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DON'T BELIEVE EVERYTHING YOU THINK:* COGNITIVE BIAS IN LEGAL DECISION MAKING

IAN WEINSTEIN**

This article discusses the role of cognitive bias in legal decision making. Drawing on research in cognitive science and law, it explores the impact of cognitive bias on both lawyers and clients. These often subtle mental biases can lead to pervasive errors in decision making by causing us to ignore important information and make inaccurate predictions. They may lead a client to underestimate the risk of litigation. They may also lead a lawyer to misclassify a client's value choice as a misjudgment of fact. The article offers illustrative stories of the impact of bias on both client and lawyer and suggests how to identify and attenuate these biases. It closes with the reminder that careful study and reflection will make us better legal counselors, but a precise analysis of lawyerly judgement still eludes us.

I. INTRODUCTION

"They took a bag from me, but this paper says it was a box," Mr. Worth repeated. "They have no case against me. No jury will send me away when the prosecutor is lying and saying the drugs were in a paper bag. A paper bag is not a box."

"I will argue that," I assured him again, "But what do you think the prosecutor will say about the bag or box business? Like I said before, I think the agent will just say it was a mistake on the complaint. The prosecutor will say that the drugs inside are what matters. I don't think the jury will focus the whole case on that."

"But it was a bag." He insisted.

"I hear you." I replied, nodding.

James Worth1 and I sat in an attorney client conference room on the third floor of the Metropolitan Correctional Center in New York

* Bumper Sticker on a Volvo 240 wagon.
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1 James Worth and the Worth case are composites based upon hundreds of clients with whom I have worked in the United States Courts for the Southern and Eastern District of New York. I was an Associate Attorney with the Federal Defender Services Division of the Legal Aid Society of New York from 1988-1991 and now represent defendants as a member of the Criminal Justice Act Panel for the Southern District of New York (SDNY).
City. He had been arrested on a complaint charging him with conspiracy to distribute cocaine. I had been appointed to represent him. This was our third meeting and it seemed to be going reasonably well. Mr. Worth asked relevant questions and was engaged in the discussion. He and I had not yet resolved our differences on the key question of whether or not a jury would convict him, but coming to a shared prediction about the outcome of a serious criminal case is a complex process for both lawyer and client. It should not be rushed.

I learned that lesson after representing hundreds of clients charged with federal felonies. As I reflected on my conversations with clients, I was often struck by how readily they mixed solid common sense and utterly illogical argument. I questioned my clients’ wisdom and sometimes noted that people who commit crimes are not distinguished by their good judgment. I was, in an important way, quite wrong. Whatever the quality of their judgment, my clients exhibit the same pervasive errors in decision making, commonly called cognitive biases, as the rest of us. 2 They are acting on the same cognitive biases that cause most of us to report that we are above average drivers, fail to wash our hands before dinner but refuse to go outside because of ticks and hold on to a losing investment far too long. Although there may be reason to think that defendants in criminal cases may be more prone to these errors, 3 these are differences in degree, not in kind. Both clients, and their lawyers, are subject to cognitive bias. This is an essay about how lawyers and clients can recognize and respond to cognitive illusions. The story of my defense of a federal narcotics case illustrates these problems, but this is just one example of a common set of lawyering problems. 4

2 Cognitive biases, also known as cognitive illusions, are systematic errors in judgment and prediction. They cause us to overpredict the frequency of rare but vivid events like airplane accidents while we underestimate the frequency of car accidents, which are much more common. These systematic biases have been of interest to cognitive scientists and experimental economists for some time. The classic works, which brought these ideas to wide attention are Daniel Kahneman & Amos Tversky, Prospect Theory: An Analysis of Decision Under Risk, 47 Econometrica 263 (1979); Daniel Kahneman, Paul Slovic & Amos Tversky ed. Judgment Under Uncertainty: Heuristics and Biases (1982).

3 For discussion of the role of individual difference on cognitive bias, see infra note 92 and accompanying text. Stress and distress may also increase cognitive error. See infra note 90 and accompanying text.

4 General analysis of lawyering is difficult. Varying norms govern the many different contexts in which lawyers use their specialized knowledge. Although clinical writers ask broad questions about lawyering, the range of variations in skills and substantive law across practice areas means that the answers to questions about lawyering are often inconsistent at all but the highest levels of generality. Should lawyers advance only their clients’ aims or also account for the needs of third parties or the legal system? Should lawyers offer unsolicited advice or refuse to offer advice when asked? General answers are often unsatisfactorily vague, but contextualized discussion can be quite rich. This essay is a contextualized approach.
Lawyers should account for cognitive bias in their clients and themselves for two reasons. First, recognizing and responding to cognitive bias or illusion can improve the quality of client decision making.\(^5\) Cognitive biases can lead to bad choices. A client may decide on a particular resolution of a case based on a faulty prediction about the likely outcome of a given course of action\(^6\) or an incorrect assessment about relative desirability of different outcomes.\(^7\) The lawyer may not effectively counsel\(^8\) the client\(^9\) because he or she may fall prey to the


The report of a conference at Fordham Law School on ethical issues in the legal representation of children is another example of context specific analysis of lawyering problems. The introduction discusses some of the particular problems posed by representing children. Bruce A. Green & Bernadine Dohnn, *Foreword: Children and the Ethical Practice of Law*, 64 FORDHAM L. REV. 1286-90 (1996) (discussing a range of problems lawyers typically encounter when they represent children and introducing more than a score of reports, articles and responses analyzing and suggesting approaches to remedy those problems).


\(^6\) See infra note 112 and accompanying text for a discussion of how cognitive bias can lead to bad predictions about the outcome of a trial or the judge’s ruling on a legal issue.

\(^7\) In choosing between two options, bias can make us more sensitive to the appearance of gain or loss than the actual difference in value between those two choices. For example, many poker players are happy if they make up earlier losses and end the game with the same amount as they started. Many are happier in that case than if they win early, lose much of it later and walk away with only a small portion of their earlier large winnings. The second player walks away with a profit, but feels the loss of the large stack of chips while the first player has only broken even but likely feels better about the game when it ends on a positive trend. See infra note 38, 39 for a more detailed discussion of anchoring and framing biases.

same cognitive bias or spot the problem but lack the tools to help the client overcome it. In any case, the result will be a bad decision about an important matter.

The second benefit to understanding cognitive illusion is improving the attorney client relationship. Clients often begin their own analysis with faulty reasoning but come to see their situation more clearly over time. Too many lawyer client relationships start badly, as conflict quickly develops around the differing initial views of the case. Understanding why this happens can encourage lawyers to give their clients time and guidance to acquire better information and process it more reliably. Lawyers and client can avoid conflict if they share a more accurate picture of the situation before them.

Although technical insight into cognition can improve lawyering, legal decision making cannot, and should not, be reduced to a mathematical calculus. The client's (and the lawyer's) emotional responses and the interpersonal dynamics between lawyer and client are almost always important and may often be determinative of the decisions clients make. More importantly, the significant decisions about which we counsel clients almost always come down to value choices;

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9 Legal counseling is multi-dimensional. Effective counseling requires command over doctrine, good communication skills, strategic vision and psychological insight into others and oneself. Recognizing and responding to cognitive illusions is just one of many problems that can arise during counseling. A skillful counselor must also be sensitive to the interpersonal impact of cultural, class and status differences, and learn to identify and respond to a range of psychological factors. For an introduction to the impact of cultural differences on counseling, see generally, Paul Tremblay, Interviewing and Counseling Across Cultures: Heuristics and Biases, unpublished manuscript presented at the International Clinical Conference on file with author, note 7 & 8 (citing works on cross cultural mental health including ALLEN E. IVEY & MARY BRADFORD IVEY, INTENTIONAL INTERVIEWING AND COUNSELING: FACILITATING DEVELOPMENT IN A MULTICULTURAL SOCIETY, (4th ed. 1999); DAVID SUE & DEARLD WING SUE, COUNSELING THE CULTURALLY DIFFERENT (3d ed. 1999); Earleen Baggett, Cross-Cultural Legal Counseling, 18 CREIGHTON L. REV. 1475 (1985); Susan Bryant, Five Habits of Cross-Cultural Lawyering, 8 CLIN. L. REV. 31 (2001)). For a discussion of the impact of race and status difference, see generally, Lucie E. White, Subordination, Rhetorical Survival Skills, and Sunday Shoes: Notes on the Hearing of Mrs. G., 38 BUFF. L. REV. 1 (1990); Michelle Jacobs, People From the Footnotes: The Missing Element in Client Centered Counseling, 27 GOLDEN STATE U. L. REV. 345 (1997). For motivational or other non-pathological psychological factors, see generally, Peter Margulies, The Virtues and Vices of Solidarity: Regulating the Role of Lawyers for Clients Accused of Terrorist Activities, unpublished manuscript on file with author (discussing the importance of emotional connection in legal counseling); mental illness, see e.g. James Cohen, The Attorney-Client Privilege, Ethical Rules, and the Impaired Criminal Defendant, 52 U. MIAMI L. REV. 529 (1998) (arguing that lawyers should be permitted to reveal confidences of mentally ill clients when the illness is known only to the lawyer and compromises the ability to make rational choices). Cognitive limitations, other health issues and language barriers are only a subset of the additional challenges we may face. Of course there is also a group of client counseling situations, probably quite large, in which none of these problems arise. Sometimes lawyers and clients understand each other and the legal matter at hand.
whatever the likely results of the various choices may be, our clients will choose what they think best for themselves.

Distinguishing value choices from cognitive biases or illusions in assessing a client's (or lawyer's) analysis of future results can be difficult. But making the distinctions and unpacking the cognitive bias is worth doing. Our clients should have the best predictions about the future and the best assessments of the relative merits of their choices before they apply their own personal preferences to make their decisions. Understanding bias will not yield perfect decisions but it can improve the process of decision making. If we understand the counseling process as, in part, guiding our client's information processing along a well trod, but sometimes problematic path toward predictions and assessments of relative merit, we may be more patient and effective counselors than if we regard the client as singularly foolish or lacking in judgment.  

II. COGNITIVE BIAS AND COGNITIVE SCIENCE

Research into cognitive bias is part of the contemporary turn toward cognitive science in psychology, philosophy and neuroscience. The movement gained momentum after World War II, and has roots in early twentieth century logicians and mathematicians.  

Cognitive science has reimagined the existence of mental representations were famously denied by the behaviorists.
mind as an information processing machine, shaped by evolution to respond to challenges in the world. Though there is a diversity of views on how well the information processor image captures the mechanics of consciousness, the image of mind as computer resonates throughout cognitive science.

Some contemporary critics continue to argue that mental representations do not add a useful layer of analysis, see infra note 16, although more of the contemporary action is in the vigorous debate over the proper characterization and level of analysis of mental representations.

Cognitive science returns us to the central Freudian question, how can we understand the role of the irrational in human psychology. Freud suggested that conflicts among our unconscious thoughts caused us to think and act irrationally. The behaviorists replaced that model with a simpler story in which all action was analyzed as response to environmental stimuli and apparent irrationality was just improperly analyzed stimulus and response. Cognitive science returns to the idea of mental entities of which we are unaware, but instead of unconscious emotions and desires, it posits an unseen information processing machine. It whirs away in the background, producing our conscious experience while we remain unaware of the process of production. Irrationality, cognitive science tells us, is the product of the constraints and imperfections in our information processing. This paradigm, like Freudian thought, posits a mental world which is not easy to see but may be glimpsed through a veil. Also similar is the devotee’s belief that this somewhat mysterious realm offers insights into human irrationality.

A strong form of the mind as computer metaphor can be found in Allan Newell & Herbert Simon, Human Problem Solving (1972), which gave contemporary problem solving study its theoretical underpinnings. They achieved some empirical success by viewing the mind as an information processing machine which takes in sensory input, processes it according to rules and creates our conscious experience of ideas and feelings. The operation of our processor is not revealed to us in our ordinary conscious experience, but can be studied empirically.

Viewing the mind as a computer leads to questions about how this particular machine works. Human memory has received attention. It is generally thought that the capacity of short term, or working, memory is quite limited. The classic article is, G. A. Miller, The Magical Number Seven, plus or minus two: Some limits on our Capacity for Processing Information, 63 Psychological Review 81 (1956), which gave rise to the common observation that short term memory can hold seven items, although the uncertainty expressed in the title remains the subject of important research and debate, see, Nelson Cowan, The Magical Number 4 in Short-term Memory: A Reconsideration of Mental Storage Capacity, 24 Behavioral and Brain Sciences, 87 (2001) (reporting results supporting a four item limit, with peer commentary). Whatever the actual limit, cognitive science has explored how this limit affects human cognition.

Another basic feature of our cognitive apparatus is that we can focus on only one thought at a time. This is known as serial conscious processing. Because we can only think about one thing at a time, how we choose that thought and how we move from thought to thought is of central interest to cognitive scientists. See generally, Herbert A. Simon, Machine as Mind, in Machines and Thought the Legacy of Alan Turing, Volume I, 87 (PJR Millican & A. Clark eds., 1996) (identifying serial conscious processing as a fundamental cognitive structure and constraint).

Of course not all who study thinking and reasoning are cognitive scientists or accept the mind as computer metaphor. For a critique of the computational metaphor from analytic philosophy, see, L. Jonathan Cohen, The Dialogue of Reason, 193-231 (1986) (arguing that the computational metaphor may be a useful psychological device but the mind cannot be reduced to a computational entity and analytic philosophy, the normative reasoning about the normative study of reasoning, is foundational and does not require or
Among those who did early work in this paradigm, however, the sheer vastness of the information processing the mind performs became a central problem.\(^{17}\) We must deal with huge amounts of information to make seemingly simple choices. Evolution has developed a host of shortcuts to enable us to deal with the volume of information we use to make everyday decisions.\(^{18}\) These mental shortcuts are known as heuristics.\(^{19}\) A heuristic is a problem solving strategy that

\(^{17}\) Some early and influential researchers used the insights of early cognitive science to analyze human problem solving. They tried to discover a general method of problem solving that would find answers across a wide range of disciplines. Their early work was not fruitful, as they could not find a single problem solving method that could efficiently process large volumes of information from different fields of knowledge. They subsequently discovered, however, that solving systems became more powerful as context specific solving methods were added, not as better general methods of analysis were found. The research began to move away from the search for a single, abstract method that could solve many different kinds of problems. Instead, researchers moved toward context and content dependent methods of problem solving. In other words, they learned that different problem solving methods are required for different kinds of problems. See Edward Feigenbaum, *What Hath Simon Wrought?*, in *Complex Information Processing, The Impact of Herbert A. Simon*, 172 (David Klahr & Kenneth Kotovsky eds., 1989); *Newell & Simon, supra* note 14, at 789 (discussing the context and content dependence of problem solving). This reorientation in problem solving research led to study of the consistent performance differences in the respective problem solving processes of novices and experts. Experts are able to solve problems in their area of expertise, or domain, much faster, more accurately and with much less conscious cognitive effort than novices. See Gary L. Blasi, *What Lawyers Know: Lawyering Expertise, Cognitive Science, and the Functions of Theory*, 45 J. LEGAL EDUC. 313, 328 n.32 (1995) (explaining and applying the novice expert distinction to lawyering). Good problem solvers deal with the challenge of information volume by thoroughly learning an area and organizing the information so that they can rapidly apply their knowledge to the problem at hand. Problem solving requires command over information and solving techniques appropriate to the context.

