CHAPTER 10

The biases of development professionals

Experts, policy makers, and development professionals are also subject to the biases, mental shortcuts (heuristics), and social and cultural influences described elsewhere in this Report. Because the decisions of development professionals often can have large effects on other people's lives, it is especially important that mechanisms be in place to check and correct for those biases and influences. Dedicated, well-meaning professionals in the field of development—including government policy makers, agency officials, technical consultants, and

Development professionals can be susceptible to a host of cognitive biases, can be influenced by their social tendencies and social environments, and can use deeply ingrained mindsets when making choices.

frontline practitioners in the public, private, and non-profit sectors—can fail to help, or even inadvertently harm, the very people they seek to assist if their choices are subtly and unconsciously influenced by their social environment, the mental models they have of the poor, and the limits of their cognitive bandwidth. They, too, rely on automatic thinking and fall into decision traps.

Perhaps the most pressing concern is whether development professionals understand the circumstances in which the beneficiaries of their policies actually live

and the beliefs and attitudes that shape their lives. A deeper understanding of the context yields policies that more accurately "fit" local conditions and thus have a higher probability of succeeding. To put this assumption to the test, the 2015 team for the *World Development Report* (WDR 2015 team) collected data examining how World Bank staff perceived the beliefs and attitudes of the poor across several measures and compared their findings against the actual beliefs and attitudes of a representative sample of individuals in developing countries.

It is perhaps uncontroversial to suggest that World Bank staff have a different worldview from others. World Bank staff are highly educated and relatively wealthier than a large proportion of the world. However, it is interesting to note that while the goal of development is to end poverty, development professionals are not always good at predicting how poverty shapes mindsets. For example, although 42 percent of Bank staff predicted that most poor people in Nairobi, Kenya, would agree with the statement that "vaccines are risky because they can cause sterilization," only 11 percent of the poor people sampled in Nairobi actually agreed with that statement. Overall, immunization coverage rates in Kenya are over 80 percent. There were also no significant differences in the responses of Bank staff in country offices and those in headquarters or in responses of staff working directly on poverty relative to staff working on other issues. This finding suggests the presence of a shared mental model, not tempered by direct exposure to poverty. The disparity represents not simply knowledge gaps on the part of development professionals but a mistaken set of mental models for how poverty can shape the mindsets of poor people. This is crucially important since how development

professionals perceive the poor affects how development policy is created, implemented, and assessed.

This chapter focuses on the kinds of automatic thinking that can compromise the effectiveness of development professionals in light of the three main insights discussed throughout this Report. It argues that development professionals are susceptible to a host of cognitive biases, are influenced by their social tendencies and social environments, and use deeply ingrained mindsets when making choices. This chapter reviews four kinds of challenges and the associated decision traps that affect them: the use of shortcuts (heuristics) in the face of complexity; confirmation bias and motivated reasoning; sunk cost bias; and the effects of context and the social environment on group decision making. The challenge that development organizations face is how to develop better decision-making procedures and policy processes to mitigate these problems. Improving these decision-support environments can have a direct impact on policy outcomes simply by eliminating errors of reasoning.

Complexity

Development is a complex, messy, conflict-ridden process. Its complexity may affect the kinds of decisions made by development professionals. The more complex a decision is, the more difficult it is to make. However, even the decisions in areas in which people have expertise can be affected by the complexity of the decision-making environment. As the number of options increases, people's ability to accurately evaluate the different options declines.

This point is demonstrated in an experiment by Redelmeier and Shafir (1995). Family physicians were mailed a survey outlining a medical situation: a patient suffered with chronic hip pain, and doctors were asked to decide whether to put their patient on new medication. In the case received by the first half of doctors in the sample, all prior drug treatments had failed. The problem was described in roughly this way (some language is paraphrased for brevity, and labels are added for emphasis):

You decide to refer the patient to an orthopedic consultant for consideration for hip replacement surgery. He agrees to this plan. However, before sending him away, you learn that there is one medication (ibuprofen) that the patient has not yet tried. Your task is to choose between two alternatives:

1. *Ibuprofen + referral.* Refer to orthopedics and also start ibuprofen.

2. *Just referral.* Refer to orthopedics and do not start any new medication.

The second half of doctors received a scenario that differed in just one respect. The doctor learned, just before sending the patient to an orthopedic consultant, that there are two drug treatments (ibuprofen and piroxicam) that the patient has not yet tried. The respondent's task in the second version was to choose among three options:

1. *Ibuprofen + referral.* As above.
2. *Piroxicam + referral.* Refer to orthopedics and also start piroxicam.
3. *Just referral.* As above.

More physicians chose the simplest option—"just referral"—in the second, more complicated version than in the basic version (72 percent versus 53 percent). Increasing the complexity of the problem may have led physicians to skip over possibly effective medicines altogether. This happened to highly educated and experienced professionals who are dedicated to their patients' health. Development professionals who design and implement development projects grapple with highly complex problems, too. That very complexity gives rise to a special set of challenges (Ramalingam 2013).

