

# Constructed Response In The Classroom



# Objectives

- Become familiar with constructed response in the law
- Understand the meaning of constructed response
- Review open-response questions
- Know when to assess using short-answer or open-response questions
- Practice writing short-answer questions for a Kentucky core Academic Standard
- Identify strategies to help students respond to short-answer and open-response questions

# Introduction

In 2009, Kentucky legislators passed Senate Bill 1, which brought many changes to education. One of those changes was to overhaul the state assessment system, including the types of questions to be used to assess students. Beginning with the 2011-2012 school year, constructed response questions will be part of the state assessment.

# The Law

## KRS 158.6453

- (1) (b) *"Constructed response or performance based items" means individual test items that require the student to create an answer rather than select a response and may include fill-in the blank, short-answer, extended answer, open-response, and writing on demand formats;*
- (5) *The state student assessments to be implemented in the 2011-2012 academic year shall include the following components:*
- (d) *The criterion-referenced components required in this subsection shall be composed of constructed response items and multiple choice items and the national norm-referenced components shall be composed of multiple choice items;*

# What are Constructed Response Questions?

*Constructed-response questions are assessment items that ask students to apply knowledge, skills, and critical thinking abilities to real-world, standards-driven performance tasks. Constructed-response questions are so named because there is often more than one way to correctly answer the question, and they require students to “construct” or develop their own answers without the benefit of any suggestions or choices.*

*(Tests That Teach by Karen Tankersly)*

# What are Constructed Response Questions?

Constructed response questions include extended-response\*, open-response, fill in the blank, and short answer.

Here are some characteristics of constructed response questions.

## **Constructed response prompts:**

- Can use authentic, real-world situations or stimuli.
- Can include maps, charts, graphs, timelines, reading passages, etc.

## **Constructed response questions can assess:**

- Content knowledge.
- Application-level skills.
- One broad standard.
- Several specific standards.

## **Constructed response answers:**

- Are based on knowledge.
- Can be simple, requiring students to fill in the blank or answer in one or two sentences.
- Can be complex, requiring students to answer in multiple paragraphs, create graphs, charts, or maps by processing information, or develop a solution for a problem.
- Can require high-level thinking by having students analyze, synthesize, or evaluate information.
- If complex, are scored using a rubric, allowing for no credit, partial credit, or full credit for answering the question. The rubric should include examples to allow for scoring consistency.

*\*Extended constructed-response questions are lengthier and more complex exercises that allow for a finer level of discrimination in scoring the responses.*

# Myth Buster #1

- Kentucky's new assessment will include constructed response questions, not open-response questions.

Myth—Kentucky's new assessment will include constructed response questions, which includes open-response.

# Myth Buster #2

- Rubrics are used to score some constructed response answers.

True



# Myth Buster #3

- Sometimes constructed-response questions offer students suggestions for answers.

Myth—Constructed response questions do not offer suggested answers.

# Myth Buster #4

- Constructed response questions only assess broad standards.

Myth—Can assess a broad standard or specific standards.

# Myth Buster #5

- Constructed response questions can be simple or complex.

True

# Open-Response Question Review

There are three overall types of writing and every school's instructional program should include each:

- Writing to learn
- Writing to demonstrate learning or communicate knowledge (*open-response is this type*)
- Writing for Publication

## OPEN-RESPONSE

Assesses a student's ability to apply concepts and/or processes in a new situation based on the state standards learned.

Contains a focus statement, scenario, or lead-in.

Includes at least one content-related task using higher-level verbs. (The verbs should come from the higher levels on Bloom's Taxonomy: Application, Analysis, Synthesis, and/or Evaluation.)

Allows for at least two possible answers or different ways to show the work for the answer or solve the problem.

Assesses higher-level use of content/concepts, but does **NOT** assess the student's use of grammar or mechanics or writing style.

Answers may include bullets, lists, diagrams, etc. and whatever else is helpful in communicating knowledge. These are all acceptable responses to open-response questions.

Can be completed in 15-20 minutes using one page.

Is scored using a teacher-designed scoring guide.

# Types of Open Response Questions

1. Scaffolded
2. Single Dimension/Component
3. Two or More Relatively Independent Components
4. Student Choice: Topics/Options Provided
5. Response to Provided Information

# Scaffolded

- Sequence of tasks increasingly more difficult/complex
- Success on one part would likely mean there was success on all previous parts
- Multipart (simple to complex)

# Single Dimension/Component

- Straight-forward question
- Draw a conclusion or take a position, then support it with explanation, examples, evidence
- Explain a phenomenon or describe procedures



# Two or More Relatively Independent Components

- Fairly independent questions addressing the same content
- Contains multiple parts (A,B,C,etc.)

# Student Choice: Topics/Options Provided

- Choose from the provided options

# Response to Provided Information

- Response to provided information such as data, graphics, or informational reading

# Types of Open-Response Questions

1. The students in Mrs. Spalding's class are planning a fall party. There are 29 students in the class. They have decided to have lemonade, orange soda, and colas to drink. They will give the first person lemonade, the second orange soda, and the next two students will receive a cola each. This pattern continues.
  - B. Create a table to show the Party Drink Pattern.
  - C. What will the 29<sup>th</sup> student receive to drink?
  - D. How many of each type of drink will they need?
  - E. How did your table help you answer the question?

**Scaffolded**

# Types of Open-Response Questions

2. To increase students' endurance, your P.E. teacher has designed an exercise program to increase the number of jumping jacks your class will be doing each week. The first week the class will be doing 32 jumping jacks. The second week they will be doing 35, and the third week they will be doing 38.