\(^{18}\) It is important to note that evolution achieves neither perfect, nor uniformly adaptive results. Some changes are neutral, some are adaptive, some are maladaptive but not deadly, some are adaptive at one time and maladaptive at another and others are maladaptive at one time and become adaptive as other changes occur. For an engaging defense of contemporary evolutionary theory from a psychologist's perspective, see Pinker, *How the Mind Works* 155-183. A more fully developed popular defense of the biological theory of evolution is Richard Dawkins, *The Blind Watchmaker* (1986).

\(^{19}\) Good heuristics are less resource intensive than completely reliable problem solving strategies, but not grossly less accurate. Statistical sampling is an example of a heuristic. Rather than ask the preference of every voter, we ask some and extrapolate the probable outcome of an election. Sampling has a margin of error and can result in inaccurate predictions. Asking every voter is a theoretically error free method of predicting the outcome, if they were all honest and consistent, but very resource intensive (and some will note that the election of 2000 illustrates that a large enough system generates sufficient noise to vitiate all but abstract claims to reliability).

Modern marketing plays heavily upon heuristics, as we make many purchasing decisions based on simple recognition or impressions, rather than complete and rigorous analysis. It may make sense to buy a heavily advertised brand of detergent on the theory that a company that invests money in building a reputation will be more careful to preserve that
often, but not invariably, gives a correct solution.\(^{20}\)

When crossing a street, we might try to measure a car’s speed and its distance from our crossing point. Then we could work out the math to determine if the situation is within the range of speeds at which we can safely cross the street. That is not what we do. When we cross a street, we look both ways. If we see a car, we make an almost, but not quite, instantaneous judgment about whether to walk, run or stay. Rather than knowing the speed and distance and calculating crossing time, we sense or feel that it is either safe to cross (perhaps we should run) or not safe to cross. We also have a margin of error figured in and we register surprise and discomfort if the car comes closer than we expected. This street crossing judgment is a heuristic. We use visual cues which permit us to make rapid judgments of speed based on the perceived size of a moving object.\(^{21}\) It

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\(^{20}\) The idea that cognition is a scarce resource that must be conserved by stopping at solutions that are good enough for a given purpose is a key element of the concept of bounded rationality. The Nobel prize winning economist Herbert Simon first popularized the idea that we should focus on the limits of cognition to understand how we actually analyze the world, as opposed to how we might analyze the world if human cognition were limitless and we enjoyed unbounded rationality. He coined the term “satisficing” to capture the idea of making an acceptable choice among alternatives in a manner that respects the limitations of time and knowledge. Gerd Gigerenzer, Peter M. Todd & the ABC Research Group, Simple Heuristics That Make Us Smart, 12-14 (1999) (describing Simon as the father of bounded rationality). For a useful scholarly introduction and review of the literature on bounded rationality see, John Conlisk, Why Bounded Rationality?, 34 Journal of Economic Literature, 671 (1996).

\(^{21}\) As anyone who has ever driven by an airport and observed jumbo jets seeming to hang in mid air over the runway has experienced, our heuristic dependence on judging distance as a function of size simply cannot accept that a jumbo jet is as large and fast as it is. Rather than recognize that a huge object is flying through the air at high speed, we reduce the speed to account for its size. The effect is the image of a jet hanging in mid air. We are not well adapted to judge the speed of jumbo jets, but we are better adapted to judge the speed of cars, which are not much bigger that many carnivorous predators and don’t move all that much faster.
works quite well in most settings and once we have developed this judgment, few people get hit by cars.

Street crossing judgment and calculation of the time at which the car will enter our crossing zone each have their strengths. Calculation involves higher deliberation costs but is more generalizable and can be reliably replicated. Heuristics are efficient, ubiquitous and invisible. We are not conscious of our constant use of shortcuts to manage information. It is just the way we think. Despite their similar functions, heuristics and rigorous calculation\(^{22}\) are not the same in at least two important respects. The two always use distinct methods of analysis. More importantly, the answer to the same question is sometimes different, depending on which kind of analysis is used.\(^ {23}\)

If we can make decisions in different ways, perhaps we choose the best method for the problem. After all, crossing a street is quite different from making a decision as important as how to resolve a serious criminal charge. One decision requires immediate action and has no lasting consequences, unless the decision is an utter failure. The other decision typically permits time for careful study and reflection, and is made in consultation with others. Thus, one might think that people would use more rigorous analysis when they decide how to resolve a criminal case than they would when they cross the street. In fact, our conscious experience would lead many of us to the strong conviction that we make important decisions in a wholly rational way,

\(^{22}\) The alternative to heuristics, which are solutions from bounded rationality, are “solutions from unbounded rationality.” See supra note 20.

\(^{23}\) Another critique of the cognitive bias literature grants that our minds use shortcuts in reasoning, but argues that those shortcuts do not have any systematic bias. These critics argue that bounded rationality, properly utilized and understood, yields the same answers as unbounded rationality. They argue that while it is undeniable that people make decisions that diverge from the choice of the hypothetical rational actor, the experimental data supporting pervasive bias is explained as the result of random errors that cancel each out in the aggregate, individual differences among subjects, experimental error and miscalculation of the sample problems. See, e.g., L. J. COHEN, THE DIALOGUE OF REASON, 149-192 (1986). For a very thoughtful and thorough discussion of the literature on this debate, see, Keith E. Stanovich & Richard F. West, Individual Differences in Reasoning: Implications for the Rationality Debate, \(23\) BEHAVIORAL AND BRAIN SCIENCES 645 (2000) (concluding that while intelligence, problem definition and contextual factors all give rise to performance errors, a significant gap remains between the normatively predicted rational result and the actual descriptive result which can best be explained by a pervasive and systematic element of irrationality or cognitive bias). Stanovich and West characterize the clashing camps as the Meliorists, who see pervasive errors and wish to correct them, and the Panglossians, who offer other explanations for apparent irrationality and defend the rationality hypothesis. For a recent example of the Panglossian camp in the legal literature see, Gregory Mitchell, Taking Behavioralism Too Seriously? The Unwarranted Pessimism of the New Behavioral Analysis of Law, \(43\) WM. AND MARY L. REV. 1907 (2002) (arguing that incorrect problem definition, experimental error, inappropriate generalization from group behavior to individual decision making and other flaws cause advocates of behavioral economics to overstate its reach in the law).
thinking everything through and taking no shortcuts.

Unfortunately, research does not support the view that people are typically less subject to cognitive bias when they make important decisions.\textsuperscript{24} We often spend more time considering important decisions. But most of us do not collect complete data or engage in systematic analysis of the data we have. Nor do we typically use generally accepted techniques to assess and review our conclusions. When we choose a law school, buy a home or analyze a settlement offer, we generally rely on our judgment.\textsuperscript{25}

Empirical work suggests that we can improve our judgment if we are conscious of our cognitive biases and practice correcting them.\textsuperscript{26} The studies also show that it can be difficult for even trained, careful professionals to identify and completely correct for the way our minds work.\textsuperscript{27} Let us return to Mr. James Worth and his lawyer and begin

\textsuperscript{24} Conlisk, \textit{supra} note 20, at 671-72 (noting there is some evidence that repeat players with significant stakes will accept high deliberation costs to attenuate some biases but that other evidence suggests that high stakes alone do not tend to improve decision making); Russell Korobkin & Chris Guthrie, \textit{Psychology, Economics and Settlement: A New Look at the Role of the Lawyer}, 76 TEX. L. REV. 77, note 71 (citing Richard H. Thaler, \textit{The Psychology and Economics Conference Handbook: Comments on Simon, on Einhorn and Hogarth, and Tversky and Kahneman, in Rational Choice: The Contrast Between Economics and Psychology} 95, 96 (1987) and two other studies as supporting the view that higher stakes do not attenuate bias).

\textsuperscript{25} For a vigorous and thought provoking argument that ecologically tuned heuristics can be more reliable than solutions from unbounded rationality, see, Gerd Gigerenzer & Daniel G. Goldstein, \textit{Betting on One Good Reason: Take the Best Heuristic}; Jean Czerlinski, Gerd Gigerenzer & Daniel G. Goldstein, \textit{How Good Are Simple Heuristics}; Laura Martignon & Ulrich Hoffrage, \textit{Why Does One-Reason Decision Making Work: A Case Study in Ecological Rationality}; Jorg Rieskamp & Ulrich Hoffrage, \textit{When Do People Use Simple Heuristics, and How Can We Tell}; Laura Martignon & Kathryn Blackmond Laskey, \textit{Bayesian Benchmarks for Fast and Frugal Heuristics}, in Gerd Gigerenzer, Peter M. Todd & the ABC Research Group, \textit{Simple Heuristics That Make Us Smart}, 75-190 (1999) (marshaling empirical and theoretical support for the robustness and validity of simple heuristics as measured against results from unbounded rationality). Gigerenzer argues that fast and frugal heuristics are related to satisficing, but are a distinct branch of bounded rationality that relies more upon environmental structure to resolve a broader range of problems. \textit{Id.} at 15. Although I find Gigerenzer's view compelling, not all experts in that field agree with his ecological focus. For a discussion locating this view in the debate, see Stanovich & West, \textit{supra} note 23 at, 663.

\textsuperscript{26} A 1982 study summarizing the results of 40 studies on overcoming bias suggests that some techniques can lessen the impact of some biases. Baruch Fischoff, \textit{Debiasing, in} Kahneman \textit{et al., supra} note 2, at 422. A more recent work surveying nine different debiasing studies, including Fischoff, concludes that although some techniques "do attenuate biases, the attenuation is typically limited." Conlisk, \textit{supra} note 20, at 671 (surveying research on bounded rationality and heuristics and concluding that wide ranging evidence, explanatory success, methodology and scarcity of cognitive resources support research on bounded rationality).

\textsuperscript{27} David M. Eddy, \textit{Probabilistic Reasoning in Clinical Medicine: Problems and Opportunities}, in Kahneman \textit{et al., supra} note 2, at 249 (arguing that medical doctors misuse probabilistic reasoning in clinical diagnosis in a manner consistent with cognitive biases);
the work of discovering how each of them may display and correct cognitive bias.

III. MR. JAMES WORTH: AN EXAMPLE OF THE PROBLEM OF COGNITIVE BIAS IN LEGAL COUNSELING

James Worth is twenty-six and in jail for the first time in his life. Mr. Worth grew up in Baltimore and New York City. At the time of his arrest, he was working as a prep cook at a chain restaurant on 48th Street. A soft-spoken and articulate man, Mr. Worth liked to snort cocaine occasionally, borrowed too much money from his family and played the lottery three or four times a week. Until now, he had made good enough choices, and had enough good fortune, to be a 26 year old New Yorker with a job, a stable social network and no criminal convictions. His situation had changed.

The criminal complaint alleged that Mr. Worth and others had conspired to sell five kilograms and more of cocaine. The government asserted that a confidential informant had twice recorded Mr. Worth negotiating to sell cocaine. On the day of his arrest, he was observed talking to one of his co-defendants on a street in lower Manhattan. He and his co-defendant then went to the trunk of a parked car. The co-defendant opened the trunk and Mr. Worth removed a brown paper bag. He and his co-defendant were putting the bag in the trunk of another car when they were arrested. The bag contained five one kilogram bricks of cocaine, wrapped in paper and tape.

Chris Guthrie, Jeffrey Rachlinski & Andrew Wistrich, Inside the Judicial Mind, 86 CORNELL L. REV. 777, n. 26 (2001) (analyzing data showing the United States Magistrate Judges display cognitive biases and collecting studies showing biases in auditors, psychologists, physicians, option traders, soldiers and real estate agents); SCOTT PLOUS, PSYCHOLOGY OF DECISION MAKING, 258 (1993) (collecting studies on the judgments of experts, some of which show significant correction of biases, some of which show attenuation of bias and others that report experts display the same biases as college students).

28 The complaint is the initial charging document in a federal criminal case. It contains a sworn statement of the facts upon which the government relies to establish probable cause to initiate the prosecution. See FED. R. CRIM. P. 5; Gerstein v. Pugh, 420 U.S. 103 (1975) (requiring that a sworn statement establishing probable cause be promptly filed to support any warrantless arrest or continued custody). An indictment will later replace the information and become the formal statement of the allegations upon which pleading and trial will proceed. Indictments have little narrative, generally reciting no more than the statutory language with dates and places added, and offer much less information about the government's probable factual theory than the information.

29 The quantity of the drugs charged in the indictment is phrased using a term of art which triggers the mandatory minimum provision of 21 U.S.C. § 841(B)(1)(A) (2002). Conviction for distributing five kilograms and more of cocaine carries a ten year mandatory minimum. The actual sentence is subject to the sentencing guidelines and certain statutory exemptions from the mandatory minimum. See infra note 68 and accompanying text.
I was appointed\textsuperscript{30} to represent Mr. Worth on the day he first appeared in the United States District Court for the Southern District of New York. I knew that he was in a very serious situation.\textsuperscript{31} In the next days, weeks or months he would make decisions that would determine whether he would spend the next two, eight or twelve years in prison. These would be some of the most important decisions Mr. Worth would ever make.\textsuperscript{32}

Like all of us, he struggles to make sense out of a dangerous and unfamiliar world. He uses the same talents, strengths and strategies that have served him all his life. Here, however, he is making a decision for which we insist he have counsel. How well does he, and his counselor, size up the situation?

\textbf{A. The Meeting Before the Initial Appearance}

I first met Mr. Worth in a cellblock interview room on the fourth floor of the federal courthouse. We sat at matching metal counters on opposite sides of a mesh grill. I was in a suit and laid my law books on the counter. He was dressed in a knit shirt and khakis. He sat down and rested his handcuffed hands on his side of the counter.

