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Exploring the Interface of Indigenous Traditional Knowledge & the Health Sciences

Opening

Who Am I?

- Academic Psychologist
  - Clinically-Trained
  - Community-Engaged
  - Culturally-Attuned
- Research Interests
  - Culture & Mental Health
  - Indigenous Psychologies
  - Cross-Cultural Interventions

Presentation Goals

- Situate my perspective
- Review Indigenous Traditional Knowledge
- Describe normative inquiry in the Health Sciences
- Consider the interface of these approaches to "knowing"

Situating My Perspective

Round 1

Situating My Perspective

- Interdisciplinary Influences
  - Clinical Psychology → psychosocial treatments + scientific methods
  - Cultural Anthropology → "thick" description + interpretive insights
  - Native American Studies → contemporary Indigenous issues + critical analysis

Situating My Perspective

- Relevant Scholarship
  - Comparison of Therapeutic Practices *(Gone, 2010)*
    - Psychotherapy & psychosocial interventions
    - Sacred Indigenous healing traditions
  - Divergence in Evaluative Paradigms *(Gone, 2012)*
    - General (nomothetic) claims based on statistical trends in large samples
    - Particular (idiographic) claims based on self-evident personal experience

Situating My Perspective

- Assumptions About Indigenous Traditional Knowledge (ITK)
  - ITK originated prior to European contact
  - ITK was altered, disrupted, suppressed, & sometimes even eradicated during European colonization
  - Some forms of ITK persist today
  - Modern forms of ITK reflect histories of contact & exchange
  - TEK is a subset of ITK
  - I will focus on ITK more broadly

Indigenous Traditional Knowledge

Round 2

Indigenous Traditional Knowledge

- Marlene Brant Castellano's (2000) ITK
  - Sources
    - Traditional teachings (reproduced across generations)
    - Example: Myths & tales, technological know-how
    - Empirical knowledge (accumulated from careful observation)
    - Example: Caribou migration patterns
    - Revealed knowledge (spiritually given in dreams & visions)
    - Example: Black Elk's grand vision

Indigenous Traditional Knowledge

- Brant Castellano's (2000) ITK (cont)
  - Characteristics
    - Personal – tied to the integrity & perceptiveness of the knower
      as opposed to general & authorized by unknown others
    - Oral – communicated in-person & with responsibility for transferring power
      as opposed to written or recorded for sharing with unknown others
    - Experiential – subjectively felt, richly interpreted, & deeply introspective
      as opposed to abstract & removed from lived experience
    - Holistic – perceived across the domains of the self (intellectual, spiritual, emotional, & physical)
      as opposed to merely rationally considered
    - Narratively conveyed – in keeping with diverse genres employing oblique instruction
      as opposed to delineating principles & propositions / rendering admonitions & judgments

Indigenous Traditional Knowledge

- Considering ITK (at NIH)
  - Principal Interest in:
    - Empirical Knowledge of various kinds
    - Possibly some Traditional Teachings?
    - Probably *not* Revealed Knowledge
  - Notable Characteristics include:
    - Personal & particular rather than abstract & general
    - Holistically experienced across rational, emotional, & intuitive registers
    - Valued for subjective & introspective qualities
    - Authority & influence tied to reputation of knower
    - Sharing tied to specific relationships & responsibilities

Inquiry in the Health Sciences

Round 3

Inquiry in the Health Sciences

- Knowledge in the Health Sciences is based on Scientific Inquiry

- What is Scientific Inquiry? *(Gone, 2011)*

  - Caveat: challenging to generalize across scientific fields
  - Distinctive synthesis of Rationalism & Empiricism

  Involves the precise measurement of phenomena by an interchangeable observer that is used to evaluate falsifiable explanations of such phenomena

  - Usually entails statistical analysis of relevant variables
  - Subjected to skeptical interrogation by peer scientists for publication
  - Depends on replication of findings across studies for acceptance

