



13TH EDITION

# LOGIC & CONTEMPORARY RHETORIC

*The Use of Reason in Everyday Life*

FRANK BOARDMAN • NANCY CAVENDER • HOWARD KAHANE



# Logic and Contemporary Rhetoric

The Use of Reason in Everyday Life

THIRTEENTH EDITION

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**Logic and Contemporary  
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in Everyday Life, Thirteenth  
Edition**

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To Ellie, Lisa, and John



# Contents

Preface ix

## CHAPTER 1 GOOD AND BAD REASONING 3

- 1 Reasoning and Arguments 4
- 2 Exposition and Argument 6
- 3 Arguments vs. Explanations 6
- 4 What Does “Winning an Argument” Mean? 7
- 5 Cogent Reasoning 8
- 6 Two Basic Kinds of Valid Arguments 11
- 7 Some Wrong Ideas About Cogent Reasoning 13
- 8 Background Beliefs 15
- 9 Kinds of Background Beliefs 16
- 10 Worldviews or Philosophies 17
- 11 Insufficiently Grounded Beliefs 19
- 12 Two Vital Kinds of Background Beliefs 21
- 13 Science to the Rescue 22
- Summary of Chapter 1 25

## CHAPTER 2 MORE ON DEDUCTION AND INDUCTION 37

- 1 Deductive Validity 37
- 2 Deductive Invalidity 40
- 3 Conditional Statements 40
- 4 Syllogisms 42
- 5 Indirect Proofs 44
- 6 Tautologies, Contradictions, and Contingent Statements 45

- 7 Inductive Validity (Correctness) and Invalidity (Incorrectness) 45
- 8 A Misconception About Deduction and Induction 49
- 9 Reasoning Cogently Versus Being Right in Fact 50
- Summary of Chapter 2 51

### CHAPTER 3 FALLACIES: QUESTIONABLE PREMISES 57

- 1 Appeal to Authority 58
- 2 Inconsistency 63
- 3 Straw Man 67
- 4 False Dilemma and the Either-Or Fallacy 68
- 5 Begging the Question 69
- 6 Questionable Premise—Questionable Statement 71
- 7 Suppressed (Overlooked) Evidence 72
- 8 Tokenism 74
- Summary of Chapter 3 75

### CHAPTER 4 FALLACIES: INVALID INFERENCES 83

- 1 Ad Hominem Argument 83
- 2 Guilt by Association 84
- 3 Two Wrongs Make A Right 85
- 4 Appeal to Tradition or Popularity 87
- 5 Irrelevant Reason (Non Sequitur) 88
- 6 Equivocation 90
- 7 Appeal to Ignorance 91
- 8 Appeal to Pity or Fear 93
- 9 Composition and Division 94
- 10 Slippery Slope 94
- Summary of Chapter 4 96

### CHAPTER 5 FALLACIES: MISUSING INDUCTION 105

- 1 Hasty Conclusion 105
- 2 Small Sample 106
- 3 Unrepresentative Sample 108
- 4 Questionable Cause 109
- 5 Questionable Analogy 113



- 6 Questionable Statistics 115
- 7 Questionable Uses of Good Statistics 117
- 8 Polls: An Important Special Case 119
- 9 False Charge of Fallacy 122
- Summary of Chapter 5 124

## CHAPTER 6 PSYCHOLOGICAL IMPEDIMENTS TO COGENT REASONING: SHOOTING OURSELVES IN THE FOOT 137

- 1 Loyalty, Provincialism, and The Herd Instinct 138
- 2 Prejudice, Stereotypes, Scapegoats, and Partisan Mind-Sets 140
- 3 Superstitious Beliefs 146
- 4 Wishful Thinking and Self-Deception 147
- 5 Rationalization and Procrastination 149
- 6 Other Defense Mechanisms 154
- 7 The Benefits of Self-Deception, Wishful Thinking, and Denial 156
- 8 The Pull of Pseudoscience and the Paranormal 159
- 9 Lack of A Good Sense of Proportion 161
- Summary of Chapter 6 164

## CHAPTER 7 LANGUAGE 169

- 1 Cognitive and Emotive Meanings 169
- 2 Emotive Meanings and Persuasive Uses of Language 170
- 3 Ambiguity and Vagueness 177
- 4 Other Common Rhetorical Devices 181
- 5 Language Manipulators 186
- 6 Some Subtle Issues 193
- 7 Language Revision 197
- Summary of Chapter 7 201

## CHAPTER 8 EVALUATING EXTENDED ARGUMENTS 209

- 1 The Basic Tasks of Essay Evaluation 210
- 2 The Margin Note and Summary Method 216
- 3 Extended Evaluation of an Argument 217
- 4 Dealing with Value Claims 222
- 5 Evaluating Ironic Works 225
- Summary of Chapter 8 225