If the pattern continues, what week will the class be doing 50 jumping jacks? Explain how you determined your answer.

**Single Dimension/Component**

# Types of Open-Response Questions

3. You want to find out how water temperature affects the movement of goldfish.
  - A. Write a hypothesis for your investigation.
  - B. Identify the variables you will control in your experiment and the variable you will change and explain why it is important to control variables?
  - C. Identify a problem in your life that could be solved using the scientific method.

**Two or More Relatively Independent Components**

# Types of Open-Response Questions

4. The map below shows several regions where major cities developed. Use the map to answer questions.

*(map would be provided)*

- a. Explain why these cities developed in these areas.
- b. Identify two of the four cities by number and then discuss a major industry of each.

**Response to Provided Information and Two or More Relatively Independent Components**

# Types of Open-Response Questions

5. There are many important issues facing the people of the United States today. Select two of the issues or problems from the list below and explain several ways that each issue could be addressed. Include in your explanation the important pros and cons for each.

- Budget Deficit
- Urban Development
- Pollution of the Environment
- Illegal Immigration

**Student Choice**



# What's New—Short-Answer Response Questions

**Factual short-answer questions** ask the student to perform tasks such as describe, define, calculate, etc. They usually don't require an explanation, but it doesn't hurt to provide one to show a thorough understanding.

Verbs often found in factual short-answer questions include:

- Define
- Name
- Give
- Outline
- Identify
- Provide
- List
- State

# What's New—Short-Answer Response Questions

**Interpretive short-answer questions** ask students to apply their knowledge. If the answer requires several sentences, it is important to plan the answer.

Verbs associated with interpretive short-answer questions include:

- Account for
- Discuss
- Explain
- Illustrate
- Distinguish
- Compare
- Contrast
- Describe
- Elaborate on

Some short-answer questions can be combined – factual and interpretive. In this case, usually the first part of the question is factual and the second part is interpretive.

# What's New—Short-Answer Response Questions

## Other characteristics of short-answer questions:

- Can begin with a brief prompt or stem
- Can be answered in about five minutes
- Can require an answer that includes phrases, a few sentences, a graph or chart, etc.
- Require concise, focused answers, yet thorough and complete
- Avoid trivia
- Include direct questions
- Include specific problems
- Reduce the possibility of guessing

# What's New—Short-Answer Response Questions

## Similarities between open-response and short-answer questions.

1. Still explaining
2. Still using a rubric
3. Students must apply what they know.
4. Both give a stem or story prompt.

# What's New—Short-Answer Response Questions

**Differences between an open response and short answer questions.**

1. Short answer is more straightforward

# What's New—Short-Answer Response Questions

## Implications for Instruction

1. More like an exit slip
2. We've conditioned our kids to be lengthy and thorough....now it needs to be thorough, but concise.

# Short-Answer/Open-Response— Which one do I use?

## Short answer questions

- ✓ Typically require students to recall, rather than recognize information
- ✓ Sometimes require students to apply knowledge
- ✓ They can usually be answered within five minutes

# Short-Answer/Open-Response— Which one do I use?

## Open-Response Questions

- ✓ Require students to demonstrate and apply knowledge
- ✓ Can take about 20 minutes to answer



# Short-Answer/Open-Response— Which one do I use?

We can use Bloom's Taxonomy to guide which type of question to use to assess the identified standard or target.

Question Type	Bloom's Level's
Short-answer	Remembering Understanding Applying
Open-Response	Applying Analyzing Evaluation Creating

**ACTIVITY: Short-answer or Open-response?**

- With a partner, read the target.
- Decide whether you would write a short-answer or open-response question to assess it.
- Be ready to share answers with the group.

STANDARD OR TARGET	SA or OR
1. Identify key details and examples in a text.	<input type="checkbox"/> Short Answer <input type="checkbox"/> Open Response
2. Analyze context to determine which kind of ratio is represented.	<input type="checkbox"/> Short Answer <input type="checkbox"/> Open Response
3. Formulate an objective summary that includes how the central idea: Emerges, is shaped, is refined by specific details	<input type="checkbox"/> Short Answer <input type="checkbox"/> Open Response
4. Recognize that a question requires an answer.	<input type="checkbox"/> Short Answer <input type="checkbox"/> Open Response
5. Illustrate and explain calculations by using written equations, rectangular arrays, and/or area models.	<input type="checkbox"/> Short Answer <input type="checkbox"/> Open Response
6. Calculate unit conversions.	<input type="checkbox"/> Short Answer <input type="checkbox"/> Open Response
7. Define irrational numbers.	<input type="checkbox"/> Short Answer <input type="checkbox"/> Open Response
8. Compare and contrast historical portrayal of a: time place or character (person) in an historical account to how each are portrayed or altered in a literary work.	<input type="checkbox"/> Short Answer <input type="checkbox"/> Open Response

*\*\*\*\*\*Some of these targets could also be assessed by multiple-choice questions, but our focus today is on short-answer and open-response questions.*

# Steps to Writing Constructed Response Questions

1. Review characteristics of short-answer and open-response questions.
2. Identify the standard or target you want to assess.
3. Identify the power verb in the standard or target. (*You want to make sure your question is at least as rigorous as the standard or target.*)
4. Decide which type of question (short-answer or open-response) will best assess the standard or target.
5. Write the question.
6. Write 2-point (short-answer) or 4-point (open-response) model response.

# How to Answer--Strategies

- Recognize and circle/underline verbs
- Use Short answer questions as exit slips
- Restate the question
- “I know this because...”
- Pre-write your plan
- Review response to determine if the question was answered
- Identify the type of question