Creativity Example: Video and Written Solution

Videos:

1. <http://screencast.com/t/wHeCpQgWEj8>
2. <http://screencast.com/t/LkFCJ6QI>
3. <http://screencast.com/t/08TrKJdlLmg>
4. <http://screencast.com/t/8Jl1KJi9T5FN>
5. http://screencast.com/t/F9bfDVxq95V1

In the chapter problem we learned of an experiment in which 47 volunteers with considerable creative writing skills were randomly assigned to either fill out a questioner about intrinsic motivation or to fill one out about extrinsic motivation. They were then instructed to write a poem which was then given to 12 judges and the average score of the judges was recorded.

* + - * 1. Use SAS to make a histogram of each group’s scores. Does it appear there is any difference?

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| Extrinsic |
|  |
| Intrinsic |
|  |

It appears that the intrinsic scores might have a higher mean.

* 1. Run a permutation test for if the means of the intrinsic group’s scores is different than the extrinsic group’s scores. Write up a statistical conclusion and scope of inference.

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There is strong evidence to suggest that the mean score of those who received intrinsic motivation is greater than that of those who received the extrinsic motivation (pvalue = .004 from a permutation test). Since this was a randomized experiment we can conclude that the intrinsic motivation caused this increase. In addition, since these were volunteers, this inference can only be assumed to apply to these 47 subjects although the findings are very intriguing.