<b>CHAPTER 9</b>	<b>WRITING COGENT (AND PERSUASIVE) ESSAYS</b>	<b>237</b>
	1 The Writing Process	238
	2 Preparing to Write	238
	3 Writing the Essay	239
	4 Supporting Reasons Effectively	243
	Summary of Chapter 9	249
<b>CHAPTER 10</b>	<b>ADVERTISING: SELLING THE PRODUCT</b>	<b>259</b>
	1 Are Advertisements Arguments? Examples of Rhetoric?	260
	2 Promise and Identification Advertisements	261
	3 Things to Watch Out for in Advertisements	262
	4 The Upside of Ads	272
	5 Targeted Advertising and Big Data	273
	6 Political Advertising	274
	Summary of Chapter 10	284
<b>CHAPTER 11</b>	<b>MANAGING THE NEWS</b>	<b>293</b>
	1 The Media and the Power of Money	295
	2 News-Gathering Methods Are Designed to Save Money	307
	3 News Reporting: Theory and Practice	309
	4 Devices Used to Slant the News	316
	5 Television and the Internet	321
	6 The Non-Mass Media to the Rescue	324
	7 News Media Concentration	326
	Summary of Chapter 11	330
<b>CHAPTER 12</b>	<b>NEW MEDIA, CYBERCULTURE, AND PUBLIC DISCOURSE</b>	<b>339</b>
	1 Discourse in a Digital Age	342
	2 Privacy, Celebrity, and Anonymity	350
	3 Speaking Directly to the Public	352
	4 Using and Misusing Mass Communication	355
	Summary of Chapter 12	356



**CHAPTER 13 ARGUMENT AND RHETORIC IN FICTION 361**

- 1 Fictions as Arguments 362
- 2 The Persuasive Power of Fiction 368
- 3 The Downsides to Fiction's Power to Persuade 372
- 4 Rhetoric in Various Forms of Storytelling 373
- Summary of Chapter 13 380

**APPENDIX MORE ON COGENT REASONING 382**

- 1 More on Cause and Effect 382
- 2 Scientific Method 383
- 3 Criteria for Theory Selection 386
- 4 Calculating Probabilities and Fair Odds 388

- Answers to Starred Exercise Items 394
- Bibliography 402
- Glossary 412
- Index 418

# Preface



*I do not pretend to know what many ignorant men are sure of.*

—CLARENCE DARROW

*To know that we know what we know, and that we do not know what we do not know. That is true knowledge.* —HENRY DAVID THOREAU

*We have met the enemy and he is us.* —WALT KELLY'S "POGO"

*Education is not simply the work of abstract verbalized knowledge.*

—ALDOUS HUXLEY

*Many people would sooner die than think. In fact, they do.* —BERTRAND RUSSELL

*You can fool too many of the people too much of the time.*—JAMES THURBER



Our loftiest ambition for the thirteenth edition of *Logic and Contemporary Rhetoric* is that it should encourage responsible and meaningful engagement in public discourse. *Responsible* engagement requires reason above all else, and so much of the text is devoted to introducing proper methods of identifying, analyzing, evaluating, and making arguments. *Meaningful* engagement requires an understanding of the actual state of rhetoric today, and so the text also focuses on some of the primary contexts of persuasion and argument in our daily lives.

The need is great and the moment is critical. We are faced with seemingly constant changes to the technology and norms of mass communication, just as social and political life is becoming more divided, more vitriolic, and less constrained by reason. We offer *Logic and Contemporary Rhetoric* as both a guide and an antidote to this condition.

The text contains examples and exercise items drawn from a broad range of sources—newspapers, websites, social media, film, television, advertisements, literature, political speeches, newspaper columns, and so on. Students get to sharpen their ability to think critically by reasoning about important topics and issues: Internet ethics, political trends, media biases, economic downturns, steroid abuse, and government doublespeak, to name just a few.

It quotes from or refers to writings and comments of Aristotle, Bertrand Russell, Barack Obama, Jerry Seinfeld, Ralph Ellison, Winston Churchill, Ann Coulter, Jane Austen,



Rush Limbaugh, Jonathan Swift, Fyodor Dostoevsky, Pliny the Elder, Donald Trump, William Shakespeare, Kwame Anthony Appiah, and a host of others. The text is sprinkled with relevant cartoons from the *New Yorker*, the Sunday papers, and the Internet. The trademarks of *Logic and Contemporary Rhetoric* always have been, and still are, ease of comprehension and up-to-date, interesting material. Textbooks need not be dull!