Many situations offer not only several options but also multiple ways of understanding those options. How policy options are framed has a large effect on behavior. This is known as the *framing effect* (see chapters 1 and 3). One of the most famous demonstrations of the framing effect was done by Tversky and Kahneman (1981). They posed the threat of an epidemic to students in two different frames, each time offering them two options. In the first frame, respondents could definitely save one-third of the population or take a gamble, where there was a 33 percent chance of saving everyone and a 66 percent chance of saving no one. In the second frame, they could choose between a policy in which two-thirds of the population definitely would die or take a gamble, where there was a 33 percent chance that no one would die and a 66 percent chance that everyone would die. Although the first and second conditions frame outcomes differently—the first in terms of gains, the second in terms of losses—the policy choices are identical. However, the frames affected the choices students made. Presented with the gain frame, respondents chose certainty; presented with a loss frame, they preferred to take their chances. The WDR 2015 team replicated the study with World Bank staff and found the same effect. In the gain

frame, 75 percent of World Bank staff respondents chose certainty; in the loss frame, only 34 percent did. Despite the fact that the policy choices are equivalent, how they were framed resulted in drastically different responses.

Faced with complex challenges, development agencies seek to bring a measure of uniformity and order through the widespread application of standard management tools—a process Scott (1998) calls "thin simplification." This approach brings its own potential for error in the opposite direction, as discussed later in this chapter.

One promising strategy for constructively addressing complexity stems from the work of Weick (1984), who proposes breaking down seemingly intractable issues into more discrete problems, thereby generating an incremental set of "small wins." Argyris (1991) extends this insight to stress the importance, for organizations, of a kind of learning in which not only the means used but also the ends sought and strategies employed are reexamined critically; that effort entails learning not only from success but also from failure. More recent work by Andrews, Pritchett, and Woolcock (2013) proposes incorporating such an approach more systematically into development operations. Rather than trying to grapple with problems at higher orders of abstraction or defining problems as the absence of a solution (for example, inadequately trained teachers), decision makers instead are urged to pursue a concerted process of problem identification: the most basic step is to identify the problem correctly. Then development professionals can work incrementally with counterparts to define a problem such that it becomes both an agreed-upon binding constraint to reaching a certain set of goals *and* a manageable challenge that allows for some initial progress (for example, enhancing student learning in the classroom).

Confirmation bias

When development professionals engage with projects and other development problems, they bring with them disciplinary, cultural, and ideological priors, leaving them susceptible to confirmation bias. *Confirmation bias* refers to the selective gathering of (or the giving of undue weight to) information in order to support a previously held belief (Nickerson 1998) and to the neglect (or discounting) of information that does not support those previously held beliefs. It arises when individuals restrict their attention to a single hypothesis and fail to actively consider alternatives (Fischhoff and Beyth-Marom 1983). Once a particular hypothesis has been accepted, individuals selectively look for information to support it (see, among others, Wason 1960, 1977;

Wetherick 1962). Confirmation bias may arise from a fundamental tendency of human beings to use reason for the purposes of persuading others and winning arguments (Mercier and Sperber 2011).

Recent research has shown that cultural and political outlooks affect how individuals interpret data. Kahan and others (2013) present respondents with two versions of identical data—one framed in the context of a study on the effectiveness of a skin cream, the other on the effectiveness of gun control laws. Respondents are randomly assigned to one of the two frames. The study assesses the numeracy of respondents, as well as their cultural and ideological outlooks. The authors find that for the case of skin cream, as might be expected, the likelihood of correctly identifying the answer supported by the data goes up as numeracy increases and is not affected by cultural and political outlooks. However, in the case of gun control laws, respondents are more likely to get the right answer when that answer corresponds to their cultural views than when it does not. Moreover, when the answer in the gun control law framing is consistent with ideology, numeracy helps (by boosting the odds of getting the answer right), but when the answer is inconsistent with ideology, numeracy has minimal impact. On topics that are important for social and political identity, individuals tend to engage in *motivated reasoning*, the tendency to arrive at conclusions they like.

To see if cultural cognition of this kind affects development experts, and not only the general population used in the study by Kahan and others (2013), the WDR 2015 team implemented a very similar test by surveying World Bank staff.[1] The team replicated the skin cream (neutral) frame, but replaced the gun control law frame with one about the impact of minimum wage laws on poverty rates—a controversial topic among development economists, whose views on the issue appear to be related to broader disciplinary and political identities.

Using a sample of professional-level World Bank staff, stationed both in country offices and the Washington, D.C., headquarters, the team found that respondents are significantly less accurate when interpreting data on minimum wage laws than when interpreting data on skin cream (figure 10.1), even though the data presented are identical in each scenario. The differences in accuracy are not explained by differences in cognitive ability or seniority. As in the study by Kahan and others (2013), there is, however, evidence of a relationship between ideology and accuracy. Respondents were asked whether they were more likely to support the statement "Incomes should be made more equal" or the statement "We need larger income differences

as incentives for individual effort." Respondents supporting income equality were significantly less accurate when the data presented showed that minimum wage laws raise poverty rates than they were when minimum wage laws were shown to lower poverty rates. This study illustrates that ideological outlooks affect the reasoning of highly educated development professionals. Like most people, they tend to come up with reasons for why the evidence supports their own ideological commitments.

What can be done to overcome confirmation bias? One of the best ways is to expose people to opposing views and invite them to defend their own. Individuals readily argue and defend their views when exposed to opposition, but in the absence of a social setting that forces them to argue, individuals usually fall back on their prior intuitions. Social settings can motivate people to produce more effective arguments and, espe-

cially, to evaluate critically the arguments that others make. By creating argumentative and deliberative environments, organizations can reduce the risk of confirmation bias. Crucially, these processes require exposing people to individuals with different viewpoints. Discussions among people who share similar views can lead them to become more extreme in their positions, as Schkade, Sunstein, and Hastie (2010) have shown. In those circumstances, hearing from others only confirms the biases that people hold. The failure to confront individuals with differing views can lead to consistently biased decision making (box 10.1).

