

Questionnaire design

Questionnaire design

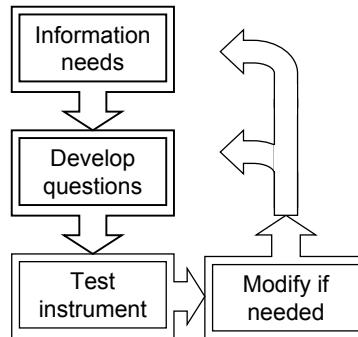
Functions of questionnaires

- Translate what is to be measured
- Standardize the instrument
- Gain cooperation
- Serve as permanent record
- Aid in analysis
- Allow reliability assessment

Questionnaire design

Development process

- An iterative process



Questionnaire design

Major issues

- Construct(s) to be measured
- Question types
- Question wording
- Question sequencing
- Questionnaire layout
- Pretest and redesign

Question types

Response formats

- Open-ended questions
- Closed-ended questions
- Scaled-response questions

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Question types

Factors affecting the selection

- Property being measured
- Previous studies
- Survey vehicle
- Level of measurement
- Respondent characteristics

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Question types

Open-ended questions

- Questions that do not restrict the respondent in the way he or she can answer them.
 - Easy to administer (+)
 - Difficult to tabulate and analyze (-)

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Question types

Multiple choice questions

- A type of question that restricts the respondents' answers to the choices given
 - Easy to administer (+)
 - Easy to tabulate and analyze (+)
 - May be difficult for the respondents to collapse their reply to one of the options without elaborating (-)

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Question types

Multiple choice questions

- Points to observe when preparing multiple choice questions
 - Use collectively exhaustive set of alternatives
 - Use mutually exclusive alternatives
 - Beware of order bias

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Question types

Dichotomous questions

- Questions that limit the answer to one of two alternatives. A special case of multiple choice questions.
 - Easy to administer (+)
 - Easy to tabulate and analyze (+)
 - May be difficult for the respondents to collapse their reply to one of two options (-)

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Question types

Scaled response questions

- Questions that use a scale developed to measure the attributes of a construct.
 - Unlabeled scaled-response questions
 - Labeled scaled-response questions
 - Can measure complex constructs (+)
 - Valid and reliable scales must be developed to measure the construct (-)

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Developing questions

A blend of art and science

- Mistakes are easy to commit in design
- Resulting in inaccurate measurement of the construct
- Good questionnaires are the result of knowing what is being measured, communicating well and hard work.

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Developing questions

Desirable question attributes

■ Focus

- There is a difference between what people like and what they buy. Focus on what is important

What kind of clothing do you like? or,
What kind of clothing will you buy?

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Developing questions

Desirable question attributes

■ Brevity

- Short is better than long

When was the last time you flew on an airplane
when you were traveling for business or pleasure?

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Developing questions

Desirable question attributes

■ Clarity

- Meaning must be clear to everyone

What do you have to say for student involvement in
academic planning?

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Developing questions

Desirable question attributes

■ Vocabulary

- Use the same vocabulary as the respondents

Please elucidate you reasons for high propensity to
save

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Developing questions

Desirable question attributes

■ Simplicity

- Grammatically simple questions are easier to understand

What is your opinion of shoppers who upon purchasing the product which they might have read in a review article written by an inexperienced users get disenchanted with it and wish to return it back?

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Developing questions

Points to avoid

■ Unstated criteria

- Criteria must be obvious or explicitly stated.
How important is it for campus security to check ID's?

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Developing questions

Points to avoid

■ Inapplicable question

- Not everyone has the same experience
When riding on the back of a motorcycle, would you prefer to wear a helmet?

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Developing questions

Points to avoid

■ Restrictive framing example

- A common question should not have a specific example
What back-to-school supplies, like pens and pencils, have you purchased?

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Developing questions

Points to avoid

- Taxing recall
 - Many things are difficult to remember
 - How many letters of recommendation did you write for your students?

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Developing questions

Points to avoid

- Over generalization
 - When it is necessary, provide a reference
 - When you eat at the Alumni Cafeteria, what percent of the time do you order a hamburger?

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Developing questions

Points to avoid

- Over specification
 - People may not remember the precise answer
 - When you saw Rambo in a movie theater, how many rows were in front of you?

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Developing questions

Points to avoid

- Overstatement
 - Respondents may be influenced by the extreme statements
 - Will you consider buying Polaroid sunglasses to protect your eyes against blindness caused by the UV radiation from the Sun?

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Developing questions

Points to avoid

- **Ambiguity**
 - Words may have different meanings
About what time do you get up?

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Developing questions

Points to avoid

- **Double-barreled questions**
 - One issue per question.
Do you prefer small, economy cars over large, expensive cars?

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Developing questions

Points to avoid

- **Leading questions**
 - Questions should be neutral to receive correct answers
Don't you see any danger in having too many homework assignments?

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Developing questions

Points to avoid

- **Loaded questions**
 - You can get any answer if you load your questions
Do you favor keeping the current speed limits to save lives?

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Questionnaire design

Structure

- Opening questions
 - Gain cooperation
 - Screen respondents

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Questionnaire design

Structure

- Transition questions
 - More closely related to the research topic
 - More detailed than opening questions

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Questionnaire design

Structure

- Middle portion
 - Complicated questions, scales, ratings, etc.
 - Difficult to answer questions, judgements, values, etc.

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Questionnaire design

Structure

- Final segment
 - Personal questions
 - Demographics
 - Sensitive issues

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Questionnaire design

Sequencing

■ The funnel approach

Move from general to specific

■ The work approach

Move from lighter to heavier work (effort) for the respondent

■ The sections approach

Use topical sections that group related questions together

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Sample Questions

What is wrong with this question?

- How many individual hotel reservations do you make each month (check one)

1-3

7-10

16-20

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Sample Questions

What is wrong with this question?

- Who selects the hotels most of the time?
(Check one)

Myself

Travel agent

Corporate Policy

Traveler

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Sample Questions

What is wrong with this question?

- Do you believe it's time to fight for a National Gun Policy including common-sense laws like the Brady Bill and a ban on assault weapons?

Yes

No

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Sample questions

What is wrong with this question?

- The latest FBI statistics reveal a staggering 14% increase in the number of handgun killings between 1990 and 1991. How concerned are you about the escalating gun violence in this country?

I am extremely concerned and want to help end it.

I am concerned, but feel I can't do anything about it.

I'm not concerned.

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Sample questions

What is wrong with this question?

- According to the police, certain guns and gun accessories are used primarily in crime (not for law enforcement, sport or self protection.) Are you concerned about the growing menace from military-style, semi-automatic assault weapons like the UZI and the AK-47 and from gun add-ons like "high-capacity drum" magazines that can hold 75-90 rounds of ammunition at a time?

Yes, I am very concerned

I'm not concerned

Undecided

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