All this is done to sharpen students' abilities to think critically so that they can avoid being manipulated by the media, the advertisers, the political system, and a host of con artists—and ultimately to help them function independently and responsibly in our increasingly complex, challenging society.

The Instructor's Companion Site features an Instructor's Manual that provides useful suggestions for lectures and classroom activities, based directly on the content in this book. It also includes PowerPoint Lecture Slides offering a breakdown of the key points in each chapter. Interested instructors can find and access this content by adding the thirteenth edition of this book to their bookshelf on Cengage.com.

This edition is also accompanied by a digital solution for students and instructors: **MindTap for Philosophy: Logic and Contemporary Rhetoric**, a personalized, online digital learning platform providing students with an immersive learning experience that builds critical thinking skills. Through a carefully designed chapter-based learning path, MindTap allows students to easily identify the chapter's learning objectives; draw connections and improve writing skills by completing essay assignments; read short, manageable sections from the eBook; and test their content knowledge with critical thinking Aplia™ questions.

- **Chapter eBook:** Each chapter within MindTap contains the narrative of the chapter, offering an easy-to-navigate online reading experience.
- **Chapter Quiz:** Each chapter within MindTap ends with a summative Chapter Test covering the chapter's learning objectives and ensuring students are reading and understanding the material presented.
- **Chapter Aplia Assignment:** Each chapter includes an Aplia assignment that provides automatically graded critical thinking assignments with detailed, immediate feedback and explanations on every question. Students can also choose to see another set of related questions if they did not earn all available points in their first attempt and want more practice.
- **KnowNOW! Philosophy Blog:** The KnowNOW! Philosophy Blog connects course concepts with real-world events. Updated twice a week, the blog provides a succinct philosophical analysis of major news stories, along with multimedia and discussion-starter questions.

MindTap also includes a variety of other tools that support philosophy teaching and learning:

- The Philosophy Toolbox collects tutorials on using MindTap and researching and writing academic papers, including citation information and tools, that instructors can use to support students in the writing process.
- Questia allows professors and students to search a database of thousands of peer-reviewed journals, newspapers, magazines, and full-length books—all assets can be added to any relevant chapter in MindTap.
- ReadSpeaker reads the text out loud to students in a voice they can customize.
- Digital flashcards are premade for each chapter, and students can make their own by adding images, descriptions, and more.

MindTap gives students ample opportunities for improving comprehension and for self-evaluation to prepare for exams, while also providing faculty and students alike a clear way to measure and assess student progress. Faculty can use MindTap as a turnkey solution or customize by adding YouTube videos, RSS feeds, or their own documents directly within the eBook or within each chapter's Learning Path. MindTap goes well beyond an eBook and a homework solution. It is truly a personal learning experience that allows instructors to synchronize the reading with engaging assignments. To learn more, ask your Cengage Learning sales representative for more information, or go to [www.cengage.com/mindtap](http://www.cengage.com/mindtap).

## New to the Thirteenth Edition

The principal changes in this edition are these:

1. Two entirely new chapters: one on changes to public discourse brought about by the emergence of cyberculture and new media (Chapter 12), and another on the argumentative and rhetorical function of fictional narratives (Chapter 13). The primary goal of both of these chapters (along with those on advertising and the news) is to capture and have students confront the contexts of argument and other modes of persuasion with which they are most familiar.
2. Ten new sections in existing chapters:
  - Arguments vs. Explanations (Chapter 1)
  - What Does “Winning an Argument” Mean? (Chapter 1)
  - Conditional Statements (Chapter 2)
  - Guilt by Association (Chapter 4)
  - Appeal to Tradition or Popularity (Chapter 4)
  - Appeal to Pity or Fear (Chapter 4)
  - Vagueness and Ambiguity (Chapter 7)
  - Some Subtle Issues (concerning language, Chapter 7)
  - Are Advertisements Arguments? Examples of Rhetoric? (Chapter 10)
  - Criteria for Theory Selection (Appendix)
3. Numerous new subsections, case studies, and expanded discussions throughout the text, including:
  - The “reproducibility crisis” in social psychology (Chapter 1)
  - High-profile cases of concocted and fabricated news stories (Chapter 3)
  - Domains where appeals to authority are never permissible (Chapter 3)
  - The significance of new evidence to appeals to ignorance (Chapter 4)
  - Criteria for determining an adequate sample size (Chapter 5)
  - The practical dangers of scapegoating, denial, and partisan mindsets (Chapter 6)
  - Cultural insensitivity versus politically correct overreaction regarding sports teams' names and mascots (Chapter 7)
  - Analyzing arguments with claims that serve as both premises and conclusions (Chapter 8)
  - Diagramming argument structure (Chapter 8)
  - The role of generalizations and rules in moral argumentation (Chapter 8)