In short, group deliberation among people who disagree but who have a common interest in the truth can harness confirmation bias to create "an efficient division of cognitive labor" (Mercier and Sperber 2011). In these settings, people are motivated to produce the best argument for their own positions, as well as to critically evaluate the views of others. There is substantial laboratory evidence that groups make more consistent and rational decisions than individuals and

Figure 10.1 How development professionals interpreted data subjectively

Identical sets of data were presented to World Bank staff, but in different frames. In one frame, staff were asked which of two skin creams was more effective in reducing a rash. In the other, they were asked whether or not minimum wage laws reduce poverty. Even though the data were identical, World Bank respondents were significantly less accurate when considering the data for minimum wage laws than for skin cream. Views on whether minimum wage laws lower poverty tend to be related to cultural and political outlooks. Respondents supporting income equality were significantly less accurate when the data presented conflicted with their outlooks (and showed that minimum wage laws raise poverty rates) than they were when the data corresponded to their outlooks (and showed that minimum wage laws lower poverty rates).
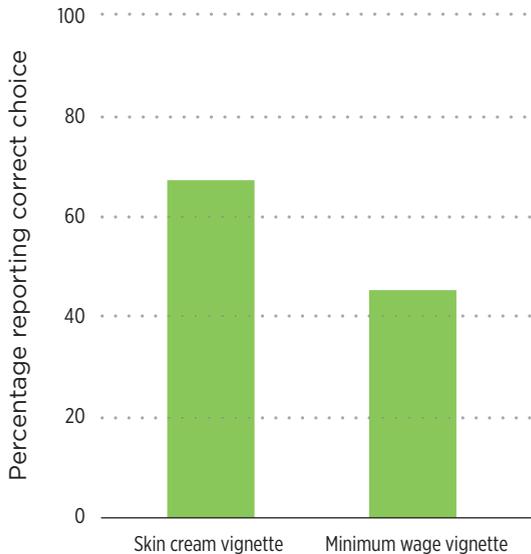
Because the decisions of development professionals often can have large effects on other people's lives, it is especially important that mechanisms be in place to check and correct for their biases and blind spots.

Source: WDR 2015 team survey of World Bank staff.

are less "likely to be influenced by biases, cognitive limitations, and social considerations" (Charness and Sutter 2012, 158). When asked to solve complex reasoning tasks, groups succeed 80 percent of the time, compared to 10 percent when individuals are asked to solve those tasks on their own (Evans 1989). By contrast, efforts to debias people on an individual basis run up against several obstacles, including the problem that critical thinking skills appear to be domain specific and may not generalize beyond the particular examples supplied in the debiasing efforts (Willingham 2007; Lilienfeld, Ammirati, and Landfeld 2009). Indeed, when individuals are asked to read studies whose conclusions go against their own views, they find so many flaws and counterarguments that their initial attitudes are sometimes strengthened, not weakened (Lord, Ross, and Lepper 1979).

Red teaming is an approach to fighting confirmation bias that has been a standard feature of modern military planning. In red teaming, an outside team challenges the plans, procedures, capabilities, and assumptions of commanders in the context of particular operational environments, with the goal of taking the perspective of partners or adversaries. This process is institutionalized in some military organizations.[2] Teams specialize in challenging assumptions. The goal is to avoid "groupthink," uncover weaknesses in existing plans and procedures, and ensure that attention is paid to the context. It draws on the idea that individuals argue more effectively when placed in social settings that encourage them to challenge one another.

In a development context, while there may not be adversaries, there are often a variety of stakeholders, each of whom comes with a different set of mental models and potentially different goals and incentives. Institutionalizing teams that review plans in an explicitly argumentative manner offers a greater chance that plans can be made more effective before resources are wasted. Red teams are institutionally distinct from the policy makers themselves, which creates space for more candor and critique. This approach has already moved beyond military planning and into general government use, particularly for vulnerability analysis. Red teaming encourages a culture of perspective taking and independent adversarial analysis as part of a stakeholder assessment.

This approach is broadly similar to the long-standing work of Fishkin (2009), who has sought to use open deliberative forums (citizens' juries) to help citizens come to greater agreement (if not consensus) on otherwise polarizing issues. In his forums, citizens with different initial views on controversial issues, such as migration and regional trade agreements, are randomly assigned to groups where they receive presentations by leading researchers on the empirical evidence in support of varying policy positions. Participants are encouraged to pose questions to presenters and to

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Box 10.1 **The home team advantage: Why experts are consistently biased**

Even the best-trained, most experienced, and seemingly impartial professionals can make systematically biased decisions. In a comprehensive empirical analysis of major sports leagues, with important implications for other professional arenas, Moskowitz and Wertheim (2011) find that in all such sports, and especially during critical moments (for example, at the end of close championship games), referees consistently favor the home team. Even though the referees in such games are the best available—and, significantly, sincerely believe themselves to be utterly impartial in performing their duties in all circumstances—they nonetheless make decisions that give the home team a clear advantage. At the end of soccer games, for example, referees have discretionary authority to add a few extra minutes corresponding to the amount of time lost due to injuries and substitutions; they routinely add more time when the home team is behind and less time when it is ahead. Similarly, in the final innings of championship baseball games, marginal calls on whether particular pitches are called as strikes or balls are made in favor of the home team. Under pressure, in other words, even the best professionals make demonstrably biased decisions. Why is this? Does this process play out in public policy? If so, what can be done about it?