"Hello Mr. Worth, my name is Ian Weinstein. I am a lawyer and the court will appoint me to represent you unless you make other ar-

\textsuperscript{30} Pursuant to the Criminal Justice Act, 18 USC 3006A.

\textsuperscript{31} As in any serious criminal case, the defendant is brought unwillingly to the law and his or her liberty is at stake. Federal narcotics sentences averaged 76.4 months in 1999. U. \textsc{s. Sentencing C\textsuperscript{c}omm\textsuperscript{e}n, 1999 SourceBook of Federal Sentencing Statistics table 7 (2000). Almost one-third of the group in this average received a sentence reduction (median reduction of 48\%) for assisting the government and another 15\% received other kinds of sentence reductions (median reduction 38.9\%). \textit{Id}. at tables 9, 30 & 31. The average sentence for the portion of the defendants who went to trial or did not receive favorable sentencing consideration, and appealed their cases and/or sentences was 180 months. \textit{Id}. at table 61. There is a great deal at stake and a range of sentencing outcomes from the terrible to the truly horrific.

\textsuperscript{32} Lawyering in high stakes cases poses challenges. The stakes in any particular matter must usually be evaluated relative to the client's situation. An eviction matter can be a life or death case to a person in public housing who lives in New York City but may be little more than an inconvenience to a person of means who can easily find other housing. Similarly, a minor criminal matter can be devastating to a professional with licenses at stake, but of less concern to some others. The relative value of punishment upon different offenders has been the subject of much comment. \textit{See}, e.g., John R. Lott, Jr., \textit{Should the Wealthy be Able to "Buy Justice"?}, 95 J. Pol. Econ. 1307 (1987) (arguing that white collar crimes are overpenalized because any penalty also carries a very high reputational cost); Dan M. Kahan, \textit{Punishment Incommensurability}, 1 Buff. Crim. L. R. 691 (1998) (arguing that the public would be more accepting of alternative sentencing if it were recast to emphasize the blameworthiness of the offenders). Whatever the relative costs and merits of other kinds of actions and sentences, criminal cases that involve prison sentences averaging six years, with the potential for sentence over 15 years, are high stakes matters of singular importance to the defendants charged. Perhaps this is because lengthy sentences of imprisonment are all measured against an invariable metric - human lifespan.
rangements for a lawyer,” I said, by way of introduction.

“OK” he replied, “When am I getting out?” He sounded worried and tired, but he did not seem agitated. That lessened my apprehension a notch.

I looked him in the eye and told him, “That is my main concern right now and I want to talk to you about bail, but how are you?”

I was taught that the first interview in a serious criminal case has three goals. The first is to begin to build rapport with a new client. The second is to develop the strongest possible bail argument by learning about the client’s background and situation. The third goal is to learn whether immediate factual development or investigation is required. I pursued those goals, trying to build rapport by beginning with my client’s immediate situation. I asked whether he had eaten, how long had been in custody, had he slept and did he have any immediate medical needs. Then I paraphrased the complaint, explained its function and summarized the broad outlines of the possible and likely penalties, should he be convicted. I also gave him a summary explanation of the initial phases of a criminal case and a longer description of the process for determining whether he would be released or detained pending trial.

Returning to information gathering, I moved back in time to his arrest. I hoped to learn if he had made any statements to the authorities and to get a sense of whether the circumstances of his arrest might give rise to any legal issues. We spoke very little about the facts of the case. Mr. Worth did tell me that there was box in the trunk of his car, not a bag. He also said they did not have a case against him. I answered that it was too early to evaluate the case and that we would learn more soon.

I already knew that the government was going to request the three day adjournment of the detention hearing to which it was statutorily entitled. As Mr. Worth would be held for three days no mat-

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33 For a fuller explication of this view of the initial interview in a criminal case, which puts most factual development off until a second interview, see HARRY SUBIN, CHESTER MIRSKY & IAN WEINSTEIN, FEDERAL CRIMINAL PRACTICE: PROSECUTION AND DEFENSE, § 6.6 The Initial Defense Interview (1992).

34 At this stage, discussion of the potential penalties will be very general. I would explain the statutory maximum and any statutory minimum as part of reviewing the statute, but offer only the most general characterizations, of the broad range of possible sentences. I always tell clients that statutory maxima are so high in federal law that they really do not offer any useful information about the probable sentence. I also note that almost all sentences are far below the maximum. I have now learned, however, that the framing literature suggests that these very high numbers might play more of a role in client thinking than I had supposed. I have become more cautious about discussing penalties early in a case as a result of this research.

35 18 U.S.C. § 3142(f) (2002) (upon government request the hearing may be delayed for up to three days, or longer upon a showing of good cause).
ter what happened, there were no immediate decisions to be made. I started to conclude the interview by turning to the financial affidavit required to prove that he qualified for appointed counsel. I made sure I knew who he wanted me to contact and how to reach them. Then I told him I would see him in the courtroom and walked out of the interview room. As I waited to be buzzed into the public corridor of the courthouse I heard the clang of the metal door on Mr. Worth’s side of the interview room.

My inquiry into the facts underlying the charge was cursory and I did not ask Mr. Worth if he had agreed with others to distribute narcotics. I tried to give him the opportunity to raise those matters if he chose and I listened carefully for details that might suggest the need for immediate investigation. I made no predictions or promises about how the case would come out and tried to express concern for Mr. Worth but agnosticism about the merits of case. I was taught that this sort of initial interview protects the nascent attorney client relationship. People in bad situations often want an immediate prediction or evaluation, but great damage can be done when an initial assessment, based on incomplete or inaccurate information, is inaccurate. Cognitive bias research illuminates why early predictions, even if expressed in very tentative terms, can cast a cloud over the whole counseling relationship.

1. **Framing and Hindsight Biases**

First impressions make a big cognitive difference. Lawyers must exercise great care in offering early evaluation of their clients’ legal situations because that assessment will likely become the benchmark against which subsequent events will be measured. Though Mr. Worth has a general idea of the gravity of his situation, the first specific information about possible or likely outcomes will become the baseline against which other developments will be measured. An early suggestion that the prosecution has a weak case, even if couched

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36 Although this is not an essay on initial interviews in criminal cases, I note that there are good reasons to delay factual inquiry in this case. When a defendant is arrested for conduct that spanned several months, there is little reason to think his or her recall for those events will be better immediately after the arrest than it will be two or three days later, after pretrial release and other preliminary issues have been resolved. An interview conducted within a few days will almost always be more conducive to a productive discussion. The lawyer can use the bail proceedings and other initial matters to build trust and the client will often benefit from time to calm down after the shock of the arrest. The lawyer must, however, look for matters that must be developed at the first interview. The facts of the arrest are very fresh and will often be relevant to pretrial motions. Careful interviewing may also reveal evidence that may need to be swiftly preserved or other matters that require immediate attention. In general however, only a very narrow group of facts require immediate development.
in tentative language, will make subsequent bad news seem even worse. This is an example of the cognitive bias known as framing, or anchoring, which is the tendency to give undue positive weight to improvement relative to a perceived baseline, while viewing loss relative to that marker in an unduly negative light. In addition to taking on disproportionate weight in decision making, those perceptions of gain or loss will also tend to crowd out other, sometimes more important, factors.

In its general form, framing bias is the tendency to view a given problem in different terms depending on the perspective from which the problem is viewed. More narrowly, it is the tendency for people to avoid risk to protect what they perceive as a gain but seek risk to avoid what they understand as a loss. An experiment offers an example of the impact of framing on legal decision making. Two groups of subjects were presented with a proposed settlement of a hypothetical car accident case. Each group was told that they had lost $28,000, and each was offered $21,000 in settlement. Both groups were told they had the same chances if they continued to litigate the matter and were given enough information to determine that the settlement offer was higher than the expected value of litigation. Although the economics were the same for both, the group for whom the offer was framed as a gain was more likely to settle than the group for whom it appeared to be a loss.

One group, which I will call the gainers, was told they had incurred $14,000 in medical expenses, which had already been reimbursed by their health insurance company. The remaining $14,000 in

37 The client's evaluation of a given outcome can also be greatly effected by his or her emotional state. A bad offer conveyed sympathetically may seem more desirable that a good offer conveyed with hostility. The cognitive science research indicates that whatever else is going on, people will still tend to seek risk to avoid a loss and are risk adverse if they perceive the situation as one that involves protecting a gain. See infra notes 89-92 and accompanying text.

38 Amos Tversky & Daniel Kahneman, Introduction to Kahneman et al., supra note 2, at 14-20 (defining adjustment and anchoring as the tendency for “different starting points [to] yield different estimates, which are biased toward the initial values). Russell Korobkin & Chris Guthrie, Psychological Barriers to Litigation Settlement: An Experimental Approach, 93 Mich. L. Rev. 107, 129-140 (1994) (discussing how anchoring and framing in litigation decisions leads to “loss aversion,” or the willingness to accept greater risk to avoid a result perceived as a loss than the degree of risk acceptable if the same change in economic position is perceived as a gain).

40 This example is from Korobkin & Guthrie, supra note 24, at 88-93.

41 The amount of the recovery depended on the judge's ruling on a legal matter that could limit the damages to $10,000. There was a 50% chance of a favorable ruling, in which case the damages would be $28,000 and a 50% chance of an unfavorable ruling, in which case the recovery would only be $10,000. Id. The expected value of the litigation is $19,000, the mid point between the two equally likely outcomes. The settlement offer of $21,000 is $2,000 more than the expected value of litigation.
damages was the total loss of an older Toyota for which there was no
collision insurance. The gainer could see themselves as profiting
from the settlement; they could take the $21,000, replace the $14,000
car and still have $7000 remaining.

The other group, which I will call the losers, was told that they
had incurred $4000 in medical expenses, also already reimbursed. The
remaining $24,000 in damages was the total loss of a BMW, for which
there was no collision insurance. The losers could see this offer as a
loss because they would still needing another $7000 to replace their
lost cars. The losers settled at a lower rate than the gainer.

The difference in settlement rates is irrational, at least to an economist.
The losers acted as though they were choosing between this settle-
ment and getting their BMWs back. But that was not the relevant
comparison. For both groups, the relevant comparison in making this
choice, at least on the numbers, is between the settlement offer and
the probable value of going to trial (the likelihood of winning multi-
plied by the likely award). Comparing the offer and the out of
pocket loss or gain is simply not relevant to comparing the value of
settlement with the value of the trial. But it is the perception of loss
or gain that often weighs more heavily upon us than logic.

This is the same phenomenon that causes many people to hold
losing stocks. Although solid data shows that long term profits are
maximized by selling losing stocks and reinvesting the proceeds in
other equities, many of us resist selling at a loss. We tend to hold a
losing stock, intending to sell it only when its price rises so we can
avoid that apparent loss. In the meantime, we lose more money fore-
going other investment opportunities. Gain foregone is much less
cognitively pressing than loss recognized.

Framing bias explains why the initial evaluation of a legal situa-
tion such as Mr. Worth's can have such a dramatic impact on his deci-
sion making. If a lawyer paints a bleak picture, the actual plea offer
will often sound like a significant gain in comparison. Given that

42 Korobkin and Guthrie report that the Toyota group indicated an average response of
4.43 between “definitely accept” and “probably accept”, while the BMW group, at 3.64,
was somewhat below “probably accept” on a five position scale of (5) definitely accept, (4)
probably accept, (3) undecided, (2) probably reject and (1) definitely reject. The results
are statistically significant. Korobkin & Guthrie, supra note 24, at 90, 100. They also note,
“[p]erhaps more telling, only one Toyota Driver out of forty-two subjects said he or she
would “probably reject” or “definitely reject” the offer, in contrast to nine of forty-four
BMW drivers who would “probably reject” or “definitely reject” the offer, with an addi-
tional seven undecided.” Id. at 100. Although most of the subjects would accept the offer
in either case, at the margins framing makes a difference and the margins can be quite
wide.

43 That is, the $21,000 settlement compared to the $19,000 expected value of litigation.

44 DePippa, supra note 5, at 111 (discussing how framing bias leads to excessive rates of
people tend to avoid perceived loss and seek perceived gain, that client will have a greater tendency to accept a plea offer preceded by bad news. In contrast, an early suggestion that an acquittal is possible, often made in an effort to build rapport with clients who feel compelled to vociferously maintain their innocence when they first meet their lawyer, may frame all future plea discussions as losses. Of course the key comparison is between the plea and the likely result of other choices, not between the client’s understanding of the lawyer’s initial impression and the plea offer. But the initial frame makes a big cognitive difference. Lawyers can manipulate clients in these initial discussions. Premature evaluation can cause a defendant to embrace the risk of a trial that he might otherwise avoid or to accept an offer because it is better than some bad outcome that would never

guilty pleas). For an interesting argument that also analyzes the impact of framing on pleas but may not account for the particular incentives in federal narcotics cases, see, Richard Birke, *Reconciling Loss Aversion and Guilty Pleas*, 1999 *UtaH L. Rev. 205* (arguing that irrationally high rates of guilty pleas are caused, in part, by framing effects).

45 A variety of pressures can lead lawyers and clients to expressions of overconfidence early in a case. Lawyers in private practice often need to reassure new or prospective clients about their zeal and skill. Daniel C. Richman, *Cooperating Clients*, 56 *Ohio St. L.J. 69, 120-26* (1995) (arguing that retained counsel must build and retain reputations as tough, zealous advocates for innocence). This encourages strong claims by the lawyer at the outset of the case. Institutional defenders, on the other hand, may face pressures that encourage them to use framing bias in order to counsel clients to plead guilty. Birke, *supra* note 44, at 240-42. From the clients’ point of view, meeting their lawyers for the first time may impel them to vigorously claim innocence because they think they will get better representation if the lawyer believes that claim.

46 Stephen Ellmann has suggested that manipulation has two principal elements. “First, is an effort by one person to guide another’s thoughts or actions in a direction desired by the person guiding. Second, the manipulator seeks this goal by means that undercut the other person’s ability to make a choice that is truly his own.” Stephen Ellmann, *Lawyers and Clients*, 34 *Ucla L. Rev. 717, 726* (1987). For a full discussion of Ellmann’s subtle and insightful views on the difficulties of respecting client autonomy see, John K. Morris, *Power and Responsibility Among Lawyers and Clients: Comment on Ellmann’s Lawyers and Clients*, 34 *Ucla L. Rev. 781* (1987) and Stephen Ellmann, *Manipulation by Client and Context: A Response to Professor Morris*, 34 *Ucla L. Rev. 1003* (1987). Clients vary greatly in their susceptibility to lawyer domination and manipulation. Some clients consider their appointed criminal defense lawyer a figure of great authority and present as, and sometimes actually are, anxious to cede control. Others consider their appointed lawyers useless at best and covert prosecutors at worst and are strongly disinclined to follow the lawyer’s advice.

