## Case Study: Combining Motives

for February 3, 2012

You are a consultant in the Statistical Consulting Center and a Psychology graduate student comes in to see you. One part of her dissertation involves people's motives for volunteering (typically some kind of community service work).

She has administered a questionnaire to about 300 volunteers. Based on this questionnaire she can compute six scores, one score for each of six motives for volunteering. The six motives are conceptually distinct, but the six scores are correlated.

At this point, she would like to have a single score to be used as an overall indicator of motivation for volunteering. Her question is how should she think about combining the scores into a single overall motivation score?

Questions for consideration: What additional questions do you have for the client that would help you decide how best to do this? Do you have any concerns about what she has done or what she would like to do? What methods might you use to do this? What are their pros and cons? How would you choose one, depending on her answers to your questions?

Groups: Here are the groups that will work together on this case. The first student on each list will present the group's findings and should also organize group meetings. The groups should get together in the coming week and consider the case.

| Group 1, Presentation: |  | Group 2, Presentation: |  | Group 3, Report: |  | Group 4, Report: |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Name | Email | Name | Email | Name | Email | Name | Email |
| Chris H | hulme005 | Qi | yanxx195 | Xiaoyi | zhuxx212 | Zhou | fang0157 |
| Matt | stear067 | Emily | pech0081 | Chris D | desja004 | Xin | zhan0648 |
| Jie | renxx034 | Garrett | lepa0050 | Wen | fanxx102 | Joel | bear0201 |
| Rachel | vonb0035 | Yu-Feng | chang648 | Jenny | dokke040 | Greg | schae029 |
| Sarah | jaco0654 | Lindsey | diet0146 | Felipe | acosta | Alain | vando026 |

Presentation groups: The presenter will have 12 minutes of class time to say what the team thought about the problem. To ease switching between groups, we will use my computer for all presenters, so if you choose to make a digital presentation, please email the slides to me by 2 pm , or bring them on a thumb drive and arrive five minutes early. PDF format is preferred.

Report groups: Please email your report to me (PDF format preferred) by 2 pm so I can make copies for the class. Your report should be at least one page long, but no more than two pages.