Notionally independent experts make consistently biased decisions at decisive moments because they want to appease the passions—most especially, to avoid the wrath—of those closest to them, Moskowitz and Wertheim (2011) conclude. Put differently, the home team advantage stems not so much from home team players being more familiar with the idiosyncrasies of their environment or the extra effort players make in response to being cheered on by their more numerous and vocal supporters, but from those same supporters exerting pressure on otherwise impartial officials to make fine, but deeply consequential, judgment calls in their favor. No one wants to incur the displeasure of those around them.

This dynamic goes a long way toward explaining the failure of otherwise competent and experienced regulatory officials in public finance to adequately anticipate and respond to the global financial crisis of 2008, Barth, Caprio, and Levine (2013) argue. In this case, the "home team" is—or became, over time—the private sector banks and allied financial industries, whose senior officials move in a "revolving door" between the highest levels of the public and private sectors (for example, between the U.S. Federal Reserve and Goldman Sachs). In social circles and professional gatherings, the people public officials thus most frequently encountered—the people whose opinions were most proximate and salient to these officials—were those from the private sector. Without needing to question the professional integrity or competence of financial sector regulators, the public interest—and in particular, ordinary citizens whose transactions depend on the security and solvency of the banks holding their deposits and mortgages—became, in effect, the perpetual "away team," with no one adequately voicing and protecting their interests. When the pressure intensified—when the system started to implode—only the home team continued to get the key calls.

These types of problems cannot be adequately addressed by providing "more training" or "capacity building" for individuals, since this research shows compellingly that even the "best and brightest" favor the "home team," however that team comes to manifest itself. A partial solution in professional sports, at least, has been the introduction of instant replay, which has been shown empirically to improve the objective decision making of referees: when referees know their actions are subject to instant and public scrutiny, often from multiple angles, their bias for the home team markedly declines. This chapter later presents approaches in which development professionals might learn to view topics from multiple angles and in which they, as well as others, examine and observe one another, thus exposing and mitigating ingrained biases.

explore the finer points through discussion with one another. Fishkin's approach, which has been carried out in dozens of different country contexts on different policy issues, has been used to help citizens arrive at more informed and reasoned views and to reduce the degree of polarization between competing policy viewpoints.

Note that these approaches differ from standard peer review processes in development organizations. For the most part, those who prepare concept notes, appraisal documents, or program assessments are allowed to nominate their peer reviewers, thereby infusing the entire process with a susceptibility to confirmation bias. Authors will inevitably select sympathetic like-minded colleagues to review their work, who in turn not only are likely to assess the work through a similar lens but also know that, in time, the roles are likely to be reversed. The risk of confirmation bias could be reduced by including at least one "double-blind" peer reviewer in the assessment process: that is, a person drawn at random from an appropriate pool of "knowledgeable enough" reviewers, whose identity would remain anonymous and who (in principle) would not know the name(s) of the author(s) of the work he or she is assessing.

A final and related option is to require a stronger empirical case to be made up front about the likely impacts of the proposed intervention, following from a clearly stated theory of change. Such a process would need to make a serious effort to integrate—and where necessary reconcile—evidence pointing in different directions (see Ravallion 2011). Agencies and development institutions like the World Bank should be exercising due diligence in this domain by engaging in a more robust debate with scholarly findings, where such findings exist. However, this approach should not imply that the only proposals allowed to go forward are those formally and unambiguously verified by elite research. In addition to questions concerning the external validity of studies, this approach would bias development projects toward areas in which it is easier to conduct high-impact research. It would also stifle innovation (which by definition has uncertain impacts initially) and set unreasonable standards for functioning in the contexts in which most development work takes place. Nor should this approach imply that particular methodologies are inherently privileged over others when determining "what works" (or is likely to work in a novel context or at a larger scale).

Sunk cost bias

Policy makers can also be influenced by the *sunk cost bias*, which is the tendency of individuals to continue a project once an initial investment of resources has been made (Arkes and Blumer 1985). To stop a project is to acknowledge that past efforts and resources have been wasted; thus the bias may arise from the cultural admonition not to appear wasteful (even though, paradoxically, continuing a project that is questionable may incur needless costs). Actors less concerned with appearing wasteful, such as children and nonhuman animals, do not exhibit sunk cost bias (Arkes and Ayton 1999). Examples in the field of engineering illustrate particularly well an escalating commitment to a "failing course of action," where individuals continue to support a project and cite sunk costs as the major reason for doing so (Keil, Truex, and Mixon 1995). The implications of this line of research are that policy makers are particularly sensitive to policies already put in action. Being held politically accountable for risk taking explains some of the sunk cost effects, particularly the reluctance to experiment and try new ideas.

The WDR 2015 team investigated the susceptibility of World Bank staff to sunk cost bias. Surveyed staff were randomly assigned to scenarios in which they assumed the role of task team leader managing a five-year, $500 million land management, conservation, and biodiversity program focusing on the forests of a small country. The program has been active for four years. A new provincial government comes into office and announces a plan to develop hydropower on the main river of the forest, requiring major resettlement. However, the government still wants the original project completed, despite the inconsistency of goals. The difference between the scenarios was the proportion of funds already committed to the project. For example, in one scenario, staff were told that only 30 percent ($150 million) of the funds had been spent, while in another scenario staff were told that 70 percent ($350 million) of the funds had been spent. Staff saw only one of the four scenarios. World Bank staff were asked whether they would continue the doomed project by committing additional funds.