47 Clients also have access to other sources of information about potential penalties and typical outcomes. Incarcerated prisoners share information and misinformation, family and friends offer their views and court proceedings provide information. Although *Fed. R. Crim. P. 5* does not require notice of the maximum penalty at an initial appearance, it is often discussed as part of the argument for pretrial release. Many judicial officers will also include that information in the formal notice of the charges in the complaint. Maximum sentences in federal law are typically very high and some research suggests that very high or low anchors are most powerful. *Plous, supra* note 27, at 152. The mention a high maximum sentence at initial appearance may set a high anchor and encourage pleas by making even unexceptional plea offers more appealing.
actually come to pass.

The potential for damage from premature evaluation and framing is heightened by hindsight bias, the general tendency to view past events as having been more predictable than they were at the time, makes framing errors hard to see. Events take on a cast of inevitability in hindsight, even when they seemed quite uncertain in prospect and we do not recall the mistakes from which we might learn.

Consider our view of an upcoming local election. Suppose we think a first time candidate may win a local election because her views on development of open space are shared by many new residents who did not vote in the last election. We might be unsure, however, how many new residents there are and whether they will vote in the local election. On election morning we feel the outcome is promising for the first time candidate, but uncertain. After the event, when the new candidate wins, we look back on her election as a certainty and remember that we knew it all along. The apparent memory of knowing it all along, when in fact we were uncertain before the event, is hindsight bias.

In order to understand hindsight bias, we must first recognize that memory is a dynamic process of reconstruction. We do not pull memories fully formed from a file cabinet in our minds, but rather assemble pieces of the memory each time we recall an event.\textsuperscript{48} Experimental data suggests that hindsight bias begins when we replace or update information about an event or situation with more current information. Then we use the updated information, instead of the old information, when we next construct the relevant memory.\textsuperscript{49} In this example, when we think about the election before the event, we use our uncertain information about voter turnout. Then the election gives us better information on that topic and we replace the uncertain information. Now we have more reliable information that the new voters were, in fact, a large bloc of actual voters. When next we

\textsuperscript{48} Each instance of remembering requires reconstruction, rather than a simple act of recalling an intact image. Daniel L. Schacter, \textit{Memory Distortion: History and Current Status}, in Daniel L. Schacter, ed., \textit{Memory Distortion}, 19 (1995) ("the idea that storage and retrieval of explicit memories involves binding together different kinds of information from diverse cortical sites provides a biological basis for the notion that retrieval of a memory is a complex construction involving many different sources of information-not a simple playback of a stored image."); James L. McClelland, \textit{Constructive Memory and Memory Distortions: A Parallel-Distributed Processing Approach}, in \textit{Memory Distortion} at 69-70 (noting the groundbreaking work of F.C. Bartlett and U. Neisser in developing the idea that memory is a constructive process).

seek information about the likelihood of that group voting, we find we are quite certain about that fact. We plug that information in when we reconstruct our memory of our earlier prediction and find that we knew it all along.

Although replacing the old information for all purposes leads us astray in remembering our earlier uncertainty, it is generally quite efficient. Replacing old incorrect information with more reliable data will lead to better predictions. That is a desirable outcome. Yet, when we ask ourselves about the past, it will make the result seem more certain than it was. We will recall that the candidate was supported by this large bloc of people who actually turn out to vote - how else could the election have come out? While it is possible to search our long term memory to recall our earlier uncertainty, typically we do not. Instead, we use the more efficient strategy of reevaluating the question in the light of our current, and more reliable, information.50

In legal counseling and decision making, hindsight bias can reinforce the dangers of premature decision making. Hindsight bias will make Mr. Worth, as it makes all of us, less sensitive to the contingent, uncertain nature of our decision making. In retrospect, events seem and feel much more orderly, predictable and inevitable than they appeared in prospect. As we will see later, hindsight bias is just one reason why people do not tend to critically evaluate51 the information upon which they base their decisions.52 After all, we have all made a host of decisions in our pasts and they fit together in an almost seamless web of inevitable events. There is no reason to begin to question our judgment.

Perhaps the answer is obvious in the Worth case — Mr. Worth faces a serious situation and must handle the case with great care. It may not, however, be so obvious in the moment that a criminal case requires one to reevaluate how to think about probabilities and information validity. That is not most people’s experience of the effects of a life crisis. Indeed, it should not be. Optimism, confidence in one’s abilities and a sense that the world is predictable are generally adaptive traits, but may not be optimal.53 Sensitive ears may help us hear a

50 For an overview of hindsight bias see, Baruch Fischoff, For Those Condemned to Study the Past: Heuristics and Biases in Hindsight, in KAHNEMAN ET AL., supra note 2, at 335. For research on the effect of hindsight bias on litigation, see Guthrie, Rachlinski & Wistrich, supra note 27, at 780.

51 Confirmatory bias, or the tendency to attend to and use evidence that supports a position we already hold also militates against successful critical evaluation of our own ideas. Lee Ross and Craig Anderson, Shortcomings in the Attribution Process: On the Origins and Maintenance of Erroneous Social Assessments in KAHNEMAN ET AL., supra note 2, at 149.

52 See infra note 83 and accompanying text on egocentric bias.

53 For discussion of the role of affect, see infra 91 and accompanying text.
predator rustling grass, but are ill suited to satisfy an appetite for loud rock concerts.

We should resist the temptation to make early diagnoses and predictions. Clients will frequently ask for predictions early in a case. But answering those questions can have serious unintended consequences. Even tentative, offhand comments can feed the cognitive tendency to make rapid judgments that may diverge from the results of a more carefully considered analysis. The danger of biasing future decisions outweighs the claim that respect for clients requires that we answer their questions as best we can and emphasize that early judgment is very tentative and uncertain.

There are dangers at both extremes. We would be wrong to offer an assessment at the very first moment, but also wrong to withhold assessment as the case progresses. We are neither completely rational, nor wholly irrational. Respect for client autonomy should not be equated with ignoring the complexities of human decision making, nor should our understanding of some aspects of human reasoning tempt us into thinking we know our client's mind better than does he or she. The skillful legal counselor must have enough expertise to use appropriate tools to gather and evaluate information and help clients use it effectively. Respect for our clients requires us to use our expertise and best judgment.54

B. The First Counseling Session

Three days later Mr. Worth was detained without bail.55 I went to see him at the Metropolitan Correctional Center (MCC) the following day. He had been in custody for five days56 and was scared, anxious and a bit angry. We talked about his experiences over the past several days and his feelings about what had happened since his arrest. I described my conversations with his brothers and their concern for him. We talked about the detention hearing and the chances

54 See generally, DePippa, supra note 5 (arguing that counseling informed by prospect theory will recognize that neither client or lawyer is perfectly rational and will steer a pragmatic course between the ideological poles of client centered and lawyer centered counseling).

55 In 1999, 70.9% of the narcotics trafficking defendants who had a detention hearing were detained. BUREAU OF JUSTICE STATISTICS, COMPRENDIUM OF FEDERAL JUSTICE STATISTICS, 1999, Table 3.5 http://www.ojp.usdoj.gov/bjs/pub/pdf/cfjs9903.pdf. Mr. Worth, however, had a reasonable chance to have bail set. He is an American citizen with a stable residence, a job and no prior record. The government prevailed by arguing the statutory presumption, the lengthy potential sentence, the strength of their evidence and the fact that a co-defendant carried a gun. See 18 U.S.C. § 3142 (2002) (listing factors relevant to bail determinations).

56 He was arrested on day one, had a bail hearing on day four and I saw him again on day five.
Don't Believe Everything You Think

Spring 2003

for getting him released later in the case. After a while, Mr. Worth asked me about the case and what I thought would happen. This was the beginning of my legal counseling of Mr. Worth. He was now asking me to make the predictions upon which he would likely rely to decide how to handle the case.

A litigator's predictions about the likely outcome of a dispute are at the core of his or her expertise. My predictions about Mr. Worth's case reflect my underlying assumptions about lawyering in a federal narcotics case and provide the context within which I counsel him. My conception of the criminal defense lawyer's role reflects the norms of the legal community in which I practice. In my experience, the criminal defense bar strongly espouses the hired gun theory of lawyering - people who may have done bad things deserve zealous advocates and the lawyers are not responsible for their clients' bad acts or the decisions the clients make in defending themselves against the power of the state. Criminal defense lawyers also tend to offer strong advice in counseling, rather than laying out options and leaving conclusions to the client. With so much at stake and so much power arrayed against them, institutional and appointed criminal defense lawyers feel little call to watch out for anyone but their client. The powerful private bar that practices in this courthouse reenforces the hired gun norm. Wealthy and powerful clients pay well for the zealous, non-judgmental lawyers they desire. The district also has a long tradition of prosecutors coming from and returning to large firm private practice. All these factors have contributed to local norms that encourage strong advocacy and relatively professional relationships between the defense bar and prosecutors.

This is the modern criminal defense lawyer first championed in the academy by Monroe Freedman. He has become the standardbearer for this mainstream view. See generally MONROE H. FREEDMAN, UNDERSTANDING LAWYERS' ETHICS 123 (1990) (defending the partisan advocate in the adversary system). He was, however, famously threatened with professional discipline after publishing an earlier defense of zealous criminal defense lawyering. Monroe H. Freedman, Professional Responsibility of the Criminal Defense Lawyer: The Three Hardest Questions, 64 MICH. L. REV. 1469 (1966) (defending vigorous cross examination of truthful witnesses, client confidentiality and leaving the choice to offer apparently false testimony to the defendant).

Zealous advocacy is generally less ethically challenging than the literature might suggest. Although it is theoretically useful to posit extreme cases, such as the neutral witness whose adultery would be revealed on cross examination with devastating consequences to his very sympathetic family, that is not the typical experience for either lawyer or client.

The best description of the powerful criminal defense bar in New York City is still KENNETH MANN, DEFENDING WHITE COLLAR CRIME: A PORTRAIT OF ATTORNEYS AT WORK (1985) (describing the results of an in-depth study of some members of the white collar defense bar in New York).

These norms include judges and adversaries expecting and accepting extensive motion practice, novel legal arguments and vigorous argument and examination of witnesses. In some communities, but not this one, defense lawyers are less comfortable with zealous
Counterbalancing this strong ethic of zealous advocacy is the high rate of conviction in narcotics cases and the lengthy sentences many defendants face. Trials of narcotics cases frequently end in conviction. In this case, the evidence appears strong.\(^6\) The complaint recites recorded conversations, observation of my client handling a package that contained narcotics and the likely testimony of a confidential informant. Trial also offers the only hope, albeit a small one, of complete exoneration. A guilty plea under the sentencing guidelines and mandatory minimum narcotics statutes offers a predictable discount of between 20% and 40% off the lowest likely sentence following conviction by trial.\(^6\) Cooperation with the government, the third path in the federal system, is likely to lead to a significant sentence reduction, although the precise discount is less predictable and ranges between 50% and 80% of the likely sentence after trial.\(^6\)

Some readers may be troubled by this very negative evaluation of the case at this early stage. It is problematic. I have just warned about the dangers of early diagnosis and such an early and negative evaluation cuts against the aggressive investigation and litigation that should characterize zealous advocacy. I have sometimes litigated cases that at an early stage appeared very likely to end badly, but ended in acquittal, dismissal, or some other very favorable result. Unfortunately from the defense perspective, that result is uncommon. More importantly, there is often a price for careful decision making. In federal narcotics prosecutions in New York, rapid decision making is strongly reinforced by the high premium on early cooperation. The first person in the case to turn against others is most likely to receive a much shorter sentence than others. An early decision to cooperate with the government includes, as one of its costs, giving up the opportunity to litigate the case and learn if the government has, or develops, proof problems.

Some evidence suggests the guidelines have increased the sentence differential between trial and plea and made it less predictable. Chantale LaCasse and Abigail Payne, Federal Sentencing Guidelines and Mandatory Minimum Sentences: Do Defendants Bargain in the Shadow of the Judge? 42 J. L. & ECON. 245 (1999) (finding that judges shifted their post-guidelines sentencing patterns to enhance the sentencing penalties for going to trial and maintain high plea rates). The sentencing guidelines discount for a plea is between 20% and 40% of the probable sentence after trial. U.S. SENTENCING GUIDELINES MANUAL, § 3E1.1, Acceptance of Responsibility (2001) (defendants may receive a downward adjustment of up to three levels for pleading guilty and accepting responsibility for their conduct). The actual discount for a plea is more difficult to predict because charging decisions often have more impact on the sentence than the sentencing guidelines. As defendants indicate willingness to contest the charges, additional investigation often leads to additional charges and/or additional relevant conduct, which is uncharged conduct "that occurred during the commission of the offense of conviction." Id. at §1B1.3, Relevant Conduct. Post trial sentences two and three times harsher than sentences predicted by plea offers are not uncommon.

High rates of conviction and significant sentencing discounts for pleas are just the most obvious pressures on defendants to plead guilty. Although critical attention has been paid to lawyering which encourages pleas, see Birke, supra note 44, and there are many institutional defenders and appointed lawyers in highly stressed systems who cannot meet the norm of adequately engaging and counseling their clients, Note, Gideon's Promise Un-
Don't Believe Everything You Think

There is often a high price to pursuing the classic adversarial route to trial. For me, zealous advocacy for my clients charged with federal narcotics offenses has become zealous harm reduction. Most of my clients are going to be punished. I see myself as trying to separate out the many likely pleas from the very few cases which should be tried. Once those two groups are separated, the tasks are to win the trials and minimize the sentences for those who plead or are found guilty. With those norms and preferences as the backdrop, I started to answer Mr. Worth’s question about what I thought would happen in his case.

I began with a general description of the conspiracy law, emphasizing that knowledge of and agreement to participate in illegal activities are the essential elements of a conspiracy. Then I described the federal criminal justice system and the paths narcotics cases can travel. I discussed dismissal and acquittal, and emphasized the many

fulfilled: the Need for Litigated Reform of Indigent Defense, 113 Harv. L. Rev. 2062, 2064 (2000) (noting the severe and persistent deficiencies in indigent defense and arguing for a litigation approach), that is a flaw in the system, not the lawyers. The central problem is the lack of adequate resources and the persistence of norms that discourage zealous advocacy, not the lawyers’ role conception or the rules. We do not need more lawyer regulation. We need courts, defenders and prosecutors with the resources and will to ensure that defendants are treated fairly.