- Overcoming the difficulty of starting essays (Chapter 9)
  - Choosing claims that are neither too weak nor too strong (Chapter 9)
  - The challenges and art of rewriting well (Chapter 9)
  - Ads that create and exacerbate consumers' fears (Chapter 10)
  - Ads that rely upon and promote stereotypes (Chapter 10)
  - Push polls as advertisements (Chapter 10)
  - The decline of both local and international news coverage (Chapter 11)
  - The emergence of nonprofit newsrooms (Chapter 11)
4. Hundreds of new examples and exercises making the text more up to date and relevant to students, including updates to critical studies and stories featured in previous editions
  5. Revisions to some parts of the text that maintain the overall mission, tone, and style of past editions
  6. New cartoons chosen for both their wit and their relevance

## Organization of the Text

The thought that sparked the original organization of material in *Logic and Contemporary Rhetoric* way back in 1969–1970 was that student reasoning about everyday topics could be improved by acquainting them with a few basic principles of good reasoning and, in particular, by enlightening them concerning common ways in which people are taken in by fallacious arguments and reasoning in everyday life. But a close examination of the ways in which reasoning, in fact, goes wrong in everyday life shows that it does so in a majority of cases, first, because of a lack of sufficient (or sufficiently accurate) background information; second, because of the psychological impediments (wishful thinking, rationalization, prejudice, superstition, provincialism, and so on) that stand in the way of cogent reasoning; and third, because of a poor understanding of the nature and quality of the various information sources.

Taking account of this insight has resulted in a book that divides into eight parts, as follows:

1. *Good and Bad Reasoning*: Chapter 1 introduces students to some basic ideas about good and bad reasoning, the importance of having good background beliefs, in particular of having well-pruned worldviews, as well as some very rudimentary remarks about deduction and induction and the three overarching fallacy categories employed in Chapters 3, 4, and 5.
2. *Deduction and Induction*: Chapter 2 contains more detailed material on deductive and inductive validity and invalidity.
3. *Fallacious Reasoning*: Chapters 3, 4, and 5 discuss fallacious reasoning, concentrating on how to avoid fallacies by becoming familiar with the types most frequently encountered in everyday life. The point is to help students increase their ability to spot fallacious reasoning by discussing the most common types of fallacious argument and by providing students with everyday life examples on which to practice.
4. *Impediments to Cogent Reasoning*: Chapter 6 discusses wishful thinking, rationalization, provincialism, denial, and so on, and how to overcome them. It explains the attraction and mistaken nature of belief in the paranormal and other pseudosciences. In some ways, this is the most important chapter in the

book, because these skewers of rational thought so severely infect the thinking of all of us. (Some instructors may argue that the topic is more appropriately taught in psychology classes, not in classes primarily concerned with critical reasoning. But the reality here is that many students do not take the relevant psychology classes and that those who do often are provided with a purely theoretical account divorced from the students' own reasoning in everyday life, not with a "how-to" discussion designed to help them overcome these obstacles to rational thought.)

5. *Language*: Chapter 7 discusses the ways in which language itself can be used to manipulate meaning, for instance, via doubletalk and long-winded locutions. (This chapter also contains a section, not common in critical-thinking texts, on the linguistic revolution that has tremendously reduced the use of sexist, racist, and other pejorative locutions in everyday discourse; and it also has a few things to say about the use of politically correct [PC] locutions.)
6. *Evaluating and Writing Cogent Essays*: Chapter 8 deals with the evaluation of extended argumentative passages—essays, editorials, political speeches, and so on. Chapter 9 addresses the writing of these kinds of argumentative passages. (Instructors are urged not to pass over Chapter 9 and urged to have students write *at least* two argumentative papers during the semester. Writing is very likely the best way in which we all can learn to sharpen our ability to reason well. Writing is indeed nature's way of letting us know how sloppy our thinking often is. But it also is the best way to learn how to sharpen our ability to think straight.)
7. *Important Sources of Information, Argument, and Rhetoric*: Chapter 10 discusses advertising (singling out political ads for special scrutiny); Chapter 11, the news media; Chapter 12, the Internet and new media; and Chapter 13, fiction.
8. *More on Cogent Reasoning*: The appendix provides additional material on deduction and induction; cause and effect; scientific method; theory selection; and so on.

Note also that a section at the back of the book provides answers to selected exercise items. It should be remembered, however, that most of the exercise items in this text are drawn from everyday life, where shades of gray outnumber blacks and whites. The answers provided thus constitute author responses rather than definitive pronouncements. Similar remarks apply to the answers to the exercise items provided in MindTap.