While the exercise was rather simplistic and clearly did not provide all the information necessary to make a decision, it highlighted the differences among groups randomly assigned to different levels of sunk cost. As levels of sunk cost increased, so did the propensity of the staff to continue. The data show a statistically significant linear trend in the increase in likelihood of committing remaining funds. Staff also perceived their colleagues as being significantly more likely to continue to commit the remaining funds to the dying project (figure 10.2). This divergence between what individual staff say about their own choices and what they say about how other staff will behave is consistent with the existence of a social norm for disbursing funds for a dying project.

Figure 10.2 How World Bank staff viewed sunk costs

World Bank staff were asked if they would commit remaining funds to a dying project. Staff were more likely to commit additional funds as the sunk costs increased. They also perceived their colleagues as being more likely to commit funds than they themselves were, which is consistent with the existence of a social norm for disbursing funds for a dying project.
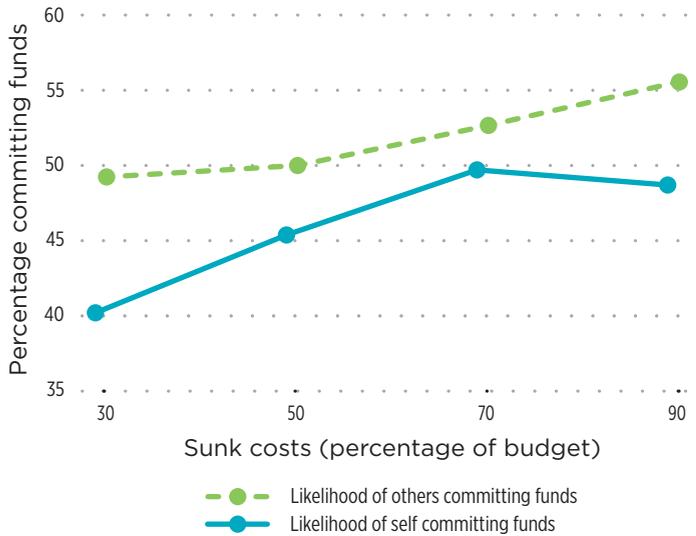
Source: WDR 2015 team survey of World Bank staff.

How might organizations mitigate sunk cost effects? The basic principle is to avoid the judgment that to cut off a dying project is to waste resources. When individuals can justify why they have "wasted" resources, they are less likely to be trapped by sunk costs (Soman and Cheema 2001). It can be easier to justify cutting off a project when there are no untoward career consequences for doing so and when criteria for ending a project are clear and public. For development organizations, there are important implications from recognizing that development is complex, that many projects will fail, and that learning is as important as investing.

The effects of context on judgment and decision making

The biases policy makers themselves may hold about the population they are intending to serve are also very important. When designing policies appropriate for a target group, policy makers must make some assumptions about this group. At a basic level, knowing whether the group's literacy rate is low or high will guide the design of policies (for example, road safety signs may use numbers and pictures rather than letters if some drivers in the group cannot read). Less intuitively, knowing how poor people's labor supply would change in response to a transfer is useful in

choosing between welfare-oriented and labor-oriented approaches to combating poverty. Most fundamentally, to take a policy stance, policy makers must have some knowledge about the decision context that exists in the population. In the absence of knowledge or objective interpretation of that knowledge, automatic thinking, as well as thinking unduly influenced by social context and cultural mental models, may prevail.

In this regard, designing and implementing policies combating poverty are difficult in three respects. First, most policy makers have never been poor and thus have never personally experienced the psychological and social contexts of poverty or scarcity (see chapter 4); as a result, their decision-making processes may differ from those of people living in poverty. An example of this gap is how development professionals, like other well-off people, think about trade-offs between time and money. The poor often exhibit more classically rational behavior when it comes to making such trade-offs, as Mullainathan and Shafir (2013) have argued. When presented with an option to save $50 on a $150 purchase by driving 45 minutes, a poor person would take the option. He or she would also take the option for a $50 savings on higher-priced goods. Wealthier people, however, tend to be less inclined to save $50 as the base price goes up. Although the deal is always the same—$50 for 45 minutes—the percentage discount goes down. The wealthy respond to the discount rate, whereas the poor respond to the absolute value of the monetary savings.

The WDR 2015 team replicated this result with World Bank staff. In this experiment, respondents were randomly assigned to one of three different prompts. In each prompt, the basic setup was identical: a $50 savings in exchange for a 45-minute drive. However, the only piece of information that changed was the price of the object (in this case, a watch). As the price of the watch increased (that is, the discount rate dropped), World Bank staff were significantly less likely to report traveling to the store. Staff valued time and money differently from the way the people whose lives they were working to improve valued them. No income groups in Nairobi, Kenya, who were asked this question changed their answers when the price of the object (in this case, a cell phone) increased (see spotlight 3).