63 I am attempting to report and analyze what actually happens when my clients, and I, make decisions in a narcotics case. I see no evidence that my own lawyering reflects particularly strong insight into my own cognitive or other biases. I know that my conscious characterization of my federal criminal defense lawyering is that it is proactive, data driven and harm reduction oriented. In other words, I try to use my own experiences and what data I can gather to make the best predictions I can about what is likely to happen to a given case and take an active, affirmative stance in the litigation as early as possible.

Of course what I label a “data driven” approach can only inform, but cannot drive, criminal defense decisions. For one thing, I have done some formal data analysis, but I cannot claim to be making statistically valid inferences in all, or even much, of my lawyering. More importantly, the rules make it indefensible to try one hundred cases that might be pled to a lower sentence because two or three of the juries will unpredictably reject the government’s evidence.

Although I cherish the acquittals and dismissals my clients have gotten, I am more frequently trying to minimize the negative consequences of criminal charges, not eliminate them. I sometimes fear this may reflect my personal tendency toward risk aversion, rather than an optimal analysis of the situation, but reflection and experience have strengthened my commitment to this view (predictably so, given hindsight bias).

I contrast this approach with the risk seeking, “ready for trial” lawyer, a style I am quite strongly drawn to in our law school clinic misdemeanor practice. In those low stakes cases, in which there are many dismissals, acquittals and last minute offers of very favorable resolutions, the context rewards reluctance to compromise and encourages risk taking. If I were a defendant, however, I would be strongly attracted to a lawyer who talked very tough and assured me he or she could get me an acquittal, especially in high stakes cases. Richman, supra note 45, at 111-26 (analyzing lawyers’ incentives and disincentives to representing cooperators in a variety of contexts).

64 Mr. Worth and I have discussed the facts of the case very briefly. I choose to explain the law before interviewing about the facts. This sequencing presents the specter of attor-
uncertainties at this early stage of the case. Then I told Mr. Worth that most people in his situation must choose among trial, a plea of guilty or cooperation and a plea of guilty. I tried to emphasize that this was his case, his life and that the decision would be his when the time came to make a decision.

This general outline led us to a more detailed discussion of each alternative. I started with trial.65 I explained what evidence I thought the jury would hear and the available defense theories. I concluded that based on what I knew at that time, it seemed likely he would be convicted.66 Conviction after trial would likely result in a sentence of

ney coaching, which has come to be known as the Anatomy of a Murder problem. See Robert Traver, Anatomy of a Murder (1958). For an insightful discussion of this problem, see, Stephen Ellmann, Case Studies in Legal Ethics: Truth and Consequences, 69 Fordham L. Rev. 895 (2000) (arguing that lawyers should start with the premise that clients are honest but be alert for warning signs that the client is not honest and be prepared to use certain techniques to respond).

65 The sequencing of the presentation of alternatives is among the most difficult technique issues in counseling a client about resolving a pending criminal case. My practice is to start with trial, move on to plea and then discuss cooperation. I do this because trial is the default option and a constitutional right. In the absence of any choice by the defendant, the government will bring the case to trial, as the constitution requires. Perhaps most importantly, it is impossible to examine the other choices without considering trial first, as it offers the only possibility of the optimal outcome, acquittal. One must understand the chances for the most desirable outcome in order to compare it to the other options. Although I think the sequencing is right, it may encourage a plea with or without cooperation. The defendant hears a nice theoretical possibility, acquittal, which turns out to be nearly impossible to achieve. Then I tell a story in which the problem, likely conviction and long sentence, is resolved by plea, with or without cooperation. This is the classical story arc of stasis, trouble and resolution.

66 One way to evaluate the likelihood of conviction is to consider that 60,255 defendants were "disposed of" in the federal courts in 1996. Dismissals accounted for 7,083 of those defendants. Of the remaining 53,172 defendants, 4,976, (9.4% of the defendants whose cases were not dismissed) went to trial. Of those 4,976 defendants who went to trial, 902 (18% of all defendants who went to trial) were acquitted and 4074 (82% of all defendants who went to trial) were convicted. The remaining 48,196 (90.6% of the defendants whose cases were not dismissed) entered pleas of guilty or nolo contendere. Bureau of Justice Statistics Sourcebook of Criminal Justice Statistics, tbl.5.27 (1996) [hereinafter Sourcebook]. The rate of trials in the state courts appears similar, with an average plea rate of 89% reported for felony convictions in state courts in 1994. Id. at tbl.5.52. Thus, of those whose cases were not dismissed, 902 out of the 53,172 were acquitted, or 1.7% of the total. It bears noting that the 9.4% of defendants who elect to go to trial include a significant number with better than average chances of success, so Mr. Worth's case might better be compared to the subgroup of cases with relatively stronger government evidence. Of course there are many other ways to think about these numbers. If one includes all the dismissals and acquittals, then 7985 out of 60,255, or 13% of those against whom prosecutions were initiated, walked away from the real threat of criminal sanction without any finding against them. Most dismissals, however, do not come from among the cases involving multi-kilo drug deals with tapes of the defendant at issue. The statistical probability of conviction after trial for the relevant subgroup of defendants appears to be above 95%. Of course, the predictions in this footnote, and in this section, are the product of bounded rationality, not statistically valid regression analysis. The accuracy of the heuristics used to separate the good and bad cases is the key to this evaluation. Almost all
between ten and twelve years in prison.  

Next I described the process of pleading guilty. I discussed potential plea offers and talked about the process of negotiating and entering into a plea agreement. I detailed the sentencing benefits that can be gained from giving up the right to a trial and potential appeal. I told Mr. Worth that if he chose to plead guilty, the sentence would likely be between 5 and 6 \( \frac{1}{2} \) years.

I came last to a plea and cooperation with the government in the investigation and prosecution of others. I described the government’s strong interest in cooperation and emphasized that the prosecutor has almost complete control in this area. The prosecutor may refuse to consider cooperation, he or she may have extensive meetings with the defendant and then reject the cooperation and even if the prosecutor accepts the defendant’s assistance, there are no promises about how much the defendant will benefit. But when cooperation works, as it often does, defendants receive much shorter sentences. If Mr. Worth cooperated, there was a good chance that his sentence would fall between 2 and \( 3 \frac{1}{2} \) years, and an extremely high probability that the sentence would be no longer than \( 4 \frac{1}{2} \) years.

the uncertainty, in the general run of cases, is about the length of the sentence, not the fact of conviction.

67 I also explained that there is no parole in the federal system and most people serve 85% of the sentence imposed, after a 15% reduction for good behavior.

68 The sentence in a federal narcotics case is determined by a complex set of statutes and rules. Those statutes and rules are applied quite differently from district to district as each group of prosecutors, judges and defense lawyers has developed its own practices. See Frank Bowman, III & Michael Heise, *Quiet Rebellion II: An Empirical Analysis of Declining Federal Drug Sentences Including Data from the District Level*, 87 Iowa Law Review 477, 532-4 (2002) (discussing variation from district to district). A thorough understanding of federal sentencing law and local practice is crucial to adequately handle a matter such as this. See Douglas A. Berman, *From Lawlessness to Too Much Law? Exploring the Risk of Disparity from Differences in Defense Counsel Under Guidelines Sentencing*, 87 Iowa Law Review 435 (2002) (arguing that defense counsel’s knowledge and skill can have a significant impact on the ultimate sentence, despite the apparent rigidity of the federal sentencing guidelines). My experience in this courthouse suggests that Mr. Worth is likely to be eligible for first offender treatment, permitting a judge to sentence below the ten year statutory mandatory minimum which would otherwise apply, pursuant to 18 U.S.C. § 3553(f) (2002). If the judge had legal authority to sentence below the mandatory minimum the next consideration would be the sentencing guidelines. The starting point for a conspiracy involving 5 to 15 kilos of cocaine would be a range of 121-151 months. A first offender who pleads guilty is eligible for a 5 level downward adjustment, in the trial judge’s reviewable discretion, to a range as low as 70-87 months. Further downward adjustments are possible but seem very unlikely at this stage. In about two thirds of all cases, judges impose sentences at the bottom of the sentencing range. A sentence of 70 months, plus or minus a year, appears very likely at this time, if Mr. Worth accepts a standard plea offer.

69 Once the government moves for cooperation departure, the judge has virtually unreviewable discretion to decide if and how much to depart. The scope of these departures varies widely from district to district. See, Patti B. Saris, *Below the Radar Screens: Have the
As we talked, it seemed to me that Mr. Worth understood what I was telling him. He asked reasonable questions and made relevant comments. He had particular interest in the likely conduct and outcome of a trial of his case. He expressed interest in my thoughts about possible defense theories and understood that the heart of a conspiracy case is the proof that the defendant knowingly agreed to participate in illegal activity. Because Mr. Worth was arrested at the time of the alleged offense and in close proximity to drugs, mistaken identification did not seem like a promising defense theory. Although we had not yet heard the audiotapes, Mr. Worth told me that he was careful never to say “cocaine” or “drugs” on the phone. Although I told him that most people could usually figure out that a conversation about “the things” or “packages” was at least consistent with a drug deal, we spent little time speculating about the tapes. Putting aside the tapes for now, how could we argue that the jury should have a reasonable doubt about his knowledge that there was cocaine in the bag in the trunk of the car?

The centerpiece of the government’s evidence against Mr. Worth would be the testimony of a confidential informant. The CI, as such a witness is known, is almost always some character with a shady past, including a criminal record, who helps the government make drug cases in return for money. Most defense lawyers will agree that it is a pleasure to cross examine a CI. They have a strong motive to lie, the essence of their work is duplicity and they almost always have unsavory pasts. I have cross examined confidential informants and cooperators with some success. Juries tend to dislike and distrust them, but often find their testimony sufficiently corroborated in narcotics cases to justify a conviction. The defense always has a great deal to say about why such witnesses are not worthy of belief. It is extremely helpful, however, to have additional evidence beyond the distasteful character of the main witness, to support the theme that the government’s evidence is unreliable and inaccurate.

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Sentencing Guidelines Eliminated Disparity? One Judge’s Perspective, 30 Suffolk U. L. Rev. 1027, 1045-46 (1997) (commenting on warranted versus unwarranted disparity and the failure to control the magnitude of departures from the perspective of one of the United States District Court Judges for the District of Massachusetts). My experience in this courthouse, which involves between 25 and 50 cooperators, along with my academic research, tells me that the judge will give a sentence discount in virtually every SDNY case in which the government recommends a substantial assistance departure and that the few in which the judge rejects the request involve special circumstances which give counsel some warning of that possibility. In non-violent narcotics cases, in which offenders do not have significant prior records or present other issues, my consistent experience is that the discount is between 50% and 80%.

70 Mistaken voice identification could have explained the audiotapes, but his presence at the scene would still be a problem to which we did not yet have a solution.
Mr. Worth understood all this clearly enough to move the conversation to the flaw in the evidence that he believed would compel the jury to vote not guilty. "It says they took a box from the car," he observed, gesturing toward the papers on the table in front of us.

"Yes," I agreed, "the complaint says it was a box."

"Well, you know they are going to have a bag in court, unless they switch the evidence."

"No," I assured him, "I think the evidence in court will be whatever they took from the car. They do some nasty things, but in my experience they don’t just lie about the evidence."

"So that’s it," he said emphatically, "the jury has to know the evidence is all crap. They can’t convict me on this."

I did not share Mr. Worth's evaluation of the evidence, but I did not press him on this point. I only said, "I’m not sure the jury will see it that way, but there is still a lot we don’t know about the evidence."

It was our second meeting.

1. Representativeness Bias

Mr. Worth’s focus on this one detail, the complaint’s mistaken assertion that the drugs were in a box, rather than a bag, was familiar to me. Mr. Worth was not my first client to place great reliance on a point I did not raise and which I thought unlikely to play a major role in the case. This tendency is the result of a cognitive illusion. His overestimation of the significance of a single event is an example of the representativeness bias, our cognitively rooted tendency to generalize from whatever small, unrepresentative sample captures our attention. This bias causes us to give undue weight to rare but conspicuous events and undervalue or ignore more common occurrences. We worry more about rare plane crashes than about all too

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72 The cognitive attraction of detail can lead us to think an event more likely if it is described with greater detail, even though the added details actually make the event less likely than it would be without the qualifier. This is the conjunction fallacy, in which a more specific event or condition is misanalyzed as more likely than the related general case. In a now classic, and not entirely uncontroversial experiment, subjects were asked to rank a set of statements about a tennis players from most to least likely. The four choices were:

1. Borg will win the match
2. Borg will lose the first set.
3. Borg will win the first set but lose the match
4. Borg will lose the first set but win the match

Respondents thought 1 most likely - they thought Borg would win the match. Interestingly, they ranked 4 as more likely than 2, with 3 coming last. Yet analytically, statement 2 is more likely than statement 4, because statement 2 describes a more general case than statement 4. Statement 2 includes the cases in which the player loses the first set and wins
common car accidents. We overemphasize the rare event because of our cognitive disposition to focus on individual examples whose details match our images of a general case. Tending to disregard whether the individual case is a typical or atypical example of the category, we give too much weight to its vividness. Plane crashes are vivid, highly representative exemplars of a deadly accident, but that does not increase their statistical probability.

Statistical probability, however, offers a good method for making the predictions lawyers and their clients so often need. Perhaps we want to know if the plaintiff is likely to win at trial. The best way to predict the likelihood of a contingent future event is to calculate statistical probability. Although many of us are put off by the technical details, the basic idea is simple enough. A tort lawyer may want to evaluate a new slip and fall case. His judgment is informed by ten

the match, as well as though in which the player loses the first set and loses the match. The addition of the vivid detail makes us focus on the more specific case; we understand and are attracted to the story of losing the first set but winning the match and prefer it to the more probable, but bare story of just losing the first set. The example is from Tversky & Kahneman, *Judgments of and by Representativeness*, in *Kahneman et al.*, supra note 2, at 96.

For transportation safety data see, U.S. Dept. of Transportation, Bureau of Transportation Statistics, Transportation Statistics Annual Report, 2000, http://www.bts.gov/btsprod/nts/. Airline accidents accounted for 92 deaths in 2000. 41,800 people died in highway accidents, including all kinds of vehicles and pedestrians. *Id.* at Table 1, Fatalities by Transportation Mode. The FAA warns that airline accidents are rare, so predictions and comparisons among carriers are difficult, http://www.asy.faa.gov/safety-data/#cautions.