## The Unique Nature of *Logic and Contemporary Rhetoric*

This book is unique among critical reasoning texts in bringing together all of these apparently diverse elements, in particular in stressing the importance of overcoming natural impediments to cogent reasoning; in bringing to bear good background information when dealing with everyday problems; and in so extensively discussing the most important information sources. In this complicated modern world, all of us are laypersons most of the time with respect to most topics; the ability to deal effectively with the

“expert” information available to us via the media, textbooks, the Internet, and periodicals—to separate wheat from chaff—thus is crucial to our ability to reason well about everyday problems, whether of a personal or of a social-political nature.

Although the text contains much discussion of theory, this is *not* a treatise on the theory of cogent and fallacious reasoning. Rather, it is designed to help students learn *how* to reason well and *how* to avoid fallacious reasoning. That is why so many examples and exercise items have been included—arranged so as to increase student sophistication as they progress through the book—and why exercises and examples have been drawn primarily from everyday life. Learning how to reason well and how to evaluate the rhetoric of others is a skill that, like most others, requires practice, in this case practice on the genuine article—actual examples drawn from everyday life.

This text provides students with a good deal more than the usual supply of exercise items, but perhaps the most important are those requiring them to do things on their own: find examples from the mass media, write letters to elected officials, do research on specified topics.

A true critical reasoning course, or textbook, is unthinkable in a closed or authoritarian society and antithetical to the indoctrination practiced in that kind of culture. The authors of this text take very seriously the admonition that eternal vigilance is the price of liberty. Citizens who think for themselves, rather than uncritically ingesting what their leaders and others with power tell them, are the absolutely necessary ingredient of a society that is to remain free.

## Acknowledgments

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Finally, this being my first time working on this text, I'd like to take the liberty of switching to the first-person-*singular* and thank some people who made my own participation possible: Samantha Boardman, my wife and research guru; Alan Hausman, my friend and mentor; and Sarah Edmonds, Debra Matteson, and Andrea Wagner at Cengage, and Valarmathy Munuswamy at Lumina Datamatics. Most of all, though, I need to thank Nancy Cavender. This text is brimming with her (and Howard Kahane's) talent, passion, and hard work. Her help on this edition has also been invaluable. I can only hope that I have done some justice to her great generosity and trust.

FRANK BOARDMAN  
Carlisle, Pennsylvania, and Brooklyn, New York

*What is the use of philosophy, if all it does is enable you to talk . . . about some abstruse questions of logic, etc., and if it does not improve your thinking about the important questions of everyday life?*

—Ludwig Wittgenstein



Chris Wildt/Cartoon Stock

"Great speech! But let's cut your carefully reasoned conclusion and insert an uplifting sports metaphor."

# Good and Bad Reasoning

*It's much easier to do and die than it is to reason why.* —H. A. STUDDERT KENNEDY

*Read not to contradict and confute, nor to believe and take for granted . . . but to weigh and consider.* —FRANCIS BACON

*You can lead a man up to the university, but you can't make him think.* —FINLEY PETER DUNNE

*You can lead me to college . . . but you can't make me think.* —SWEATSHIRT UPDATE SEEN AT DUKE UNIVERSITY

*Ignorance of reality provides no protection from it.* —HAROLD GORDON

*Reason is logic, or reason is motive, or reason is a way of life.* —JOHN LE CARRÉ

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There is much truth to the old saying that life is just one problem after another. That's why problem solving is one of life's major preoccupations. **Reasoning** is the essential ingredient in problem solving. When confronted with a problem, those of us who are rational reason from what we already know, or have good reason to believe, or can find out, to new beliefs useful in solving that problem. The trick, of course, is to reason well. This book is about good reasoning—about how to reason well in everyday life—whether dealing with personal problems or those of a social or political nature.

All of us like to think of ourselves as rational human beings, yet most of what we know is passed on to us by other people. We know, for instance, that the earth is round because we've been told it is, even though our intuition is that it is flat because we walk on flat surfaces every day. In fact, for centuries, nearly everyone believed it was flat until scientific evidence proved without question that it isn't. Much of what we think we know is based on beliefs, sometimes unsupported by accurate information, instilled in us from childhood on. And too often, beliefs collapse into gut reactions to all manner of issues—from gun

control to same-sex marriage to legalizing drugs. A gut reaction is not the same as a rational thought, however, nor is a belief, unless it has been examined for accuracy against conflicting ideas and evidence. Critical thinking, after all, requires information as well as the ability to reason well.

