

Belief Systems and the Perception of Reality – an introduction

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When we started working on this volume, the Brexit referendum had just taken place and President Obama was finishing the final months of his presidency. By the time the first chapters came in, Brexit negotiations had started to sour as campaign promises met economic reality, and the United States had a new president with a unique relationship with the truth. Of course, these are not necessarily new phenomena. The ideas that politicians lie, or at least bend the truth, to fit their political goals and that political campaigns make promises untethered from reality are not unique to this political age. However, the distance between reality and rhetoric might be.

Social psychology has long been concerned with people's perceptions of reality. This might concern relatively everyday perceptions, such as how we perceive the strengths and weakness of our romantic partners (Murray, Holmes, & Giffin, 1996), the detection of sarcasm in email (Kruger, Epley, Parker, & Ng, 2005), and whether wearing our lucky underwear will help us on the football field (Damisch, Stoberock, & Mussweiler, 2010). Humans have a complicated relationship with these perceptions (e.g. Ross & Ward, 1996). We think that we see the world objectively and that other rational people with the same information will see the world in the same way. And so, those people who do not share our views are irrational, ignorant, or worse. This can lead to simple, and sometimes funny, misunderstandings, but it can also play a role in escalating conflict (Kennedy & Pronin, 2008).

The current volume takes a step back. Rather than focusing on how perceptions of reality can lead to misunderstanding and conflict, we focus on how belief systems (i.e. ideological beliefs and worldviews) bias people's view on reality and the facts relevant in that reality in the first place (e.g. Flynn et al., 2017; Ringel, Rodriquez, & Ditto, 2019; Roussos & Dovidio, 2018; Van Bavel & Pereira, in press). Many of the ideas that are covered in this volume, such as biased information processing, perceptions of social inequality, conspiracy beliefs, trust in science, and ideological polarization, have been hot topics in both academia and public discourse. Nevertheless, in a time when it is necessary to add "fake news" and "post-truth" to our vocabulary, investigating how beliefs shape perceptions of reality seems to be more relevant than ever. The timing of the volume could (unfortunately) not be better.

The goal of this volume is to provide an overview of recent social psychological theorizing and research that examines how belief systems influence perceptions of reality. Belief systems, ranging from the political to the religious and even to the scientific, provide people with a lens to view the world and the events that take place in it. This harbors the potential for conflict and disagreement over values, and how those values are enacted in political policies. These types of conflicts are often studied in social and political psychology, and are at the heart of large literatures related to attitudes, morality, stereotypes, and prejudice.

Value differences and value conflicts per se are, however, not the focus of this volume. These differences and conflicts tend to spring from disagreement about how to solve a certain problem and

oftentimes involve a trade-off between diverging priorities. However, people's ideological beliefs can bias how they view reality and lead them to have different perceptions of the actual facts on the ground (e.g. Baron, Sheehy-Skeffington, & Kteily, 2019; Van der Lee & Ellemers, 2019) and if those facts should even be distributed to the rest of the population (Sutton, Petterson, & Rutjens, 2019). In other words, there is disagreement not so much about how to solve a certain problem but about whether there is a problem to begin with.

Let us take poverty as an example. Many people agree that poverty exists and is a bad thing that should be alleviated. Value differences, then, create conflict over *how* poverty should be reduced. Should the government reduce taxes so that businesses can hire more motivated people and, as a consequence, poverty is reduced? Or should the government provide cash grants to people in poverty to help them get by? Although this is a contentious debate, it is a debate that agrees on the basic fact: Poverty exists and is bad. However, other debates are less clear-cut. For many topics, people do not only differ on what is the best method to solve the problem, but they also differ on whether there is a problem *to begin with*. These biases in perceptions of reality emerge in a number of domains, such as the perception and interpretation of climate patterns, the ostensible danger of immigrants, the existence of structural social inequality, the interpretation of scientific data, or whether or not political elections are legitimate.

The current volume focuses on these latter questions. How is it that people disagree about the facts on the ground? Why do people perceive reality diametrical opposite ways? Can these different construals of reality be overcome? The main goal is to bring together social psychologists who examine how people's beliefs systems affect their perceptions of reality across diverse domains. We hope that the volume helps to create a more integrated understanding of reality perception and its connection with beliefs and worldviews.

Book contents

Figure 1 is a word cloud based on the chapters in this volume. As can be seen, how we see things and how this is biased by moral and political belief systems is the key overarching theme. We have organized the volume around five interconnected subthemes that illuminate the processes and domains where belief systems influence perceptions of reality. The themes are as follows: motivated reasoning, inequality, threat, scientists interpreting science, and people interpreting science.

The first theme, *motivated reasoning*, discusses motivated ideological and moral reasoning in the context of various societal issues. In Chapter 1, Ringel, Rodriquez, and Ditto start from the observation that a key contributor to partisan conflict in the United States is that liberals and conservatives hold different factual beliefs about various important policy-relevant matters such as taxes, guns, and climate change. These authors propose a three-part account of how such differential beliefs arise, by showing how ideologically and morally based beliefs (i.e. how the world *should be*) shape perceptions of reality (i.e. how the world really *is*). The three important contributors they identify are moralization, factualization, and socialization. Chapter 2, by Hennes, Hampton, Ozgumus, and Hamori, focuses on how

system justification impacts on perceptions of reality. These authors highlight the specific influence of system-level motivations on biased information production and consumption, particularly in ideological contexts. When are people motivated to protect existing states of affairs and when are they biased toward motives to facilitate system rejection or social change?

