INTERACTIVE INSTITUTE 2021

BUILDING AND SUSTAINING A CULTURE OF HIGH-QUALITY DATA

Integrating Qualitative Data on the Fly: Qualitative Data as a Substitute for Missing Data

April 13–15, 2021





Presenters

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Agenda

- Reasons to consider qualitative data
- Introduction to qualitative data
 - Collection
 - Analysis
 - Presentation
- Using qualitative data

Reasons to Consider Qualitative Data



Disruptions to Data Collection

- Many causes
 - COVID-19
 - Natural disasters
 - Hurricanes
 - Floods
- May be localized or widespread and can cause data loss



Disruptions Don't Stop the Need for Data

- State and local education agencies still need to answer questions
 - How are students doing?
 - How is implementation going?
 - Is the program having the desired effects?
- The disruption may lead to additional questions
 - How did the disruption affect students and teachers?
 - What support is needed during and after the disruption?
- Qualitative data can help provide answers



The State May Need Data About the Disruption

- During COVID-19, some states added new open-ended questions to existing surveys aimed at understanding how educators, students, and families were coping during the pandemic
 - Have the participants themselves been affected?
 - Have they experienced a trauma?
- States also could collect these data through interviews or focus groups through video conferencing

Qualitative Data Can...

- Contribute depth and details
- Help illustrate causation
- Capture feelings and thoughts of the participants
- Identify new or emerging topics
- Provide answers to
 - What
 - How
 - Why

Benefits of Qualitative Data During a Disruption



Quick deployment

Focus groups
Interviews
Surveys



Data on

Implementation
Programs
Scholastic
achievement



From target groups

Teachers and other school staff
Students





Information about

Perceptions

Needs

Opinions

Personal experiences

Introductions to Qualitative Data



What Is Qualitative Data?

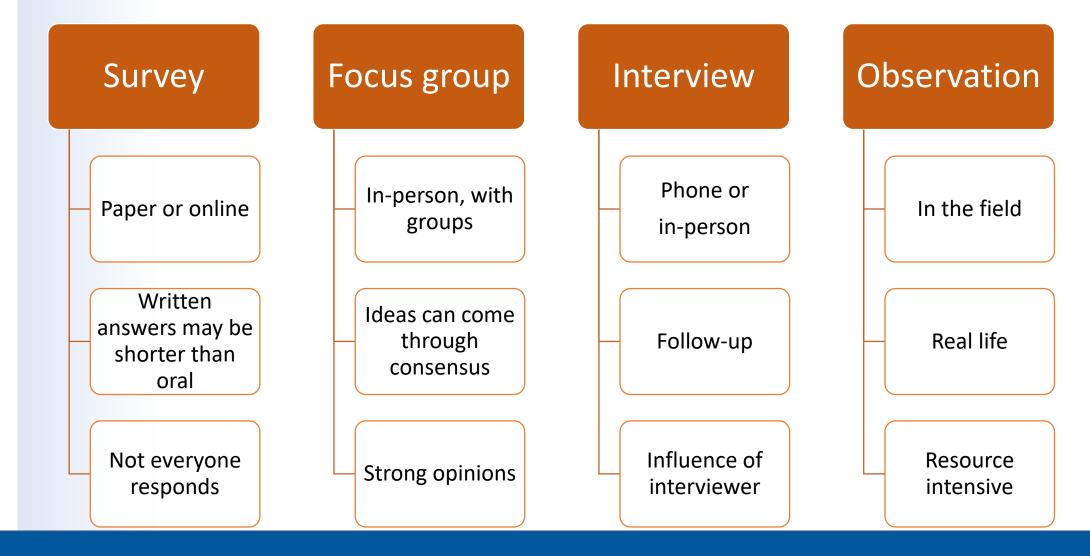
Not numbers

The "insider" perspective

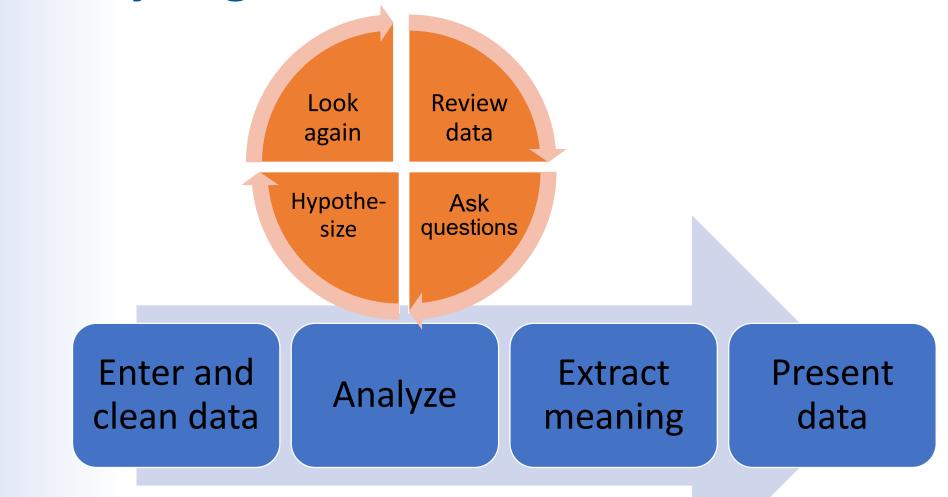
 Individuals' feelings and attitudes in their own words