Second, even the most well-intentioned and empathic policy maker is a representative of an organization and a professional community that deploy particular language, assumptions, norms, and resources. These may be so familiar to policy makers that they are unaware of how alien they may appear to outsiders and those they are ostensibly trying to serve. Development initiatives and discourse are replete with phrases

espousing the virtues of "participation," "empowerment," and "accountability," for example, but as articulated by development practitioners, these concepts largely reflect the sensibilities of donor agencies and urban elites (Gauri, Woolcock, and Desai 2013), who tend to use them in confined ways. These may be different from how prevailing systems of order and change are experienced in, say, a given village in rural Ghana or Indonesia (Barron, Diprose, and Woolcock 2011). Even among professionals, academic researchers take it as a given that development policy should be "evidence-based," and on this basis they proceed to frame arguments around the importance of conducting "rigorous evaluation" to assess the "effectiveness" of particular interventions. In contrast, seasoned practitioners tend to regard evidence as one factor among many shaping what policies become politically supportable and implementable and thus, on the basis of these latter criteria, are deemed "effective" (box 10.2).

Third, development policy makers and professionals usually are not familiar with the mental models and mindsets that poor people use. Policy makers are likely to live in different places from the poor, to send their children to different schools, to receive medical treatment in different hospitals, to travel on different modes of transport, and to have much stronger incentives to socialize with and listen to those who are more likely to be able to support their policy agenda and political career. One constructive response to this problem has been "village immersion" programs, in which senior officials commit to living the lives of their constituents for a week, working alongside them and eating in their houses, the better to experience firsthand what specific problems they encounter (Patel, Isa, and Vagneron 2007). In a broader sense, the widening inequality in society makes it less likely that people from different walks of life will encounter one another, even inhabit the same "moral universe" (Skocpol 1991; World Bank 2005), rendering the preferences and aspirations of marginalized groups even more marginal. The resulting difference in mindsets between rich and poor can manifest itself in very concrete ways (box 10.3).

Development professionals usually interpret the local context as something that resides "out there" in developing countries—as something that policy makers and practitioners should "understand" if they are to be effective. Taking local contexts seriously is crucial (Rao and Walton 2004). Development professionals must be constantly aware that development programing cannot begin from scratch. Every human group has a system of some kind already in place for addressing its prevailing challenges and opportunities. The introduction of development projects can bolster or disrupt

the coherence, effectiveness, and legitimacy of those prevailing systems.

What can be done to close the gap between the mental models of development professionals and the "beneficiaries" of their "interventions"? Lessons from the private sector may be useful. Consider the high-technology sector, where experts attempt to create complex products for "typical" consumers. Since designers in this industry have very specific training and are constantly immersed in the world of product design, the lens through which they view the world is often quite different from that of a common user who lacks knowledge of the theoretical principles and necessary trade-offs guiding design processes. Moreover, designers spend countless hours with their products, while users encounter them only when they are trying to satisfy some particular need. The result can be substantial underutilization of otherwise highly capable products and programs (such as all the buttons on remote control devices to operate televisions) or, at worst, abandonment in the face of a futile, frustrating experience.

One approach to meeting this challenge is known in the software industry as *dogfooding*. This expression comes from the colloquialism, "Eat your own dog food"; it refers to the practice in which company employees

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Box 10.2 **A clash of values between development professionals and the local populace: Agricultural reform in Lesotho**

An agricultural modernization program initiative in Lesotho provides an illustration of widely divergent views of value between development professionals and the local populace. In this landlocked nation, development professionals saw the country's grasslands as one of the few potentially exploitable natural resources and its herds of grazing animals as a "traditional" practice ripe for transformation by a "new" modern economy. Necessary changes, planners believed, included controlled grassland use, new marketing outlets for surplus animals, and more productive breeds. This seems straightforward enough from an economic point of view. But within a year of the land being fenced off for the exclusive use of more "commercially minded" farmers, the fence was cut, the gates had been stolen, and the land was being freely grazed by all. Moreover, the association manager's office had been burned down, and the program officer in charge was said to be in fear for his life. What happened here?

The mental models of the development professionals regarding the "value" of various agricultural practices failed to take account of unique but critical features of the Lesotho economy. Planners viewed animals as simple commodities. But community members saw them very differently. Grazing animals were excluded from the otherwise modern and highly monetized economy, carrying an intrinsic value of their own that was embedded within a very different set of rules—sometimes referred to as "the bovine mystique"—that prioritized owning cattle over cash.

*Source:* Ferguson 1994.

Box 10.3 It may be difficult for development professionals to accurately predict the views of poor people

As part of the research for this Report, data were collected both from development professionals within the World Bank and from individuals in the bottom, middle, and top thirds of the wealth distribution in the capital cities of selected developing countries (Jakarta, Indonesia; Nairobi, Kenya; and Lima, Peru). The data reveal a large gap between how development professionals perceive the context of poverty and how the bottom third views it. In the three figures that follow, this difference can be seen clearly in three distinct areas crucial to development: whether the bottom third thinks of themselves as having control over their lives (figure B10.3.1, panel a), how helpless they feel in dealing with the problems in their life (panel b), and their knowledge about health services (their attitudes toward vaccinations, for example) (panel c).

