Unobtrusive Measures in Social Science Research

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Unobtrusive Measures: Definition and References

- **Definition**
  - Unobtrusive measures are measures that do not require the researcher to intrude in the research context.

- **References**
Some Examples

- Chinese jade dealers have used the pupil dilation of their customers as a measure of the client’s interest in particular stones.

- Racial attitudes in two colleges were compared by noting the degree of clustering of blacks and whites.

- The floor tiles around the hatching-chick exhibit at Chicago’s Museum of Science and Industry must be replaced every six weeks. Tiles in other parts of the museum need not be replaced for years. The selective erosion of tiles, indexed by the replacement rate, is a measure of the relative popularity of exhibits.
Some Examples

- Physical Traces: Erosion and Accretion
  - Litter
  - Graffiti
  - Trails on campus lawns, between buildings

- Archives (running records)
  - Government records, political and judicial records, mass media

- Archives (episodic records)
  - Institutional records, written documents

- Simple Observation
  - Signs, Symbols, Language
“There is today, in social science circles, a simple and persistent belief that knowledge about people is available simple by asking. We ask people about themselves, and they tell us…” (Kellehear, 1993:1)

70% of articles that appeared in major sociology journals (AJS, ASR, SF) used data sources that were collected by questionnaires or interviews (Lee, 2000: 6)

Problems are well known: reactivity, demand characteristics, researchers’ expectations
Examples

- **Word usage to detect individual differences** (Pennebaker, Mehl, and Niederhoffer, 2003)

- **Offices and bedrooms as physical manifestations of personalities** (Gosling et al., 2002)

- **Personal Web sites as indicators of identity claims** (Vazire and Gosling, 2004)

- Blogs
permission from Museum Of Modern Art and Dan Perjovschi
Measures of Narcissism

- Narcissism as a clinical disorder
- Narcissism as a personality dimension
  - Raskin and Hall (1979) developed Narcissistic Personality Inventory (NPI)
  - Emmons (1987) identified four factors in the NPI:
    - Exploitativeness/Entitlement
    - Leadership/Authority
    - Superiority/Arrogance
    - Self-absorption SELF-admiration
Difficulties in Asking CEOs

- **Access**
  - Top executives of public companies are very reluctant to participate in survey research (Cycyota and Harrison, 2006)
  - Questions about traits as sensitive as narcissism would yield especially low response rates

- **Social Desirability**
  - There is a high chance that the answers to questions in the NPI will not portray the true self of the CEO.
  - For example, in response to the item “I really like to be the center of attention” the CEO is likely to answer in a socially desirable way.
Text and other unobtrusive measures

- Autobiographies used to assess how CEOs score on the big five personality dimensions (Peterson et al., 2003)

- Measures of Top Management Team Power (Finkelstein, 1992)

- Measures of CEO Overconfidence (Malmendier and Tate, 2005)
Mapping the measures to the elements of narcissism

Unobtrusive Indicators of Narcissism in CEOs

| Conceptual Elements of Narcissism (from Emmons, 1987) |
|---------------------------------|---------------------------------|---------------------------------|---------------------------------|
| **Leadership/authority**        | **Self-absorption/self-admiration** | **Superiority/arrogance**       | **Exploitiveness/entitlement**   |
| I really like to be the center of attention. | I like to look at myself in the mirror. | I usually dominate any conversation. | I insist on getting the respect that is due to me. |
| I like having authority over other people. | I am an extraordinary person. | I am a born leader. | I am envious of other people’s good fortune. |

Interpretive Alignment with Elements of Narcissism

Unobtrusive indicators of narcissism in CEOs:

- Prominence of CEO’s photograph in annual reports
  - I am the central figure in this company.
  - I enjoy the visibility that comes with being CEO.
  - I deserve to be showcased.
Photographs in Annual Reports

*Prominence of the CEO’s photograph* was measured on a 4 point scale:

- 4 points if the CEO’s photo was of him/her alone and occupied more than ½ page
- 3 points if the photo was of the CEO alone and occupied less than ½ page
- 2 points if the CEO was photographed with one or more fellow executives
- 1 point if there was no photograph of the CEO.

**Firms with no Annual Reports:**

- Some firms for some years reported 10-Ks but did not print any Annual Reports. For those cases, the CEO received a score of 1.

**Annual Reports were obtained from Mergent Online/ co. websites**

**10-Ks were obtained from the SEC’s EDGAR website.**
Strengths

- Can use longitudinal data
- Can study prior CEOs
- No need to send out questionnaires to CEOs
- The unobtrusive measures could be validated with reports from security analysts
Weaknesses

- Construct Validity Issues
  - deterioration of certain library books may reflect the activities of a single individual rather than indicate heavy circulation.
  - the absence of graffiti may reveal more about cleaning policies than social attitudes.
Questions
Thank you