Inquiry in the Health Sciences

- Sizing Up Scientific Inquiry
  - Advantages
    - Best way to attempt to answer certain kinds of crucial questions (efficacy of pharmaceuticals)
    - Extension of human rationality beyond unaided powers of reason (cognitive prosthesis)
  - Complications
    - Answers to crucial questions can be extremely elusive
    - Science depends on assumptions that are under-examined & even ignored
    - Science works better in theory than in practice
    - Example: "Most published research findings are false" *(Ioannidis, 2005)*

Inquiry in the Health Sciences

- Considering Scientific Knowing (at NIH)
  - Deemed best way to produce health knowledge (Beyond Dispute)
    - Limits the kinds of questions that can be asked
    - Limits the methods of inquiry that can be used
  - Notable Characteristics include:
    - Probabilistic, abstract, & general rather than certain, concrete, and particular
    - Rationally evaluated in skeptical fashion
    - Valued for objective & unbiased qualities
    - Authority & influence tied to robust research methods & replication of findings
    - Sharing tied to publication following anonymous & blinded peer review

Considering the Interface of ITK & Health Science

Round 4

Considering the Interface

*"The key to understanding Indian knowledge of the world is to remember that the emphasis was on the **particular**, not on **general** laws and explanations of how things worked . . ."*

Deloria, 2001, p. 22

Considering the Interface

- Clear divergences in attributes of ITK & Scientific Knowing
- How best to conceptualize this interface?

- Four Possibilities for Resolving these Divergences
  - #1: Divergences at this Interface are more Apparent than Real (Compatibility)
    - My descriptions are erroneous &/or overgeneralized
    - Some kinds of empirical knowledge within ITK are so compatible with scientific knowing that they would be accepted without further confirmatory research by health scientists
    - Implication: ITK & scientific knowing *emerge as* equally valid & valued ways of knowing in response to pressing questions about health

Considering the Interface

- Four Possibilities (cont)
  - #2: The Divergences at this Interface should be resolved by privileging ITK
    - Despite European settler efforts to denigrate & eradicate ITK, it properly persists in guiding (some) AI lives
    - In contrast to the decontextualized sterilities of scientific knowing, ITK is time-tested, highly adaptive, & better-suited for a fuller human life
    - Implication: ITK has not been properly understood & appreciated & may address health concerns in ways that the hegemony of science has thus far precluded
  - #3: The Divergences at this Interface should be resolved by privileging Scientific Knowing
    - Whatever the virtues of ITK, it remains "folk knowledge" that contains truths, half-truths, and errors
    - Only scientific knowing can sort out which is which (separating the wheat from the chaff)
    - Implication: ITK may be suited for hypothesis formation, but can contribute little more of value for the health sciences

Considering the Interface

- Four Possibilities (cont)
  - #4: The Divergences at this Interface are Fundamentally Irreconcilable
    - Both knowledge traditions have limitations, & both have something to contribute
    - In many respects, they address different concerns & different domains of experience
    - Perhaps best conceptualized as two circles that touch but never overlap
    - HOWEVER, sometimes these will overlap
    - Direct conflict & contradiction between claims based on these knowledge traditions are possible & (on occasion) even likely
    - Example: "This specific herbal medicine does/does not remedy these symptoms"
    - Proponents of ITK and Scientific Knowing may simply part ways over such disagreements

Closing

What's at Stake at the Interface?

- I do not think it very likely that:
  - These knowledge traditions are fully compatible (Possibility #1)
  - ITK will attain primacy in the health sciences or wider society (Possibility #2)
- Rather, I think that *proponents of*:
  - ITK will *assert* its legitimacy & propose peaceful co-existence & mutual regard (Possibility #4)
  - Scientific Knowing will routinely (even if tacitly) *reject* ITK as mere "folk knowledge" that must bow to scientific authority (Possibility #3)
- If so, is it desirable/useful/helpful/defensible/ethical to introduce ITK into this kind of interaction?

Recommendation

Federal agencies should solicit & fund collaborative & participatory research on present-day assumptions, logics, methods, & practices associated with forms of ITK with the greatest potential for relevance to the health sciences.

Website

- For more information about my scholarship (& to download my publications), please visit my website at:

http://gonetowar.com

- Thank You!