

# Reasoning Guide



## What Is a Reasoning Guide?

A Reasoning Guide (Herber 1978) is another great tool for students to broaden their thinking about a particular content. The Reasoning Guide offers statements, prompts, questions, or facts that give students opportunities to apply both open and closed reasoning to content materials. *Closed reasoning* statements or prompts are directly related to the content. In these statements, students focus on both literal and interpretative levels, but their reasoning is bound by the content. By contrast, *open reasoning* statements are more “content-free”; they represent generalizations or ideas that go beyond the content. In our Alzheimer’s sample, students in a science class can register their opinions before reading, then draw conclusions based on facts and opinions after reading.

## Why Should I Use Reasoning Guides with My Students?

The Reasoning Guide is intended to set up a situation where students have to reason about the content. In doing so, they are forced to think more comprehensively and critically about the material. This tool can be used with all students by modifying the sophistication of the statements and the content. Reasoning Guides stimulate discussion, foster understanding through comparison, and provide students with opportunities to connect and apply their understanding of the content to other parts of their lives. For me, the most significant aspect of a Reasoning Guide is that it allows students to discover for themselves the big ideas, critical elements, and universal truths of a particular content. Rather than foster the belief that content is to be memorized, a Reasoning Guide moves students to analyze, synthesize, and apply information to other texts and their lives.

## How Does It Work?

1. Think about the content you want students to encounter. What information and understanding of big ideas or concepts do you want students to grapple with as they study this content?
2. Decide whether you want students to use the Reasoning Guide prior to reading the content, after reading the content, or at both times.
3. Write declarative statements that would help students make connections between the content and the big questions, ideas, and enduring understandings you want them to think about and acquire.
4. Decide on a format for students’ responses to these statements: agree/disagree; matching quotes to applications; true or false based on inferences; fact or opinion; missing or evident from content; related or unrelated, etc. The appendix contains a blank fact/opinion guide, but you can format your guide to suit the class’s needs.
5. Choose a procedure for completing the guide. Students can complete the Reasoning Guide independently, then work in pairs or groups to share their reasoning, or they can collaborate as they respond to the guide. Provide specific directions; each Reasoning Guide might differ in terms of what students will do.
6. Give students the opportunity to work collaboratively to share responses, reactions, and reasoning. Move from group to group to note any misunderstandings or gross misrepresentations of content.
7. Debrief the activity by highlighting some of the ideas, information, and patterns of reasoning you noted. You probably

### Reasoning Guide: Alzheimer’s Disease

When reading nonfiction, it is critical that you know the difference between facts and opinions. Read each of the statements below before reading the article “Vitamin C, E Supplements May Curb Alzheimer’s.” For each statement, indicate whether you predict this statement is a fact or an opinion by marking an x in the left-hand column. In the space provided, note your reasons for believing the statement to be fact or opinion. After reading, return to the statements and note whether the content of the article showed the statement to be fact, opinion, or neither.

Fact	Opinion	Statement	Fact	Opinion	Neither
_____	_____	1. The search for a cure for Alzheimer’s is urgent: <b>My reasoning:</b>	_____	_____	_____
_____	_____	2. If you take vitamins C and E, you won’t get Alzheimer’s. <b>My reasoning:</b>	_____	_____	_____
_____	_____	3. Researchers are certain about the dosage of vitamins necessary to keep from getting Alzheimer’s. <b>My reasoning:</b>	_____	_____	_____
_____	_____	4. Researchers know what causes Alzheimer’s. <b>My reasoning:</b>	_____	_____	_____
_____	_____	5. Alzheimer’s is more likely to affect men than women. <b>My reasoning:</b>	_____	_____	_____
_____	_____	6. Antioxidants keep Alzheimer’s from getting to the brain. <b>My reasoning:</b>	_____	_____	_____
_____	_____	7. Vitamins might help protect the brain against degenerative diseases. <b>My reasoning:</b>	_____	_____	_____

won’t want to talk about every statement with the entire group; instead, choose one or two that merit further discussion of content or that demonstrate successful processes of reasoning related to the content.

## In the Classroom

I began creating reasoning guides early in my teaching career. It was the early 1970s and students had lots of opinions but frequently lacked either the background knowledge or reasoning to support, argue, or challenge those opinions. The next guide I have included is the first Reasoning Guide I created. We were reading *The Crucible* (Miller 1953), and I wanted students to think carefully about the elements that lead to mob mentality and the effects on society and individuals.

### Reasoning Guide: *The Crucible*

Being able to support your opinions with evidence from sources is critical in getting people to listen to your opinions. As we read *The Crucible*, you will notice that mob mentality plays a part in the deaths and destruction that occurred during the Salem witch trials. For each of the quotes or statements listed below, indicate whether you think this could have led to the mob mentality, came as a result of the mob mentality, or was unrelated to the mob mentality that led to the outcome of the Salem witch trials. List the reasoning behind your opinion after each statement.

Led to Mob Mentality	Resulted from Mob Mentality	Unrelated to Mob Mentality	Quotes/Statement
_____	_____	_____	1. Reverend Parris: “There is a faction that is sworn to drive me from my pulpit.” <b>My reasoning:</b>
_____	_____	_____	2. Elizabeth: “She wants me dead, John, you know it!” <b>My reasoning:</b>
_____	_____	_____	3. Parris: “You will confess yourself or I will take you out and whip you to your death, Tituba!” <b>My reasoning:</b>
_____	_____	_____	4. Mary Warren: “I cannot, they’ll turn on me—” <b>My reasoning:</b>

## Research/Origins

Herber, H. L. 1978. *Teaching Reading in Content Areas*. 2nd ed. Englewood Cliffs, NJ: Prentice Hall.

## References/Further Reading

- Fackelmann, K. 2004. “Vitamin C, E Supplements May Curb Alzheimer’s.” *USA Today*, January 19.
- Miller, A. 1953. *The Crucible*. New York: Penguin Books USA.