Having laid the groundwork by looking at how ideology shapes perceptions of reality via various processes of motivated reasoning, we next turn to one specific contentious topic of ideological clashes: *Inequality*. Two manifestations of inequality are discussed: social and economic inequality, and gender inequality. In Chapter 3, Baron, Sheehy-Skeffington, and Kteily provide an overview of recent research on how ideology shapes perceptions of social and economic inequality. Drawing from research on motivated cognition, their chapter reviews research on whether and when ideologies such as egalitarianism and conservatism are associated with biased perceptions of the degree and nature of social and economic inequality. They also investigate the consequences for support for social change. In Chapter 4, van der Lee and Ellemers focus on perceptions of gender inequality in organizations, with a particular focus on academia. The authors discuss how evidence for gender inequality is often met with skepticism and resistance, and discuss how this relates to individual-merit ideology.

The third theme focuses on how *threat* has a motivational impact on reality perceptions. First, van Prooijen (Chapter 5) discusses how some belief systems create the right environment for conspiracies to flourish, and that populism plays an important role in the creation of conspiracy theories. Populism is argued to consist of three underlying dimensions: anti-elitism, anti-pluralism, and threatened nationalism. Populism causes endorsement of alternative portrayals of reality, often in the form of conspiracy theories. Moreover, these conspiracy theories can in turn further reinforce populist sentiments. The aforementioned political changes of late feature some prominent examples of such conspiracy theories. In Chapter 6, Sullivan, Palitsky, and Young discuss perceptions of reality in the context of suffering. Suffering warrants explanation: why do I or my loved ones suffer? The authors argue that although painful experiences pertaining to suffering may sometimes pressure people toward more accurate accounts of reality, but more often it will be construed in motivated and culturally constructed ways, which are variable and potentially quite detached from reality. In other words, the ideology that goes with one's culture shapes how suffering is construed.

The fourth and fifth themes of the volume focus on how science and scientific evidence is interpreted. First, two chapters discuss how a special kind of people, namely *scientists*, interpret – and conduct – science. Scientists are humans, and so they are prone to ideologically and morally motivated reasoning just like everyone else. There has been much debate about ideological heterogeneity within the scientific community, for example, in the social sciences, and how this can shape the interpretation of scientific evidence. In Chapter 7, Stevens, Jussim, Anglin, and Honeycutt describe how political ideology can direct the processes that produce scientific facts, by influencing what topic should be studied, how to study them, and by shunning researchers and ideas that conflict with the scientists' own political values. It is one thing that ideology makes people more skeptical about certain scientific facts, but it is another (potentially more serious) thing if these facts are themselves partially products of ideology. Washburn and Skitka (Chapter 8) take up the task to come up with ways to minimize the potentially deleterious ways in which ideology shapes social and political psychology research. Building on the

classic and influential ideas of Platt (1964) on strong inference, they argue that employing alternative hypotheses to prevent confirmation bias makes for better science. Competing hypotheses about ideological differences in psychological functioning should consider both flattering and less flattering explanations for human behavior, according to these authors.

The final two chapters focus on how all *other people* (i.e. members of the public) interpret science. Schmalor and Heine (Chapter 9) investigate how essentialist beliefs affect the interpretation of scientific work in genetics, more specifically how it impacts people's understanding of race, gender, and criminality, among other things. Through shaping how people construe facts about the impact of genes on behavior, genetic essentialism has important consequences for science, legislation, and ideological movements. In Chapter 10, Sutton, Petterson, and Rutjens describe how people can be motivated to dispute the truth value of scientific evidence, or even censor and obstruct science, to prevent it from having an adverse impact on society. In other words, when certain scientific findings are perceived to be threatening to collective interests and the common good, people tend to prefer to refute or dismiss the evidence. This "impact bias" has important implications for public understanding of science as well as for how debated about bias in science should be construed.

When considered as a group, the chapters in this volume show that people often differ in what they perceive to be real, or factual, and that these diverging reality perceptions stem – at least in part – from differences in ideologies and beliefs. These perceptions do not reflect anomalous beliefs, or that one side is necessarily right and the other wrong. Rather, what people (like to) believe are facts that maintain their worldview and the social systems in which they operate. To further our understanding of contemporary ideological clashes and polarization, it is important to look beyond (partisan) value conflicts (e.g. disagreements over how we should solve poverty; what is the best way to combat climate change) and acknowledge the existence of stark differences in perceptions of reality (e.g. is poverty a problem; is climate change real).

The next key step for scholars, activists, and others interested in advancing a fact-based social and political discourse is to understand how to correct inaccurate perceptions of reality. Recent work has begun to show how exposure to factual information can be effective in correcting misperceptions (Berinsky, 2017), but not always (Nyhan et al., 2014; Nyhan & Reifler, 2010). A key challenge will be to either neutralize the effects of belief systems on motivational and cognitive processes associated with perceptions of reality or to harness those effects to promote a more accurate assessment of the world. This may be done by increasing the motivational oomph of alternative motivations, such as accuracy motivations, by promoting genuine curiosity (Kahan et al., 2017) and rewarding accuracy among both the general public and the pundit class (Prior et al., 2015). We suspect that present and future work that uncovers ways to effectively neutralize the motivational power of belief systems on perceptions of reality and promote accuracy norms will be a major practical contribution of the social sciences to this pressing present-day issue.

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