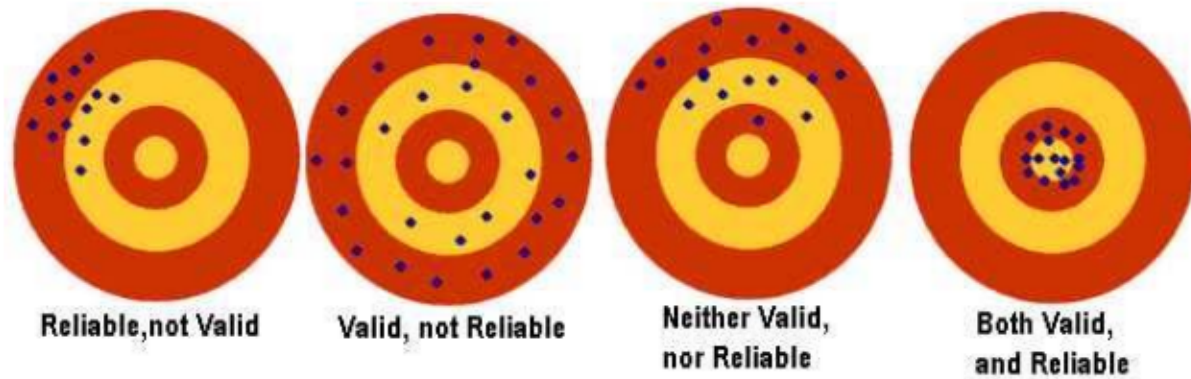


## Survey Validity and Reliability

How do I know that my district's Kansas Communities That Care (KCTC) data is valid and reliable?



**Validity** is concerned with the accuracy of measurement. There are many types of validity. Three important types are internal, external and content.

**Internal validity** asks whether the survey questions measure what is intended to be measured and if results are accurate or can be evaluated against a desired outcome.

- ❖ Some people have suggested that the results of the KCTC survey can't be valid because "kids don't answer honestly" or they "mark answers without reading the questions". But, in reality, there are three validity checks built into the survey that can identify responses that are not honest or patterns that demonstrate lack of attention to the survey questions. Evidence of false reporting can include:
  - Students indicated that they were not honest at all in completing the survey;
  - Students indicated they had used a non-existent drug; or
  - Students reported unrealistically frequent use of substances.
- ❖ Each year, only 4-5% of surveys are found to be invalid and are not included in analyses.
- ❖ Accuracy can also be enhanced when districts stress the value and importance of the survey to administration and teachers and when teachers follow the administration script and protocol.
- ❖ Another way to ensure valid and accurate results is to assure students that the survey is voluntary, anonymous and confidential. Students need to know that no one will see their answers and that there is no way a survey can be traced back to any individual student.

**External validity** refers to the degree to which a sample is representative of or can be generalized to the larger population.

- ❖ The KCTC uses a census approach, meaning results reflect only those students who participate in the survey. Therefore, participation rates per grade, building, and district must be high in order for data to be reflective of the grouping it represents.

- ❖ The KCTC survey has been administered annually free of charge to Kansas school districts since 1994-95. One strength of this longevity is the ability to look at trends in youth behavior and attitudes over time.
- ❖ **Most fluctuations in data that bring about questions regarding validity are the result of inconsistent or low participation rates.**

**Content validity** refers to the appropriateness of the content of an instrument. In other words, do the questions accurately assess what you want to know?

- ❖ The Communities That Care survey was developed by prevention science researchers at the University of Washington. Content validity has been statistically proven through factor analysis of each question's contribution to the risk and protective factor scale it represents. Decades of research have reinforced the validity of the survey's measures.

**Reliability is concerned with the consistency of the measurement over time;** the degree to which the questions used in a survey elicit the same type of information each time they are used under the same conditions.

- ❖ The KCTC has proven to be very reliable over time. Results obtained by the KCTC are similar to results obtained when compared with other student surveys measuring substance use and mirror trends reported at the national level.
- ❖ Risk and protective factors are correlated with problem behaviors in the expected direction. For example, a study of Kansas youth showed KCTC risk factors were associated with increased use of alcohol and marijuana. Additionally, higher levels of risk factors reported by students in a school were associated with lower average reading and math achievement test scores.
- ❖ Longitudinal data show consistent responding among youth, which provides evidence of high reliability.

**What if I have additional questions about the KCTC validity and reliability?**

Please contact:

Lisa Chaney  
 Director of Research & Evaluation  
 SEK Education Service Center, Greenbush  
 lisa.chaney@greenbush.org  
 620-724-6281