Fortunately, no one is an island. We all have available to us a great deal of knowledge others have gained through experience and good reasoning—accurate information and well-intended advice available to anyone who reaches out for it. Unfortunately, not all information is created equal. Charlatans and fools can speak as loudly as saints or geniuses. Self-interest often clouds the thinking of even the brightest individuals. The trick when evaluating the mountain of verbiage we all are exposed to is to separate the nourishing wheat from the expendable chaff. One way to become good at doing this is to think a bit about what makes reasoning good (cogent), as opposed to bad (fallacious).

## 1. Reasoning and Arguments

Here is a simple example of reasoning about the nature/nurture issue:

Identical twins often have different IQ test scores. Yet these twins inherit exactly the same genes. So environment must play some part in determining a person's IQ.

Logicians call this kind of reasoning an **argument**. In this case, the argument consists of three statements:

1. Identical twins often have different IQ test scores.
2. Identical twins inherit the same genes.

So, 3. environment must play some part in determining IQ.

The first two statements in this argument give reasons for accepting the third. In logic talk, they are said to be **premises** of the argument. And the third statement, which asserts the claim for which the premises offer support, is called the argument's **conclusion**.

In everyday life, few of us bother to label premises or conclusions. We usually don't even bother to distinguish one argument from another. But we do sometimes give clues called **logical indicators**. Words such as *because*, *since*, and *for* usually indicate that what follows is a premise of an argument. *Therefore*, *thus*, *consequently*, and *so* generally signal conclusions. Similarly, expressions such as "It has been observed that . . ." "In support of this . . ." and "The relevant data are . . ." are used to introduce premises, while expressions such as "The point of all of this is . . ." "The implication is . . ." and "It follows that . . ." are used to signal conclusions. Here is a simple example:

*Since* it's always wrong to kill a human being [premise], *it follows* that capital punishment is wrong [conclusion], *because* capital punishment takes the life of [kills] a human being [premise].

Put into textbook form, the argument looks like this:

1. It's always wrong to kill a human being.
2. Capital punishment takes the life of (kills) a human being.
- ∴3. Capital punishment is wrong.<sup>1</sup>

In this form, we display only the premises and conclusion of the argument. We leave out logical indicators since the logical structure of the argument is shown by the way we arrange the sentences. Of course, an argument may have any number of premises and may be surrounded by or embedded in other arguments or extraneous material.

In addition to using logical indicators such as *since*, *because*, and *therefore*, we sometimes employ sentence order—the last sentence in a series stating an argument's conclusion—and occasionally even express a conclusion in the form of a question. Consider this section of President Obama's 2016 State of the Union address:

Our unique strengths as a nation—our optimism and work ethic, our spirit of discovery, our diversity, our commitment to rule of law—these things give us everything we need to ensure prosperity and security for generations to come.

In fact, it's that spirit that made the progress of these past 7 years possible. It's how we recovered from the worst economic crisis in generations. It's how we reformed our health care system, and reinvented our energy sector; how we delivered more care and benefits to our troops and veterans; and how we secured the freedom in every state to marry the person we love.

But such progress is not inevitable. It's the result of choices we make together. And we face such choices right now. Will we respond to the changes of our time with fear, turning inward as a nation, turning against each other as a people? Or will we face the future with confidence in who we are, in what we stand for, in the incredible things that we can do together?

The rhetorical questions at the end invite us to respond that we should face the future with confidence instead of fear. In the preceding paragraphs, Obama gave reasons for this conclusion (and, of course, touted his administration's accomplishments while he was at it).

We should also note that, in daily life, premises and even the conclusions of arguments sometimes are implied rather than stated outright. Life is short, and we don't always bother to spell out matters that are obvious or not at issue or can be taken for granted. In the IQ example given earlier, for instance, the premise that IQ differences must be due either to genetic or to environmental factors was omitted as generally understood. When assessing arguments, we should by all means add unstated premises of this kind when they are relevant.

Sometimes people leave conclusions unstated as a kind of rhetorical device. We often feel more committed to beliefs we come to on our own, and leaving conclusions unstated can give us the impression that we've done just that. In a debate in Wisconsin during the 2016 presidential primary campaign season, Hillary Clinton had this to say about her opponent Bernie Sanders's plan for funding higher education:

You know, I think, again, both of us share the goal of trying to make college affordable for all young Americans. And I have set forth a compact that would do just that for debt-free tuition.

<sup>1</sup>The symbol ∴ often is used as shorthand for the word *therefore* and thus indicates that a conclusion follows.



We differ, however, on a couple of key points. One of them being that if you don't have some agreement within the system from states and from families and from students, it's hard to get to where we need to go.

