Considering the purpose of research when identifying quantitative and qualitative commonalties

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Introduction

• We don’t like the paradigm “wars”
• Take a look at some of the giants in our field, whose ideas have stood the test of time, and we doubt they would get caught up in the argument
  – Sir Francis Bacon
  – Thomas Bayes
  – As well as many more contemporary developers of research methods
Focus on commonalities as opposed to differences

• Purpose
• Question Clarity
• Data Quality
• Connection between analyses and questions

• Generalization
Schema and Labeling Represent a Double-Edged Sword

• Self identification with a camp helps communication, but...
• May limit oneself
• Have other researchers historically labeled themselves (Bacon, Bayes, etc.)?
• SEM, exploratory and confirmatory
• Hard and soft modeling, as guided by purpose
Research Purpose

• Research purpose should dictate design
  – Focusing here might emancipate one from paradigm camps
  – Promote stronger training
  – Yields creativity
We’re not sure how creative we are but...

• We can work out details of an integrated analytic approach that ties regression in with qualitative coding.

• Rooted in the idea of “quantitizing” qualitative data
Consider...

\[ Y = a_0 U + a_1 V_1 + a_2 V_2 + ... + a_n V_n + a_{n+1} T_1 + a_{n+2} T_2 + ... + a_{n+n} T_n + E_1 \]

Where:

- \( Y \) = a dependent variable
- \( U \) = is the unit vector
- \( a_0 - a_{n+1} \) = Partial regression weights
- \( V_1 - V_n \) = Quantitative variable (e.g., existing data chooses from extant databases)
- \( T_1 - T_n \) = Qualitative Theme (i.e., categorical or ordinal themes assigned a number)
- \( E \) = Error (residuals)
Some questions...

• Question 1. To what extent do the variables account for a significant amount of unique variance in predicting \( Y \)?

• Question 2. To what extent do the quantitative variables account for a significant amount of unique variance over and above the qualitative themes?

• Question 3. To what extent do the qualitative themes account for a unique amount of variance over and above the quantitative variables?

• Question 4. What is the level of interaction between quantitative and the (numerical) qualitative variables?

• Question 5. What is the degree of curvilinear relationship between the qualitative and quantitative variables?

• Question 6. What is the degree of curvilinear interaction between the qualitative and quantitative variables?

• Question 7. How stable are and replicable are the results?
Consistency between Purpose and...

• Questions
• Design
• and Analyses
In Conclusion...

• What makes for good research?
  – Consistency between purpose, problems, research design and analyses
  – Data quality
  – Reliability (external validity, generalization, transferability)
  – Consequential Validity

• Degree of Credibility and legitimization