Representativeness contributes to the general unease many feel about flying, along with other factors, such as the cramped surroundings, lack of control and unfamiliarity of the experience. Of course we have a whole new set of concerns about flying since September 11.

Representativeness may be the best known, but least clearly understood of the cognitive biases. It is not subject to precise definition. Tversky & Kahneman, *Subjective Probability: A Judgment of Representativeness*, in *Kahneman et al.*, supra note 2, at 33. Although there is debate about the mechanism, there is strong evidence that people overemphasize predictive power of rare phenomena when the phenomena strongly resemble the category in question. Recognition of this problem is behind the restrictions on proof of character in evidence law. We limit character quite strictly because it is too powerful and persuasive, *see* Michelson v. United States, 335 U.S. 469, 485 (1948). That is the power of the representativeness illusion. A bad person, in whatever dimension, looks much more like a guilty person, without accounting for the very large number of bad people who do not commit crimes. *See* generally, Russell B. Korobkin & Thomas S. Ulen, *Law and Behavioral Science: Removing the Rationality Assumption from Law and Economics*, 88 Calif. L. Rev. 1051, 1086 (2000).

Predictions about litigation often involve subjective judgments. Beysian decision theory, "[a] method of decision making and, by extension, of estimating probabilities, based at least in part on expert opinion, called "subjective" probability," W. Paul Vogt, *Dictionary of Statistics and Methodology*, is well accepted and permits an element of subjective judgment to be included in a mathematically rigorous analysis. For application of some formal methods from decision theory to litigation, including an example, see Marjorie Anne McDermid, *Lawyer Decision Making: The Problem of Prediction*, 1992 Wis. L. Rev. 1847, 1852-1868. Some may be familiar with decision trees, a graphic repre-
other slip and fall cases he or she has litigated over the past six months. The lawyer must, however, use care when he compares the current case to those ten cases.\footnote{In general, three types of information are relevant to statistical prediction: (a) prior or background information (e.g., base rates . . . ); (b) specific evidence concerning the individual case . . . ; (c) the expected accuracy of prediction . . . ” Kahneman \\& Tversky, \textit{On the Psychology of Prediction}, in \textsc{Kahneman et al.}, \textit{supra} note 2, at 51.}

The lawyer may evaluate the new case as moderately strong, compared to the ten known cases. To make a useful judgment, the lawyer must also account for how this set of comparison cases fits into the larger group of all possible cases. If the lawyer won only one of those ten cases, a moderately strong case in that group is not very promising. If the lawyer won half the cases and the cases were fairly evenly distributed along the spectrum, then a moderately strong case is quite promising. To put it another way, if the ten cases are typical, or we can figure out how to use them to understand the overall rates of success in this sort of case, it is useful to generalize from the comparison. If, however, the lawyer remembers those ten cases because they are his only victories or each happens to have a memorable fact, then those ten cases may not make a suitable baseline.

Collecting good base rate information and using it effectively is the key to making good predictions based on past experiences.\footnote{\textit{Id.} at 48-50.} If the wrong base rate is chosen, the prediction will be useless. Unfortunately, it is hard for lawyers to collect reliable base rate information about litigation outcomes. Individual differences among cases make it hard to identify which typical cases provide the right comparisons.\footnote{Services that collect and report damage awards in tort cases are one important example of the importance and limitations of good base rate information in litigation.} Even when good information is available, the representative heuristic causes many of us to systematically ignore the information and systematically misinterpret it when we do use it.\footnote{See \textit{supra} note 21, collecting studies showing experts misanalyze and misapply base rate information.} The fundamental problem is that people are just not very good at distinguishing typical events from rare events. In fact, we are strongly drawn to rare or vivid events and often make the mistake of thinking them common and typical.\footnote{This is a particularly difficult problem in medical diagnosis. Doctors must account for how often a given symptom or condition occurs in the general population in order to understand how strongly related it is to a particular pathology. The fact that 10\% of all brain tumors are associated with headaches is not very meaningful unless one knows whether the incidence of headaches in the general population is 1\%, 10\% or 40\%.}

Although the representativeness heuristic makes us bad intuitive statisticians, it very often leads to useful judgments in the world. The
heuristic works by exploiting the surprising power of "one reason decision making." The notion is that we can often efficiently and usefully categorize a situation by attending to just one fact or cue about it. For illustration, we return to the state of nature. If I was sitting out on the plain and saw the grass rustle, I would have a strong interest in being able to quickly categorize the rustle as indicating a threat or not indicating a threat. I do not need to know exactly what the threat is, I only need to identify the category to which it belongs and flee or stay, as appropriate. The need for quick categorization is served by attending to only one characteristic. I might look toward the rustle and ask if it was caused by an identifiably safe animal or not. In other words, if I looked over and saw a mouse, I would categorize the situation as safe. If I looked over and saw something bigger than a mouse or could not see anything, I would run first and ask questions later. I would let the one characteristic — identifiable safe animal — represent the whole category of safe rustle. It makes sense, even though it is clearly overinclusive and does not separate out all the safe cases from the dangerous instances.

Seizing on a vivid, available detail and using it to quickly categorize an event may be useful for making a flight or fight decision, but may not be optimal for predicting the outcome of a legal matter. Yet that is just what Mr. Worth is doing. He is using a vivid picture of one bit of evidence he knows to categorize the whole larger body of evidence with which he has little familiarity. The bag/box problem is not typical of the whole mass of more reliable government evidence, but Mr. Worth does not have information about that.

I have spoken to him about the government’s evidence but it remains a general idea for him. Although I can summon a vivid image of the courtroom full of audio equipment, he cannot. I can describe the binders full of transcripts and see us sitting at the defense table, listening to the tapes being played and hearing the pages of the binders rustle as everyone flips through to follow along. Through those details, I know and can better account for the evidence that will likely convict him. For Mr. Worth, these are vague ideas which are impossible to compare against the one detailed thing he knows about the case.

Unlike me, he has a strong image of that box. He knows, with a vivid certainty, that it is not a bag. When he searches his mind to evaluate the evidence, that box leaps to his conscious attention. The box exemplifies the category of favorable evidence. It is harder for

82 See generally Gigerenzer, Todd, et al, Part III One Reason Decision Making. Although this book does not use the nomenclature of representativeness, the section provides an account of how simple problem solving strategies work.
Mr. Worth to summon up competing examples and even more difficult for him to figure out what the whole mass of evidence will look like and how this one inconsistency fits into that larger picture. Mr. Worth's strong commitment to the idea that the bag/box contradiction is a major factor in his case reflects a deeply held feeling on his part. He has analyzed this problem and reached a conclusion supported by facts. He has used a method that has served him all his life. It should not require much reflection to recognize that most of us frequently feel strong commitment to ideas, memories and theories that later turn out to be demonstrably wrong or tremendously ill considered. Feeling right is a function of our current state of consciousness, which is significantly influenced by rational factors, but is also subject to other influences. Being right is a different sort of thing.

2. *Egocentric Biases*

The hardest thing we have trouble seeing as typical is ourselves. The problem of representativeness is our tendency to think the exceptional things that stand out in our memory are common. The problem of egocentric bias is our tendency to think many of our own common, ordinary skills and experiences are exceptional. When we last left Mr. Worth, he had also expressed his belief that the jury would not convict him.

I had replied, “I'm not sure the jury will see it that way, but there is still a lot we don’t know about the evidence.”

“I know,” he responded, smiling, “But I know myself. People like me. No jury will convict me. They don’t convict people they like, do they?”

“You’re exactly right about that.” I told him, “If someone likes you, they believe you and they will try to think of reasons why you are right. But we will have to think long and hard about how to let the jury get to know you. A trial is very different from a social event and even liking some people isn’t enough to get over strong evidence.”

“They’ll like me.” Mr. Worth said to himself, as much as to me, “They won’t convict me.”

My client's view that his case would turn out better than other similar cases was also familiar to me. I used to wonder why people who had recently experienced a bad life event, getting arrested on serious charges, persisted in the view that they were lucky. I was puzzled why they expected, in the absence of an identifiable reason, to have a better result than other defendants. I have come to understand this too as an example of a persistent, almost universal cognitive bias. Most of my clients, like most everyone, experiences self-serving or
egocentric biases.\textsuperscript{83}

Studies show that most people rate themselves as above average drivers\textsuperscript{84} and above average at their jobs.\textsuperscript{85} Even when people are presented with data about rates of illness and rates of divorce, they still view themselves as more likely to remain healthy than the population at large and much more likely to remain happily married.\textsuperscript{86} Ego-centric bias has an emotional component centering on self-image. Optimism, self-confidence and a positive outlook on life are beneficial and adaptive.\textsuperscript{87} But that emotional component has a cognitive, information based component that can also lead us astray. When we search our minds for information to reach or confirm a conclusion, we have much more information about ourselves than we have about other people.

If I am asked how big a contribution I made to a given project, I can recall specific instances of work, the time I spent thinking about some knotty problem and all the effort I put in to get the job accomplished. When I review how much work others contributed, I find that I have little information about what they did outside of my presence. As I compare my detailed record of what I did against the very sparse evidence of their effort, I find I have evidence to support my view that I have worked harder than others. We overestimate the percentage of

\textsuperscript{83} See Neil D. Weinstein, \textit{Unrealistic Optimism About Future Life Events}, 39 JNL. PERSONALITY AND SOCIAL PSYCH. 806 (1980) (providing experimental data supporting hypothesis that widely reported optimistic biases may be explained cognitively, rather than or in addition to fulfilling a need to feel good about oneself); Guthrie, Rachlinski & Wistrich, \textit{supra} note 27, at 811-13 (same).

\textsuperscript{84} Ola Svenson, \textit{Are We All Less Risky and More Skillful Than Our Fellow Drivers}, 47 ACTA PSYCHOLOGICA, 143 (1981).

\textsuperscript{85} In a study of the impact of cognitive bias on magistrates, each was asked to rank themselves by the number reversals on appeal. 56% placed themselves in the highest quartile and 87% of the group expressed the view that half their peers were reversed more often than they were. Only 4.5% put themselves in the highest quartile for reversal. 86 Cornell 777, 814. As the authors point out, the actual numbers may not distribute evenly because some of the judges may never have been reversed, so more than 25% of the group could be in the lowest reversal group (0 reversals). Even if that is true, the remainder of the group is exhibiting egocentric bias. Guthrie, Rachlinski & Wistrich, \textit{supra} note 27 at 814.

\textsuperscript{86} Lyn Baker & Robert E. Emery, \textit{When Every Relationship is Above Average: Perceptions and Expectations of Divorce at the Time of Marriage}, 17 LAW & HUM. BEHAV. 439 (1993) (reporting results of a study showing people about to marry held very high expectations for the longevity and happiness of the marriage after being presented with data about high rates of divorce).

\textsuperscript{87} The absolute centrality of self-esteem to mental health has recently been the focus of some useful and careful rethinking. See e.g., Roy F. Baumeister, Brad J. Bushman & W. Keith Campbell, \textit{Self-esteem, Narcissism, and Aggression: Does Violence Result from Low Self-esteem or from Threatened Egotism?}, 9 CURRENT DIRECTIONS IN PSYCHOLOGICAL SCIENCE 26-29 (2000).
housework we do and the amount of time we speak at meetings.88

When Mr. Worth thinks about how the jury will respond to him, he draws on a selected data set about how people have responded to him in the past. He supports his self-image as a likeable, lucky guy. We have some information about our own internal states and know little, if anything, about other people's inner lives. Yet, we make decisions based on our understanding of what other people experience all the time, as we must. Because we get along every day despite this significant bias in our knowledge, it is hard for us to accept that this mode of thinking may not work best in every situation. Even if Mr. Worth has good data about probabilities, it will not help if he believes that the averages only apply to other cases. People engage in all sorts of high risk behavior and believe they will beat the odds.89 We pay attention to the subset of information that tells us we are special because it is available to us and tells us what we want to know.

3. Affect and Information Processing

Other psychological factors are certainly at play as Mr. Worth thinks about the length of a possible sentence, the bag and box and the impression he would make on a jury. This gloomy picture motivates him to pay attention to any ray of hope. His focus on the box/bag inconsistency has an emotional component and that emotional component also influences his decision making.90 Intuition might sug-

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88 Michael Ross & Fiore Sicoly, *Egocentric Biases in Availability and Attribution*, 37 J. Personality & Soc. Psychol. 322 (1979) (finding that subjects overestimated how much housework they did, how much they contributed to a group discussion, their importance to the outcome of a basketball game and their contribution to a problem solving collaboration). One mechanism underlying the egocentric bias is the tendency to use the information most readily available to our minds. This is called the availability heuristic. Two things that effect availability of information are the volume of the information we have and where it is stored in our minds. Our fund of available information about the world is also strongly biased in favor of information about ourselves and against information about others. We have a lot of information about ourselves and our experiences in the world, some information about the small circle of people we know well and almost no information about the vast majority of people and situations with which we have no personal experience. To the extent we have read or heard about other people and places, that information tends to be less vivid and it does not come close to making up the difference. We simply have much more information about ourselves than about other people.

We also use and access information about ourselves more frequently and thus have it more available. For example, we may have information relevant to a decision we are making in both short and long term memory. The information in short term memory is more readily accessible.

89 Smoking and the lottery are two prominent examples. Egocentric bias is also adaptive in many contexts, but we must try to separate out its positive role in maintaining a healthy, optimistic outlook from its tendency to distort the information upon which we may base important decisions.

90 I have represented clients so overwhelmed by their situation that they became clinically depressed. Situations of mental pathology are beyond the scope of this discussion. I
gest that he would focus on the one good fact and avoid the undesirable facts.

Research suggests a more complex picture.

Experimental subjects who have no particular motivation beyond the instructions of the experimenter will avoid unpleasant or negative subjects. But people who believe they have a long term interest in dealing with a difficult topic will pay attention to unpleasant information. Moderate stress associated with a serious problem will also help people focus on the problem at hand. The unpleasant topic can be a negative factor but should not make it impossible for most people to think about the evidence against them.

It is also important to distinguish between the lawyer's emotional tone at the meeting and the emotional content of the subject under discussion. Although criminal defense lawyers often talk about very unpleasant subjects with their clients, they need not be unpleasant during those discussions. We do a better job analyzing both pleasant and unpleasant information when we are in a better mood. Problem solving tends to be more flexible and sustained when the solvers have a positive affect.

