contains all the survey data. If there are any questions about this report or the spreadsheet, please contact Tracie Lee, tlee@uidaho.edu.

APPENDIX A: RECYCLING SURVEY

The BUS378 Project Management class has been asked on behalf of the UI Sustainability Center to administer this survey. The results will be used to help decide how the University's recycling efforts will be directed for current and future needs. This is an anonymous survey. After you have completed the survey, hold on to it and we will collect them from the end of the rows. **Thank you for your participation!**

1. What is your standing at the University of Idaho? (Please circle only one)

A. Freshman
B. Sophomore
C. Junior
D. Senior
E. Fifth year or older
F. Graduate Student
G. Faculty Member

2. I live in... (Please circle only one)

A. University Housing on Campus
B. Greek Housing
C. University Housing Off Campus
D. Private Off Campus
E. Other

3. How would you rate the quality of recycling across the UI campus?

A. Excellent
B. Pretty Good
C. Average
D. Not So Good
E. Terrible

4. Are you satisfied with the current state of recycling on the UI campus?

A. Yes
B. No

5. What materials do you typically recycle? (Circle all that apply)

A. Paper
B. Plastic
C. Cardboard
D. Aluminum
E. Glass
F. Food Waste
G. None

6. What obstacles, if any, keep you from recycling on campus? (Circle all that apply)

A. No bins are available
B. Bins are full
C. Unsure if products are recyclable
D. Don't know where to recycle
E. Too time consuming
F. Did not know UI recycles
G. Don't care about recycling

7. Which of the following would encourage you to recycle on campus? (Circle all that apply)

A. Increased number & visibility of bins
B. More consistent signs and labeling for recycling resources
C. Stronger support from the University
D. Enhanced recycling education program for students
E. I still wouldn't recycle
F. No improvements necessary

8. Where do you currently receive the majority of information concerning recycling on campus? (Please circle only one)

A. UI Website
B. E-mail
C. Other People
D. Signs in Campus Buildings
E. Argonaut
F. Facebook
G. Other (write in your answer below)

_____
_____

9. Where would you prefer to receive information concerning recycling on campus? (Circle all that apply)

A. UI Website
B. E-mail
C. Other People
D. Signs in Campus Buildings
E. Argonaut
F. Facebook
G. Other (please specify)

10. How often do you eat at University Dining establishments per week?

A. Never
B. 1-3 times
C. 4-6 times
D. 7-9 times
E. 9-11 times
F. 12 + times

-----Continued on following page-----

11. Choose the response that best describes you. (Please circle only one)

A. I compost as much as possible
B. I try to compost when it is convenient
C. I compost sometimes, but generally don't think it is very important
D. I don't really compost because I don't know how or where to do it
E. I don't care about composting at all

12. In regards to the composting bins in the Commons, choose which describes you best.

A. I would walk from a different building on campus to use the composting bins in the Commons
B. I would walk from a different part of the Commons to use the composting bins in the food court.
C. I would use the composting bins in the Commons if I was in the Commons eating
D. I would never use the composting bins in the Commons

13. Would you support an increased student fee ($4 or less) to enhance UI's recycling program and to expand composting on campus to include more food waste locations and biodegradable material?

A. yes B. no

APPENDIX B: RECYCLING PROGRAMS AT OTHER LAND-GRANT INSTITUTIONS

This website has links to many universities' sustainability websites: http://ulsf.org/resources_campus_sites.htm#ca

It may be helpful to look at the sustainability websites of a few land-grant institutions which report significant recycling programs:

University of California at Berkley: http://sustainability.berkeley.edu/

Colorado State University: http://www.fm.colostate.edu/sustain/

University of Florida: http://www.sustainability.ufl.edu/

Michigan State University: www.ecofoot.msu.edu

University of Minnesota: http://www.uservices.umn.edu/sustainableU/

Cornell University: http://www.sustainablecampus.cornell.edu/

N. Carolina State: http://www.ncsu.edu/sustainability/index.php

Clemson University: http://www.clemson.edu/administration/public-affairs/solidgreen/

Washington State University: http://sustainability.wsu.edu/

Rutgers, The State University of New Jersey: http://sustainability.rutgers.edu/