

Sensitivity of Measures of the DV

- The measure of the DV should be sensitive enough to detect changes caused by the IV.
 - A *ceiling effect* is when the IV appears to have no effect because participants are already responding so well they couldn't get any better when the IV is introduced.
 - A *floor effect* is when responding is so low that the IV could not lower it any further and therefore looks ineffective.

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Application Questions

Read questions #1 and #3 on page 185 and prepare to answer the following questions.

1. Give the independent and dependent variables
2. Was the manipulation straightforward or staged?
3. Was the DV a self-report, behavioral or physiological measure?
4. How could "sensitivity of measures" be related to the outcome?

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Multiple Measures

- Why use more than one measure?
 - Often a variable is best described as a collection of measures (both behavioral and physiological).
 - Changes in one measure might not adequately reflect the full effect of the IV, therefore more measures are needed to assess the effects on several behaviors.
- The cost of measures often limit their use.
- Measures should not violate ethical guidelines of confidentiality and privacy.

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Experimental Control

- The function of a control group is to eliminate a variety of alternative explanations for changes in the dependent variable (such as the various threats to internal validity).
- Control groups also help assess the amount of change related to **participant expectations**.
 - Demand characteristics are features of the experiment that might change participant responses.
 - Placebo groups are special control groups used in drug experiments. These groups get only fake drugs.

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