And Senator Sanders's plan really rests on making sure that governors like Scott Walker contribute \$23 billion on the first day to make college free. I am a little skeptical about your governor actually caring enough about higher education to make any kind of commitment like that.

The unstated conclusion here is that Sanders's plan is impractical and unlikely to succeed. It was probably neither by accident nor mistake that Clinton left this out.

## 2. Exposition and Argument

Of course, only those groups of statements that provide reasons for believing something form arguments. Thus, anecdotes are not usually arguments, nor are most other forms of **exposition**. But even in these cases, arguments often are implied. Here is a sales clerk talking about the difference between the cameras on two phones, a Samsung and a Motorola. “Well, the Motorola has 21 megapixels and the Samsung has only 16. They both have terrific image quality, but the Samsung has optical stabilization. The Motorola right now is \$150 less, but it has fewer features.” Although the clerk's remarks contain no explicit argument because no conclusion is stated, a conclusion is definitely implied. You should choose the Samsung if you want more camera features; otherwise you should choose the Motorola.

The point is that talk generally is not aimless. A good deal of everyday talk, even gossip, is intended to influence the beliefs and actions of others and thus constitutes a kind of argument. In the phone example, the clerk provided information intended to convince the customer to draw either the conclusion, “I'll buy the Samsung because the additional features are worth the extra \$150 to me,” or the conclusion, “I'll buy the Motorola because high-powered options aren't worth \$150 more to me.” In other words, the point of the clerk's chatter was to sell a phone. Similarly, advertisements often just provide product information rather than advance explicit arguments, yet clearly every such ad has an implied conclusion—that you should buy the advertised product.

Nevertheless, it is important to understand the difference between rhetoric that is primarily expository and discourse that is basically argumentative. An argument makes the claim, explicit or implicit, that one of its statements follows from some of its other statements. It at least implies that acceptance of its conclusion is justified if one accepts its premises. A passage that is purely expository gives us no reason to accept any “facts” it may contain (other than the implied authority of the writer or speaker, as, for example, when a friend tells us that she had a good time at the beach).

## 3. Arguments vs. Explanations

One form of exposition that is especially likely to be confused for argument is the explanation. Explanations are often structured much like arguments and even use some of the same words to introduce them (“because,” “since,” etc.). But explanations are not

arguments. Arguments are used to persuade an audience that some claim is true. Explanations are used to provide an audience with greater understanding about a given claim. When we explain something, we take its truth for granted. That is to say, arguments give us *reasons to believe* something, while explanations give us *the reasons why* something is (or has come to be) the case. To put it another way, explanations answer the question “Why is that claim true?” while arguments answer the question “Why should I believe that claim is true?”

For instance, have a look at this passage from Matthew T. Hall of the *San Diego Tribune* on the fact that the first presidential primary election is always held in New Hampshire:

I’ve seen firsthand why New Hampshire should be first in line. Sure, the state isn’t as diverse as it could be and its winners don’t always get their party’s nomination, but the state’s complexion is going to change with the country’s and its voters have shown the door to unfit candidates. Retail politics has real value there, and unsurprisingly for a state whose motto is “Live Free or Die,” it has a huge share of independent voters. Put simply, I think they value their first-in-the-nation primary status in ways people in states getting the distinction every so often would not.

And then this from Mentalfloss.com: “New Hampshire’s primaries have informally been the earliest since 1920, but over the years, the state has passed laws to ensure that its primaries will remain the first in the nation.”

The first quote above is part of an attempt to persuade us that New Hampshire should hold the first primary. The second is an attempt to say why New Hampshire is first. The first one is an argument, the second an explanation.

Like just about any other form of exposition, explanations can be used to make implicit arguments. Still, the distinction between arguments and explanations is important to maintain as they call for different kinds of evaluation. (Did we just argue for or explain the claim that maintaining a distinction between arguments and explanations is important?)

## 4. What Does “Winning an Argument” Mean?

When we talk about an *argument* in this context, we clearly do not mean anything like a fight, and our sense of “argument” does not even imply any disagreement. So it is not clear that it is proper to ask what it means to “win” arguments as we understand them. That said, we are interested in the ways that arguments are actually used (hence the “and Contemporary Rhetoric” part of the title) and so we should take a moment to think about what it means for an argument to be successful.

From a strictly logical perspective, the only criterion for a successful argument is the quality of the argument itself, and we will turn in the next few sections to some ways of evaluating arguments in this respect. But an argument can be logically sound and still not very persuasive. That is to say, just because an argument *should* be convincing does not mean that it will be.

