

What does Open Science mean for qualitative research?

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“solutions such as open science practices are more easily and appropriately executed for deductive research in base disciplines that share common methods, epistemologies, and ontological assumptions. There is danger in inappropriately importing the logics developed largely in experimental social psychology to the field-based, qualitative, and theory-generating side of our field.”

Source: Pratt et al. 2019

What is qualitative research good for?

Some important things are unattainable, or cannot at least be fully understood, quantitatively. Some concrete examples:

- *Why are people hesitant to vaccines?*
- *How do doctors choose their specialty?*
- *Why do politicians make certain decisions?*
- *What is democracy?*
- *How do actors solve complicated issues together?*
- *How did historic people think?*
- *How is power exercised in different cultures?*
- *What is the meaning of pain for different people?*

What about open science then?

- First, a distinction between positivist and interpretivist approaches to qualitative research
- Qualitative research generally
 - aims to answer the “how,” “why,” and “what” questions of a phenomenon
 - often uses language as its data, be it written or oral, collected via interviews, focus groups, observation and so forth (Haven & Van Grootel 2019)
- Positivism and interpretivism
 - Different epistemologies (that give different implications for open science)
 - *Example: what is democracy?*

What is the problem?

- QTD - the Qualitative Transparency Deliberations
- Not necessarily crisis in *replication*
 - “In quantitative research, the sharing of data and code is often meant to enable **replicability as an evaluative standard**. For the research communities at the core of the QTD, **by contrast, transparency contributes to research assessment primarily in ways unrelated to replication**. By far the most commonly expressed view was that the provision of more information about the research process **helps research audiences better identify potential biases or other threats to the validity of findings**.” (Jacobs et al. 2021)
- Rather than replicable...
 - Humphreys et al (2021) talks of *trustworthiness*
 - Jacobs et al (2021) discusses *transparency* in order to achieve “richer communication about knowledge production, research integrity, and professional ethics”



Source: Gallagher et al (2020). Open Science principles for accelerating trait-based science across the Tree of Life. *Nature ecology & evolution*, 4(3), 294-303.

Open methods

- Data collection/generation
 - Field notes and interview transcripts only gets us thus far
 - "there are more nuanced understandings between researcher and participant that may not be captured in the field notes" (Chauvette et al 2019).
 - Specifics for interpretivist approaches
 - "not all of what the researcher observes, *feels*, and hears can be written down" (Chauvette 2019)
 - A specific role for the researcher when data is *generated* rather than collected
- Analysis/presentation
 - the use of tables (Cloutier & Ravasi 2021)
 - Can be controversial depending on your standpoint/approach

Table 2. Most common forms of evidence that can be put into table cells.

Form of evidence	Content types	Examples
<i>Raw data</i>		
Text excerpts	Direct quotes from interview transcripts, document excerpts, field notes, tweets, and so on	Michel (2011: Table 1) Sadeh and Zilber (2019: Tables 2 and 3)
Images	Pictures, drawings or figures (if produced by informants)	Ravasi et al. (2019: Tables 7, 8, and 9) Pandza (2011: Table 2)
<i>Processed data</i>		
Narrative summary	Concise account of observed events, actions, decisions, outcomes, and so on	Bechky and Okhuysen (2011: Table 3) Grodal (2018: Table 4)
Numbers	Total no. of occurrences, items, events, and so on; percentages	Kellogg (2019: Table 4) Croidieu and Kim (2018: Table 3)
Descriptive codes	Acronyms, abbreviations, such as Y/N (yes/no); M/F (male/female)	Christianson (2019: Table 2) Hoppmann et al. (2019: Table 3)
Symbols	Tick marks or “like” symbol, full/half/no circle, flag, and so on	Grimes (2018: Table 2) Pache and Santos (2013: Table 6)
Evaluations	High/low; strong/medium/weak, active/inactive, ++/--, and so on	Zimmermann et al. (2018: Table 1) Cozzolino et al. (2018: Table 1)
Figures	Produced by the researcher	Goh and Pentland (2019: Table 3) Nigam and Dokko (2019: Table 5)

Source: Cloutier &
Ravasi 2021

Open peer review

- To some extent, the same as for quantitative research
- But what about pre-registration?
 - For some qualitative research, when generating hypothesis is the purpose (postdiction rather than prediction), flexibility is key
 - Qualitative pre-registration as “a living document” (Haven & Van Grootel 2019)

Open data

- Similar kinds of data (language, personal accounts) for positivists and interpretivists that require confidentiality
- Highly contextualized
 - Is sharing relevant and “worth it”?
 - Case study database
- Hard to anonymize
 - Is sharing ethical?

References

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Thank you!

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