Collecting Qualitative Data



Analyzing Qualitative Data



Presenting Qualitative Data

Qualitative data should be organized in a manner that facilitates the reader's ability to draw conclusions.



Narrative summaries

Tables

Illustrative quotes

Vignettes



Qualitative Data Displays: Narrative Summaries

Narrative summaries—brief written overviews of main themes

During virtual learning, teachers were particularly enthusiastic about the new virtual learning platform with most explaining that it was easy to use and helped engage students. Those who did not find the platform helpful most often explained that they or their students had technical difficulties, including poor connectivity.

Qualitative Data Displays: Tables

Present patterns in responses (similarities, differences, frequencies)

Respondent group	Effective virtual learning activities	Explanation
Teachers	Asynchronous pre-recorded lessons	Allowed students to view at their own pace
Parents	Internet videos	Children reported enjoying them and talked about the subject matter later
Students	Breakout groups	Allowed interactions with friends and classmates



Qualitative Data Displays: Illustrative Quotes

Highlight main findings and provide richness and depth

"I was getting burned out on virtual learning platforms but planning meetings with my team of grade-level teachers gave me a place to reflect and vent and the support of my peers helped me get through the rough times."

Qualitative Data Displays: Vignettes

Illustrate short example or meaningful story

District A's Story

District A implemented a new virtual reading intervention in January. Interviews with teachers and administrators in the district indicate they believe students receiving the intervention are happier and more engaged than students had been in the previous months of virtual instruction using the old curriculum.

Using Qualitative Data



Ways to Use Qualitative Data



- Provide information in place of missing quantitative data
- Triangulate with existing data (e.g., formative data, other quantitative data)
- Find out about needs or opinions of populations you are serving
- How to improve things for next time

Examples of Qualitative Data Use



- Document stakeholder input or concerns
- Substitute for missing quantitative data
 - Teacher perceptions of student learning to inform about progress and engagement to compensate for missing test scores
 - District perceptions of professional development training
- Combine with formative or other data to gain more complete knowledge
 - Quantitative data on implementation participation can be supplemented by teacher and student opinions



Comparing Data Types

Qualitative data	Quantitative data
"Brings numbers to life"	Adds "precision to words" ²
Offers depth	Offers breadth
Provides rich data	Provides credible data
Explores topics in detail	Includes many participants
Uses flexible data collection	Uses standardized data collection

¹ Nimkoff, T. (2010). Evaluation Guidebook: Program Evaluation in Educational Settings. Kamuela, HI: Hawaii Learning Resources.

² Suter, W. (2012). Qualitative Data, Analysis, and Design. In: Newton Suter, W., Ed., *Introduction to Educational Research: A Critical Thinking Approach.* Thousand Oaks, CA: Sage Publications.



Combining Qualitative and Quantitative Data

- Qualitative and quantitative data can be complementary
- Used together, they can increase
 - Reliability of data
 - Validity of findings
 - Insight into how outcomes were achieved
 - Support findings and identify inconsistencies (triangulation)

Qualitative Data: Things to Consider



- You may need to provide time and training for
 - Data collection (surveys, focus groups, interviews)
 - Data analysis
- There are limits to its generalizability
 - Those with strong opinions are more likely to respond
 - Participation in interviews or focus groups takes time and resources for participants
 - In the context of a disruption, those who are able to participate in qualitative data collection activities likely differ in meaningful ways from those who are unable to participate

Discussions: How to Use Qualitative Data from Parents, Teachers, Students, LEA Staff



 Scenario: You provided mobile hotspots during the pandemic. How could qualitative data help determine their effectiveness?

ATC test

Narrative summaries of how they have or have not been beneficial

Triangulate with what is happening in the classroom

 Scenario: You are missing statewide testing results. How could qualitative data help?

With special ed assessment and evaluation incorporating a lot of family observation

 Scenario: You moved to a new online curriculum. How could qualitative data help determine its effectiveness?

Student engagement, are they more or less engaged with the new vs. the old

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