At the same time, we should not count as successful an argument that is persuasive but illogical. A truly “winning” argument is one that is *in fact* persuasive because it is rational to accept its conclusion on the basis of its premises. As we’ll see throughout this text, the combination of logical integrity and rhetorical effect may be all too rare an accomplishment.

## 5. Cogent Reasoning

Our chief concern to this point has been the *identification* of arguments. We can now turn our focus to their *evaluation*. Reasoning can be either **cogent** (good) or **fallacious** (bad). We reason cogently when we satisfy the following conditions:

1. The premises of our reasoning are believable (**warranted**, justified), given what we already know or believe.
2. We consider all likely relevant information.<sup>2</sup>
3. Our reasoning is **valid**, or **correct**, which means that the premises we employ provide good grounds for accepting the conclusion we draw.<sup>3</sup>

When any of these three conditions of cogent reasoning are not satisfied, reasoning is said to be *fallacious*.

### BELIEVABLE PREMISES

The first condition of good argument evaluation requires that we bring to bear whatever we already know or believe—our relevant **background beliefs** and information—to determine whether we should or shouldn’t accept the premises of the argument in question. Take, for instance, the first premise of the capital punishment argument discussed earlier—the premise making the claim that taking the life of a human being always is wrong. Most of us are not pacifists—we don’t believe that it always is wrong to take a human life. Bringing that background belief to bear thus should make us see the first premise of the capital punishment argument as questionable. So we should not accept the conclusion of that argument unless further reasons are presented in its support. (On the other hand, those of us who *are* pacifists obviously should reason differently.)

By way of contrast, consider the stated premise of the following argument:

Novak Djokovic must be a terrific tennis player. He won the Wimbledon championship in 2015. (The implied premise is that anyone who wins the tournament at Wimbledon must be a terrific tennis player.)

<sup>2</sup>Satisfying this extremely stringent requirement is usually beyond the ability of most of us most of the time. The point is that good reasoners try to come as close as possible to satisfying it, taking into account the importance of drawing the right conclusion and the cost (in time, effort, or money) of obtaining or recalling relevant information. (One of the marks of genius is the ability to recognize that information is relevant when the rest of us fail to notice.)

<sup>3</sup>Provided we know nothing else relevant to the conclusion. Note that reasoning from an unjustified premise may still be cogent if it also employs justified premises that sufficiently support its conclusion. Note also that the term *valid* sometimes is used more broadly than we have used it here.

Tennis fans know that the Wimbledon Grand Slam championship is one of the most demanding tennis competitions in the world, and acceptance of the stated premise (that Djokovic won the tournament) is warranted by plenty of background information.

It's interesting to notice that, in effect, evaluating a premise of an argument by bringing background beliefs to bear entails constructing another argument whose conclusion is either that the premise in question is believable or that it isn't. For example, when evaluating the capital punishment argument discussed before, someone who is not a pacifist might construct the following argument: "I believe that it isn't wrong to kill in self-defense, or in wartime, or to kill those guilty of murder. So I should reject the premise that taking a human life always is wrong."

But what, you might be asking, about your own premise, that "it isn't wrong to kill in self-defense or in wartime, or to kill those guilty of murder"? Shouldn't that be subject to evaluation as well? This is a difficult question. We certainly should subject our own beliefs to scrutiny. But at the same time, if we evaluated every premise using another argument, including those premises used in the evaluating arguments, this process would never end! We will consider the use of background beliefs in greater detail later in this chapter. For now, let's just say that this process of evaluation should end in premises that are as self-evident as possible.

This brings to mind the fact that in daily life we often are exposed to assertions, or claims, that are not supported by reasons or arguments. Clearly, it is not rational to accept these assertions without evaluating them for believability, and, obviously, their correct evaluation requires us to do exactly what we do when evaluating the believability of the premises of an argument—namely, bring to bear what we already know or believe. Evaluating unsupported assertions thus involves just part of what is done when we evaluate arguments.

## NO RELEVANT INFORMATION PASSED OVER

The second criterion of cogent reasoning requires that we not pass over relevant information. In particular, it tells us to resist the temptation to neglect evidence contrary to what we want to believe.

Here, for instance, is a part of a column written in December 2015 by David Brooks in the *New York Times* in which he predicted a precipitous decline in Donald Trump's support heading into the primary voting season:

When campaigns enter that final month, voters tend to gravitate toward the person who seems most orderly. As the primary season advances, voters' tolerance for risk declines. They focus on the potential downsides of each contender and wonder, could this person make things even worse?

When this mental shift happens, I suspect Trump will slide. All the traits that seem charming will suddenly seem risky. The voters' hopes for transformation will give way to a fear of chaos. When the polls shift from registered voters to likely voters, cautious party loyalists will make up a greater share of those counted.