Thus, inducing a better mood at the time of the discussion will improve the quality of the decision making and mitigate avoidance or denial. Lawyers can enhance recall and encourage broader and more creative categorizations and connections among ideas if they can establish a pleasant atmosphere. On the other hand, negative affect at the time of the discussion, induced in part by the difficult situation at hand, will tend to make decision making and problem solving more rigid and less informed. There are distinct cognitive mechanisms, influenced by the emotional content of the situation but not simply reducible to anxiety or avoidance behavior. Mr. Worth may be motivated by his desire to emotionally escape his difficult situation by ignoring it, but that emotional content induces a cognitive response and can be mitigated by skillful counseling. Rapport and atmosphere matter. Smiling at clients, expressing concern for and trying to make

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91 moderate stress enhances concentration and high stress, or the complete absence of stress, tends to decrease concentration and task performance. See Elizabeth Loftus & James Doyle, Eyewitness Identification § 2.14 (1987) (explaining the Yerkes-Dodson curve).

92 Alice M. Isen, Positive Affect and Decision Making, 424-429 in Michael Lewis & Jeanette M. Haviland-Jones, Handbook of Emotions (2000) (collecting and summarizing research suggesting that positive affect increases recall and enhances creative categorization, improving both problem solving and decision making involving both positive and negative materials).
them smile will make them better problem solvers.\textsuperscript{93}

III. RESPONDING TO COGNITIVE BIASES

So far, the picture is a tad bleak. Representativeness and egocentric biases have led Mr. Worth to focus on one tree instead of the whole forest and to think that bad things are more likely to happen to other people than to him. His lawyer may have delayed the impact of framing and hindsight bias by waiting to provide some important information, but that is not a positive program. How can a lawyer and client respond to cognitive illusion?

Patience should be the first line of defense. Both lawyer and client will learn more, and think more, as the case progresses. Mr. Worth has suffered a terrible blow. Although the box/bag distinction may always be a significant image to him, experience tells me it is likely to recede in importance over time. If it does not, it can be more effectively challenged when the lawyer client relationship is better developed, the facts are clearer and a decision needs to be made. Mr. Worth should be permitted the time and space to think these matters through for himself and arrive at a considered view of his situation.\textsuperscript{94}

There are also a variety of strategies, in addition to patience, that can help lawyers reduce the impact of cognitive biases on their clients and themselves. Research suggests that lawyers can be particularly helpful in identifying and correcting framing biases. We can also respond to some problems that stem from ego-centric, representativeness and hindsight biases.

\textsuperscript{93} Individual differences among clients, and lawyers, are another relevant factor. Research suggests that people with higher levels of educational achievement and those who score well on traditional intelligence tests tend to be less prone to cognitive error. Traditional education encourages abstract and structured analysis, which tends to attenuate bias, particularly framing problems. Individual differences in education or capacity for abstract reasoning, do not, however, explain all, or even most of the problem. Stanovich \& West, supra note 23 at 645 (concluding that while intelligence, problem definition and contextual factors all give rise to performance errors, a significant gap remains between the normatively predicted rational result and the actual descriptive result which can best be explained by a pervasive and systematic element of irrationality or cognitive bias).

\textsuperscript{94} Time and patience are two things many public defenders cannot give their clients. More than 50\% of the federal inmates interviewed for a study of criminal defense lawyers reported that they had talked with their appointed lawyers three times or less while the case was pending. Caroline Wolf Harlow, United States Department of Justice, Office of Justice Programs Special Reports, Defense Counsel in Criminal Cases at Table 17 (2000) (showing that 54\% of the federal inmates reported talking with appointed counsel three times or less, 23\% reported four to five conversations and 22\% said they had talked six or more times). There are a myriad of ways our grossly overburdened public defenders are hindered in their efforts to meet high standards. The role of cognitive illusion and heuristics in rapid decision making makes limited discussions about how serious cases particularly problematic.
A. Overcoming Framing Biases

Mr. Worth and I had our third meeting. After our last conversation I had called the prosecutor and chatted about the case. Although it was an early, tentative discussion, the prosecutor let me know that he would meet with Mr. Worth for a proffer session95 and consider cooperation. The prosecutor also suggested that he would offer a plea agreement that would mitigate the impact of the ten year mandatory minimum sentence with the safety valve provision.96 The sentencing range under that deal would be 70-87 months.97 Both the plea suggestion and the interest in cooperation reflect the standard practices of that office for a narcotics case of this scope. Although I had some vague ideas about more aggressive positions on a few guidelines issues, they did not seem all that strong and it was too early in the case to float them to my adversary.

I began to describe my conversation with the prosecutor to Mr. Worth. Explaining that it was still very early in the case and all this was very tentative, I went on to say that the prosecutor said he thought he would offer a plea in line with his office’s usual practice.

“It’s still early,” I repeated, “so things can change, but a plea offer would give us a good chance of a sentence range of 70-87 months. That would mean the sentence could not be less than 70 months or more than 87 months. We might also be able to argue for a lower guideline range, but some judges might be inclined to impose a slightly longer sentence. You have to keep in mind, without a deal there is a ten year mandatory minimum and a potential for a sentence longer than ten years.”

“That is too much time,” Mr. Worth exclaimed. “Damn, that is too much time.”

“I think these narcotics sentences are crazy,” I replied. “But that’s the law and we have to deal with it.”

“It is just too much time,” Mr. Worth repeated.

Although many narcotics sentences are too long, Mr. Worth’s immediate reaction may not help him make a decision. Perhaps he is inclined to reject the plea offer because it involves too long a prison sentence. If so, the important question is comparative - against what

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95 A proffer session is a meeting between the defendant and the prosecutor during which the defendant tells the government everything he or she knows about any and all criminal activity in return for the government’s promise of limited use immunity and consideration of a cooperation deal. The government controls the terms of a proffer session and makes no promise that cooperation will be accepted. See generally, Weinstein, supra note 59 at 584-91 (describing how the government dictates the terms of the cooperation negotiation and allocates all risk to the defendant).

96 See supra note 68.

97 Id.
measure is the sentence too long? Seen in this light, Mr. Worth’s comment suggest a framing problem. The sentence may be too long if he was thinking he would only serve a year in prison, but it may not be too long compared to a fifteen year sentence after trial.

When Mr. Worth commented that the plea offer would involve too long a prison sentence, I sympathized with his view and then said, “that’s the law and we have to deal with it.” Although my comment was neither clear, nor profound, I was staking out space for the idea that evaluating potential sentences required careful attention to framing. This was no great insight on my part. I have had this discussion before and data suggest that lawyers tend to be better than non-lawyers at identifying and overcoming framing bias\(^9\) when they evaluate legal matters.\(^9\)

For illustration of how lawyers and non-lawyers respond to framing bias, we return to the car accident hypothetical discussed above.\(^10\) In that experiment, subjects were put in the role of litigants in a car accident case to whom a settlement had been extended. They were divided into two groups, one in which the settlement could be framed as a gain and the other in which it could be framed as a loss. Although both groups were offered economically equivalent settlement packages, some litigants were told they had been driving a Toyota, while others had been driving a BMW. The settlement was adequate to permit the hypothetical Toyota drivers to purchase an equivalent replacement car, but was not enough for the hypothetical BMW drivers to replace that more expensive car. Thus, the Toyota drivers could see the settlement as a gain while the BMW drivers could see it as a loss, even though the settlement offers were equivalent. The researchers presented this pair of hypothetical to students and lawyers. While the lawyers in the study showed almost no difference in their evaluation of the two offers, settling at very similar rates regardless of whether they were in the Toyota or BMW group, the students were more likely to settle when they were gainers. The lawyers seem to have seen past the framing and recognized that the two offers were economically

\(^9\) Guthrie, Rachlinski & Wistrich, \textit{supra} note 27, at 822 (arguing that judges are well suited to reframing decisions to arrive at better anchors); Korobkin & Guthrie, \textit{supra} note 24, at 107 (collecting studies suggesting lawyers may be able to respond to framing bias).

\(^9\) The core framing problem is identifying the correct comparison point of relative utility on the same metric - comparing the dollar value of a settlement and the dollar value of a trial or the total time spent taking the bus compared to the time it would take to walk. It can often be addressed, if it can be identified. More general anchoring or framing problems - how to frame an argument, and problems that involve comparing different kinds of goods, time and money or fairness and money - may be easier to spot but usually do not have clear answers.

\(^10\) See \textit{supra}, pp. 20-22.
Other data are consistent with the result suggesting that lawyers are less sensitive to framing bias. A study of United States Magistrates showed they were relatively less sensitive to framing biases than other cognitive biases. Many lawyers and judges have learned to think about and analyze expected value. They tend to share the instrumentalism of the legal culture which encourages this kind of analysis. Their repeated exposure to problems of this sort also helps them develop the habit of analyzing these problems in economic terms. Finally, the role of adviser encourages careful and apparently objective analysis of a settlement offer. Lawyerly habits of careful, objective reasoning help us spot and respond to framing biases. Lawyers should develop a range of analytic tools and be taught to look

101 The students who were in the Toyota group settled at a statistically significant higher rate than the students in the BMW group, while the lawyers in each group were statistically indistinguishable from each other. Moreover, the interaction between the subject pools and the condition was statistically significant, suggesting the difference between the groups was not coincidental. Korobkin & Guthrie, supra note 24, at 100-101. The students were Stanford undergraduates. The lawyers in the study were a group of large firm attorneys, primarily engaged in civil practices representing institutional clients. The litigators among them tended to represent civil defendants.

102 Guthrie, Rachlinski & Wistrich, supra note 27.

103 Repeat players often have a strong incentive to figure out and account for their biases. Some suggest this limits the reach of the cognitive bias literature in explaining economic behavior. This argument has special force for professionals in financial markets. Some have pointed to the persistence of asset pricing errors as evidence of the persistence of bias in that setting, Conlisk, supra note 20, at 673. Efficient market theorists suggest other explanations. For a discussion of the current debate about the impact of behavioral economics on the efficient market hypothesis and citations to current efficiency advocates see, Donald Lagnevoort, Taming the Animal Spirits of the Stock Markets: A Behavioral Approach to Securities Regulation, 97 Nw. U. L. Rev. 135, 136-37 (2002)(noting that behavioral economics has made significant inroads but there remain many vigorous defenders of efficiency).

Whether or not repeat players correct for bias in financial markets, it seems less likely that repeat players eliminate this problem in lawyering. Players have to be aware of, and motivated to respond to bias before they can benefit from repeated exposure to the problem. Lawyers in practices that expose them to economic analysis and data driven decision making are more likely to begin to account for cognitive bias than other lawyers. Criminal defense lawyers may not be as attuned to, or as motivated to respond as some others. Most federal narcotics defendants are not repeat players in arenas that would educate them about cognitive bias. Whether or not cognitive bias should limit the reach of the efficient markets hypothesis, a question much beyond this paper, it should be considered in client counseling.

104 For more on debiasing, see, infra pp. 51-54.

105 For an interesting approach to teaching Bayesian reasoning, see Peter Sedlmeier, Gerd Gigerenzer, Teaching Bayesian Reasoning in Less Than Two Hours 130 JOURNAL OF EXPERIMENTAL PSYCHOLOGY: GENERAL 380 (2001) (reporting that teaching Bayesian probability using frequency representations instead of rules resulted in much better immediate learning and retention over time and theorizing that the results support an ecological view of rationality in which some information representations simply fit better with the way our minds have evolved).
at situations from a variety of perspectives and make conscious choices about the proper comparison point for a given decision.\textsuperscript{106}

In addition to spotting framing issues, lawyers must help their clients identify and overcome their framing problems. On this question, Korobkin and Guthrie offer a provocative finding. They offer some evidence that counseling relying upon assertions of authority are more effective in countering framing bias than counseling techniques that try to educate the client to make better decisions. It also appears that some counseling techniques influence framing issues that arise from non-economic concerns, but framing biases involving economic issues are more resistant to counseling.

The part of the study addressing counseling techniques used two hypotheticals to evaluate four different approaches lawyers might take in addressing framing biases. The first hypothetical was the Toyota/BMW problem discussed above. As noted, in the car accident hypothetical the scenarios differed so that economically equivalent offers were presented as an apparent gain to one group and an apparent loss to the second group. The second problem involved a landlord tenant dispute. In the landlord tenant hypotheticals, equivalent settlements were offered by two different landlords, one of whom was presented as sympathetic, the other as blameworthy. In both variations, the tenant went four months without heat in his or her apartment, despite repeated calls to the landlord. In one variation the subject was told that the landlord was unable to fix the heater because he was out of the country on a family emergency. In the other variation, the subject was told that the landlord failed to return numerous phone calls and no explanation was offered.\textsuperscript{107} This set of hypotheticals tests the impact of non-economic benchmarks (fault or blame) on decision making.

Each subject\textsuperscript{108} received one of the factual scenarios described above and one of four different written versions of their lawyer’s advice\textsuperscript{109} about the settlement offer. Each was asked to consider the

\textsuperscript{106} Paul Brest & Linda Krieger, On Teaching Professional Judgment, 69 Wash. L. Rev. 527, 553-54 (1994) (urging law schools to teach about the psychology of decision making).

\textsuperscript{107} Korobkin & Guthrie, supra note 24, at 108-11.

\textsuperscript{108} The subjects were 149 Stanford undergraduates, none of whom had participated in any other aspect of the study. Id. at 114.

\textsuperscript{109} The first version of lawyerly advice is titled “the psychology lesson.” The advice explains framing bias in a mini social science lesson and urges clients to be aware of this tendency. The second version is “consider the opposite,” in which the advice takes the form of explaining to the client that while the lawyer knows the client may see the settlement as a loss, it is also true that the client would be better off with the settlement as compared to the client’s current position and it will avoid the risk of litigation. This approach offers the client a different perspective, without explaining cognitive bias. Each of these first two approaches are intended as educational and value neutral. The third and
facts and their lawyer's advice before deciding whether or not to accept the settlement offer. The authors compared settlements rates between those who received advice from a lawyer and those who did not and among the different styles of advice. The study found differences related to both the kind of advice that was offered and the nature of the framing bias. Overall, the simple assertion of authority by the lawyer, an unadorned recommendation to accept the offer, had the biggest impact in encouraging settlement, and the advice was much more potent when the issue was fault, as in the landlord tenant problem, than economic loss or gain, as in the Toyota/BMW problem.

The suggestion that advice alone, without explanation, is more potent in overcoming bias is broadly consistent with other studies on "debiasing," or overcoming cognitive illusions. Other work suggests that teaching about bias is less effective than training people to analyze problems differently or appealing to experts. This part of the study offers the useful suggestion that we should avoid trying to explain cognitive bias to our clients. Instead, we should analyze the problem with them, leading them through a step by step discussion of the different benchmarks they might use and which one is correct in the particular situation. The role of assertions of authority in counseling is more problematic, but the research suggests another reason why the client centered reluctance to give advice may not be appropriate in every situation.