Figure B10.3.1 How World Bank staff predicted the views of poor people

a. Control of the future
*Survey question:* What happens to me in the future mostly depends on me.
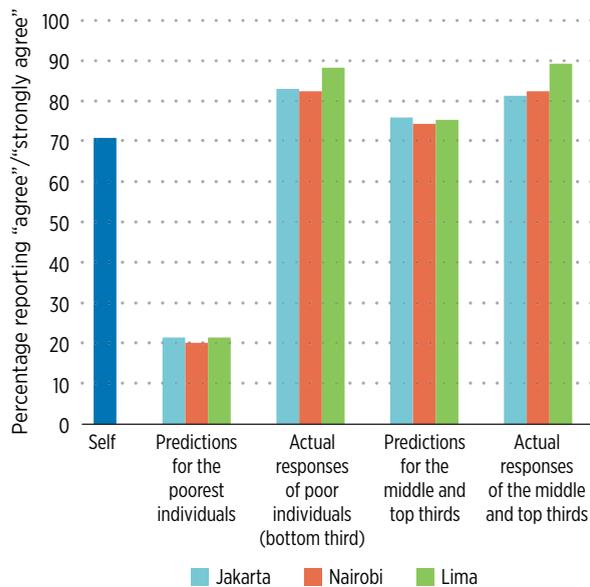
Source: WDR 2015 team survey data.

Panels a and b reveal a large disparity between how development professionals believe poor individuals (bottom third) will answer these questions and how poor individuals in fact answered them. Development professionals imagine that poor individuals are very different from themselves in their self-perceptions, but in fact they are not. In all cases, responses by the bottom and by the middle and top thirds of the income distribution are similar. However, development professionals believe there is a large disparity between the poor and the rest and see themselves as closer to the upper-level groups than to poor individuals.

In another area, development professionals imagine poor individuals to be much more suspicious of vaccines than they actually are (panel c). In each instance, the responses of poor individuals are very close to

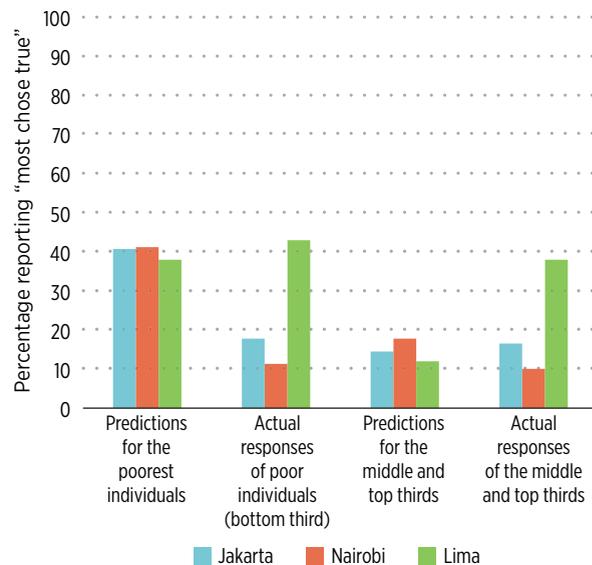#### b. Helplessness in dealing with life's problems
Survey question: I feel helpless in dealing with the problems of life.
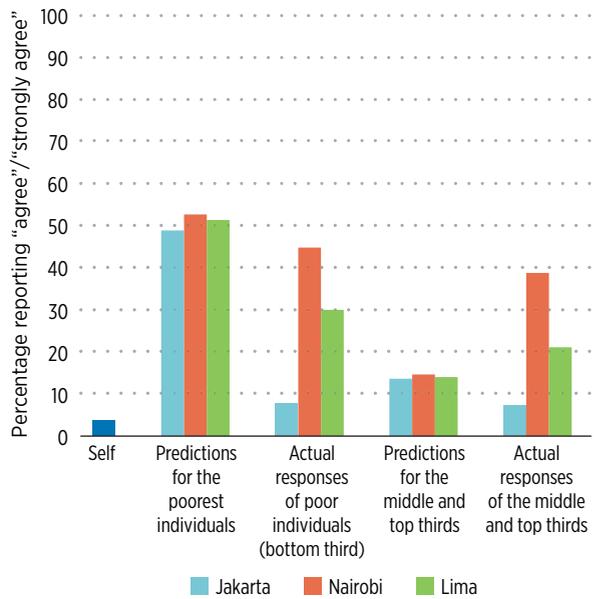
Source: WDR 2015 team survey data.

c. The dangers of vaccines
Survey question: Vaccines are risky because they can cause sterilization.

Source: WDR 2015 team survey data.

those of the rest of the population. This finding suggests that development professionals assume that poor individuals are less autonomous, less responsible, less hopeful, and less knowledgeable than they in fact are. These beliefs about the context of poverty shape policy choices. It is important to check these beliefs against reality.

themselves use a product ("eat the dog food") to work out the kinks before releasing it to the marketplace. The approach turns on the belief that the product (whether dog food, an iPad, or an electronic toothbrush) should be good enough and user-friendly enough for everyone in the company to operate or consume before they expect customers to do so. The key idea driving the dogfooding process is that while a product's designers are often blind to how user-friendly the product is, other employees—although not exactly typical users—at least bring fresh eyes to the product and are therefore more easily able to spot trouble points, nonintuitive steps, and other impediments. It is very easy to assume that your client is just like you; dogfooding helps bring implicit (and often flawed) assumptions to the surface, to check them against the facts, discover unexpected uses, and identify opportunities for redesigns that better serve everyday customers' needs. Dogfooding forces developers to reconcile their general, abstract knowledge with local or "situational" practical knowledge and thus raises the odds of generating a successful product. This approach is related to the importance of piloting and testing before wide-scale implementation, ideally with the designers themselves or with a subset of the users to ensure that the product (policy) has maximized effectiveness and efficiency. Chapter 11 discusses this process of piloting and testing in more detail.

Some activities analogous to dogfooding already exist in the public sector.[3] Governments can use "green public purchasing" as a means of testing environmental policies and greener products. By experimenting with policies and products within their own organizations, governments might make more informed decisions about how regulations might affect broader public and private markets (see OECD 2003). When the Behavioural Insights Team in the United Kingdom initiated an effort to improve services at employment centers, team members went through the centers themselves to get a better sense of the user experience. Sometimes, however, it is necessary for an organization to go directly to its customers or users to understand how they will behave in certain situations. In such cases, well-structured focus groups can be a useful research tool for giving planners access to the experiential worlds they do not otherwise encounter. They allow policy makers and designers to see the mental models of other people in action so that they can better understand their preferences, attitudes, expectations, and abilities—in the process generating useful insights at reasonable cost. Bringing "experts" into direct contact with "users" enables both parties to gain practical knowledge of how and why the other group behaves in the way it does.

Conclusion

This chapter has sought to explain why good people can make bad decisions. More specifically, it has sought to document four different ways in which development professionals can make consequential mistakes even when they are diligent, sincere, technically competent, and experienced. Largely because of the organizational imperatives within which they and their counterparts operate and the primary reference groups with which they associate most frequently—and thus whose approval they covet (or whose opprobrium they seek to avoid)—such professionals can consistently contribute to outcomes biased against those on whose behalf they are working.

In this sense, development professionals, like professional people everywhere, are likely to make decisions that favor certain groups over others. In the development context—where knowledge, status, and power differentials are rife—this often means that disadvantaged groups face additional hurdles to getting their voices heard, their concerns heeded, and their aspirations realized. Although these biases cannot be fully eliminated, being aware of their presence, their consequences, and the mechanisms and incentives underpinning them is the first step toward addressing them.

While the goal of development is to end poverty, development professionals are not always good at predicting how poverty shapes mindsets.

The second step is to put in place measures that might plausibly help counteract them. This chapter has identified four sources of bad decision making on the part of development professionals: complexity, confirmation bias, sunk cost bias, and the influence of context on judgment and decision making. Each of these can be addressed, at least in part, through organizational measures.

As this Report has shown, because the determinants of behavior are often subtle and hard to detect, better means of detection, starting with asking the right questions, are needed (see chapter 11). This would suggest a more prominent place for investing more extensively in analyses of local social and political economies (to better understand the nature of changing contextual idiosyncrasies).

In the case of confirmation bias, it is crucial to expose individuals to social contexts in which individuals disagree with each other's views but share a common interest in identifying the best policies and programs. This can be done through red teaming major decisions: that is, subjecting the key assumptions and arguments underlying policies to a critical and adversarial process. Other approaches take the form of double-blind peer review and more intense engagement with the scholarly community.

For sunk cost bias, the key is to change the interpretation of a canceled program or project. This involves recognizing that "failure" is sometimes unavoidable in development and encouraging individuals to learn, rather than hide, from it. Indeed, it is often unclear whether apparent futility is really a product of a fundamentally flawed strategy that no manner of persistence or tinkering can fix (and thus should be abandoned) or a product of a strategy that is otherwise fundamentally sound confronting a deeply ingrained problem—like dowry systems or child marriage—that requires courage and commitment for success even to be possible. Crucially, development professionals need to recognize that even failures are opportunities to learn and adapt. The more failures are treated as somewhat expected and as opportunities to learn, the easier it can be to let go of a failing project.

Finally, this chapter has also shown how giving inadequate attention to context can bias key decisions. The decision-making processes, languages, norms, and mental models of development professionals, whether foreign or domestic, differ from those of their clients and counterparts. To address these differences, development professionals can engage in more systematic efforts to understand the mindsets of those they are trying to help. For project and program design, development professionals should "eat their own dog food": that is, they should try to experience firsthand the programs and projects they design.

If the prevalence and effects of these four errors—and the many others discussed in preceding chapters—are as important as this Report suggests, development organizations face the stark choice of "paying now or paying later": they can choose to make considered, strategic investments in minimizing these errors up front, or they can choose to deal with all manner of legal, ethical, political, financial, and public relations disasters that may emerge after the fact. (Neglecting to choose is its own form of choice.) Good social science, hard-won experience, basic professional ethics, and everyday common sense suggest that "an ounce of prevention" is a far preferable course of action for delivering on the World Bank's core agenda and mandate.

Notes

1. The WDR team invited 4,797 World Bank staff (excluding consultants) from all sectors of the World Bank to participate in a survey designed to measure perceptions. The sample was representative of staff working in World Bank headquarters in Washington, D.C., and of country offices across the world. The final number of respondents was 1,850 staff (900 from headquarters and 950 from country offices, yielding a response rate of 38.6 percent), which is well above the 1,079 needed for representativeness.

2. The U.S. military (University of Foreign Military and Cultural Studies 2012) and the U.K. government (United Kingdom, Ministry of Defense 2013) both have guides to red teaming. IBM contracts out red teams as part of its consulting services—essentially to break into people's information technology infrastructure. They brand them "tiger teams," and the teams are seen as a model to be emulated. Grayman, Ostfeld, and Salomons (2006) describe using red teams to determine locations for water quality monitors in a water distribution system.

3. Roman emperors allegedly used similar techniques to ensure the reliability of bridges: after a given bridge was completed, those involved in its construction were required to sleep under it for several days. This practice ensured that all involved had the strongest incentive to build infrastructure that actually functioned reliably, rather than merely looking impressive or being completed on time.

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