The results also showed that while advice increased the rate of settlement in the landlord tenant problem to a statistically significant degree, it generated a statistically insignificant rise in settlement in the car accident problem. The landlord tenant problem presented a difference in apparent fairness; in one version the offending landlord

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fourth options include explicit recommendations, or advice giving. Variation three offers the expected value calculation with a recommendation to settle. Variation four is an unadorned recommendation to settle. All the variations included a reminder that the client had full authority to act as he or she chose. Id. at 115-19.

110 The most effective approach was a recommendation alone, without any explanation. The authors suggest that the litigants may be swayed by authority and accept it because they have no means of evaluating the underlying merits. The next most effective approach was the "psychology lesson," followed by "recommendation with calculation" and "consider the alternatives." Korobkin & Guthrie, supra note 24, at 115-22.

111 A 1982 study summarizing the results of 40 studies on overcoming hindsight bias and overconfidence suggests that clarifying or otherwise changing the task, and merely warning of the problem, have little impact. The methods that showed significant improvements in overconfidence were describing the problem, personalized feedback, extensive training, searching for conflicting information and relying on experts. Responding to hindsight bias has not been the subject of as much study. Searching for conflicting information is the only method that showed significant results. Baruch Fischhoff, Debiasing, in KAHNEMAN ET AL., supra note 2, at 422. Fischhoff's categories offer close analogy, with reliance on experts standing in for the pure advice model. Conlisk, supra note 20, at 671.
was sympathetic, in the other he was not. It appears that the advice worked to debias people who undervalued a settlement because they started out thinking it did not compensate for unfairness. Subjects in this group were more likely to come to see that whether the landlord was nice or not, the compensation offered was a reasonable choice, given the alternatives.

Puzzlingly, advice did not have the same impact on people considering the monetary comparison offered to the BMW/Toyota group. The authors suggest that framing at play in the car hypothetical is more persistent than the "socially constructed" desire for vindication or equity. In some respects, the suggestion that equity seeking is more subject to lawyer influence than wealth maximization may seem both dangerous and counterintuitive. A desire for fairness or vindication is just the sort of normative judgment that many think can, and should, override purely economic concerns. Purely economic issues, on the other hand, can be judged according to the best numbers. Then again, perhaps that simple dichotomy leaves out far too much.

Perhaps the subjects in the car accident problem valued driving a BMW so much that they preferred to risk a trial because it offered the only possibility of replacing that car. Some people might not be satisfied with any result that did not put them back in a BMW. Korobkin and Guthrie note that lawyers must distinguish between the cases in which the client understands the implications of their choice and chooses some other good and the situations in which the client misapprehends the relative payoffs of the choices.

They also recognize that when the client's analysis seems incorrect, the lawyer faces a hard choice about whether to try to correct the reasoning through education or simply achieve the best result by giving advice. At bottom, we cannot make clear cut choices. It is rarely clear whether or not the client is acting on bad information or value preferences. Even when it is, it may be possible to overbear the choice but much harder, or impossible, to rectify the information error.

The uncertainty about the client's underlying motivation and value choice can be all the more confusing when the lawyer is not clear if he is imposing his own framing bias. When Mr. Worth said the sentence was too long, I understood him to be saying it was too long compared to some other sentence he might receive. I think the decision about whether or not to accept a deal most often turns on the

112 The more decontextualized and abstract the analysis, the less likely it is to suffer from cognitive bias. Stanovich & West, supra note 23, at 658-60. The appropriateness of decontextualized and abstract analysis of any particular lawyering problem is often a difficult normative question.
length of the sentence. In cases that turn on the relative severity of the punishment, it is important to make sure that the client understands and makes comparisons among the available options. One difficult problems is uncovering any undisclosed framing problems. This requires careful, detailed interviewing. A second problem is discounting for uncertainty in a helpful way. Does a client think that a 30% chance of a ten year jail sentence is the same as the certainty of a three year jail sentence? This issue must be carefully presented.

Some clients, however, do not have sentence minimization as their primary goal. For example, Mr. Worth might think that a criminal case is about justice. Perhaps he is saying that the sentence is simply excessive and therefore wrong. He might even hold the view that he should not accept an unjust sentence, even if a longer sentence would be imposed after a trial. I have represented people who did not think that getting the lowest possible sentence was worth any price, but it took me a long time to realize that.

The story of another client illustrates the problem of the lawyer confusing cognitive illusion and value choices. It is a story of how I came to understand that what I thought was my client's framing bias turned out to be my own framing problem. Mr. Reade was nineteen and lived in Staten Island with his girlfriend and their young son. He was a sweet, handsome and somewhat unsophisticated person whose childhood friend had a heroin connection. Unfortunately, his friend found a buyer who was an undercover agent. Mr. Reade was arrested at the conclusion of the transaction but the circumstances proved nothing more than his presence at the scene. In short, the evidence against him was not strong, except for the rather lengthy inculpatory statement he had made following his arrest. He faced a five year mandatory minimum sentence upon conviction.

Mr. Reade was released on bail. He chose to go to trial, despite my efforts to persuade him to cooperate against his friend and cut his losses. Mr. Reade told me he could not turn on his friend. Although I could not feel the pull of his loyalty to the person who brought him into this situation, I reluctantly respected the choice. Of course there was nothing I could do if he refused to plead guilty. I was more troubled when his co-defendant failed to appear in court shortly before trial, literally leaving Mr. Reade holding the bag. Mr. Reade was convicted and sentenced to the mandatory minimum five years in prison by a wise judge who expressed his regret at imposing the harsh sentence the law required.

113 Mr. Reade is based upon a particular client I represented about a dozen years ago. Identifying details have been altered, but the case is as accurately described as my memory permits.
I often thought of Mr. Reade and sometimes talked with students about the counseling problem the case presented. As I saw it, he had chosen a path that led to a harsher punishment than he should have faced, both normatively and descriptively. Harsh sentences for people like Mr. Reade are wrong. He had the option of cooperating against another, more culpable person who was almost certain to be convicted no matter what Mr. Reade did. I wondered if I should have pushed him harder to reconsider his decision not to cooperate with the government.

This story illustrates the pervasive problem of framing, although I only saw my own framing problem after I presented a draft of this paper at a workshop. Although I have claimed to be a client centered, creative problem solving lawyer, I have long seen this case in the narrowest and most lawyer centered light. I used to think Mr. Reade made a bad choice because he did not minimize his sentence. But a colleague suggested that Mr. Reade is a man who chose a principle over his own self interest. I may not value Mr. Reade's loyalty, but Mr. Reade thought it a virtue worth a significant price. My own narrow framing of the problem is all the more glaring because I have written about the evils of pressuring defendants into disloyalty by encouraging snitching through harsh penalties. Events gave me the evidence that I was wrong to think about sentence length to the exclusion of everything else, but the dawn came slowly.

About three and a half or four years after Mr. Reade's trial, I was coming out of the MCC when I saw a familiar face. There was Mr. Reade, wearing prison khakis and mopping the entry hall of the jail. He gave me a big smile. I went right over to say hello.

"Hi, how are you?" I asked, grinning from ear to ear, happy to see a face from the past.

"I'm OK," he said, "be in a halfway house in a couple of months maybe."

Then he went right to the heart of the matter and answered the question I wanted to ask, but would not have dared to put to him. "I did the right thing. This wasn't so bad. I could not have lived with myself if I hadn't gone to trial. I grew up while I was in. I know I'm going to take care of my family when I get out. The baby is getting big. I did the right thing." He assured me.

"I'm so glad you're well and almost out. It's so good to see you. Take care. Good luck." I said, as I headed for the street. After long reflection, I have come to believe Mr. Reade knew something more about what he wanted than I did when I represented him.

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114 Weinstein, supra note 59, at 621-25 (criticizing the government’s encouraging the immoral act of disloyalty through the overuse of cooperation).
B. Responding to the Representativeness Bias

Mr. Worth’s focus on the mistaken assertion that a bag, rather than a box, was taken from him is an example of the representativeness bias. This tendency to give undue weight to salient but rare events appears harder to control than framing bias. Some data suggest that even trained professionals, making decisions within their expertise, are effected by the bias. Though it is a challenge, we must be alert to situations that pose representativeness problems and address them. Mr. Worth’s situation justifies the effort. The stakes are high and the decisions turn upon predictions about future events that are prone to representativeness bias.

We can fight the tendency to fall prey to the bias by seeking out and using the best baseline information available. Litigators often make claims that a certain type of case typically comes out in a particular way. We depend those judgments when making predictions about the likely result of a contested case. When important interests are at stake, we must ask ourselves how many of these cases can we identify and how typical are they. Knowing we are prone to basing predictions on unusual, if easily recalled examples, we should be especially cautious about that style of decision making. We must also mistrust predictions that rely upon or suggest very rare events. They can feel entirely right, but rare events are rare for a reason. They just don’t happen often. Lawyers and law students need to study decision making and probability theory.

More familiarity with concepts of statistical proof would address the narrower, prediction oriented aspect of the representativeness problem. There is, however, another, broader aspect of representativeness that may suggest an approach to Mr. Worth’s situation. Representativeness understood as the peculiar power of the salient detail, is at the core of persuasion. Perhaps it is a problem well suited to a

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115 Korobkin & Guthrie, supra note 24, at note 41.
116 There may be some suspicion about obtaining good baseline information for many legal decisions. The law celebrates the uniqueness of each set of facts and much of the skill for which clients’ pay is a lawyer’s judgment about a particular case in a particular jurisdiction. But the profession appears to have a strong economic disincentive to taking a more structured approach to decision making or even sharing good data about cases. Where would we be if we found out that relatively few factors could accurately predict the outcome of a litigated case across many jurisdictions? Whatever the answer to that question, it is currently hard to get good baseline information in a number of areas.
117 For a discussion of decision theory and its application to lawyering decisions, see McDiarmid, supra note 76 (analyzing and critiquing decision theory, inductive probability and causal thinking and arguing that each is appropriate to a particular class of decisions yet none yields perfect predictions).
118 And its related cousin, the vividness effect. Vividness refers to how detailed or imaginable a given scenario is and some research suggests vivid information can influence deci-
lawyerly solution.

People are prone to the representativeness bias because some examples are perceived as more powerful exemplars of their category than logic would support. Good advocates have long understood the importance of finding the right example. Some details bind tightly to their general category whether or not they should. A red convertible is strongly associated with the male midlife crisis, whatever the state of the statistics for relevant car buyers. Given the power of the detail to capture and define a larger category, perhaps one approach to representativeness problems is to meet ill chosen persuasive details with better selected persuasive details.

When Mr. Worth talks about the mistake in the complaint and the confusion between the bag and the box, we should understand him as captured by that particular detail. When he summons up the category of evidence in the case against him, that bag and box keep coming into focus. If we think those details are not typical, we might try to offer some other details that are more typical and stand a chance of replacing the bag and box. Let us return to the conversation with Mr. Worth. Once again we are at our third meeting together and he raises the issue of the box and bag. The discussion starts with Mr. Worth saying the same thing, but suppose I try a different approach:

“They took a bag from me, but it says it was a box,” Mr. Worth repeated. “They have no case against me, no jury will send me away.”

“I will argue that,” I assured him, perhaps sounding a little frustrated, “and let’s say we win on the box argument and they are convinced the complaint was wrong about that. Let’s think about what is in the bag. How was the cocaine packaged?”

“It was in one kilo bricks,” he explained.

“Tell me about them, what were they wrapped in?” I prompted.

“Well, they were in plastic and wrapped in tape,” he answered.

“What color was the tape? What did they look like? Could you see any of the bricks?” I asked.

“The tape was around the short side and you could see something under there, in between the strips of tape,” he said.

I explained, “The cocaine will be in the courtroom. The prosecutors wheel around these metal carts with their files and evidence, you know to get from their office to the courtroom. They will put the coke into evidence and then it will sit out there during the trial, for the jury to see. When they deliberate, they will have seen and heard about the bag, the complaint and the bricks of cocaine. I think they will be thinking about the cocaine. What do you think?”

sions more than pallid information. PLOUS, supra note 27, at 125.
"Maybe I'll be thinking about the bag and they'll be thinking about the cocaine." Mr. Worth suggested.

The idea is to replace the details that currently define the category of trial evidence for Mr. Worth with different details that I, as the lawyer, believe will result in a more accurate characterization of the evidence. Mr. Worth has been viewing the relevant category as evidence insufficient to convict. I think he might better view it as evidence sufficient to convict. This strategy adds another kind of option to the four suggested by Korobkin and Guthrie. In addition to telling the client about the heuristic, urging the client to consider other details, telling the client what outcome the lawyer recommends with an explanation of the error in reasoning, and simply telling the client what outcome the lawyer recommends, this fifth strategy attempts to use the heuristic.

Some may think a direct discussion of the heuristic is more respectful of the client. Using the heuristic may seem manipulative, akin to using persuasion and hiding our actual reasons and ideas. But cognitive science urges us to consider how we process information, not just what information is provided. What we tell our clients matters much less than what they understand and conclude from the information they actually attend to and process.\(^{119}\)

Counseling requires lawyers to give information and to help clients use it, or process it, effectively, while leaving room for the client to act on his or her own values. Korobkin and Guthrie, like others, sensibly argue that client decisions based upon cognitive errors should be probed and questioned while those that turn on value choices should generally be respected. They also discuss how little that formulation really tells us. The problem only grows worse as we consider approaches to egocentric and hindsight biases.

C. Addressing Egocentric Bias

Egocentric bias presents yet another difficulty and may be especially difficult for lawyers. In its broader form, this bias has a significant emotional or motivational component which serves clients and the profession well. Self confidence is an important attribute of an advocate, and more generally, for any lawyer. Obviously, an advocate must be careful not to let an inflated ego propel him or her to assure a client that an acquittal is certain in the face of overwhelming evidence, but that is not, at base, a problem of tricky, unconscious bias. Bad

\(^{119}\) See generally Robert W. Gordon, The Independence of Lawyers, 68 B.U. L. REV. 1, 30 (1988) ("Lawyers who say they just provide technical input and lay out the options while leaving the decisions and methods of implementing them up to their clients are kidding themselves . . .").
judgment and narcissism are separate matters.

Suppose we return to Mr. Worth and he tells us that he wants to go to trial because he believes he will win the trial, although he knows his lawyer has a different estimate of the chances. Egocentric bias, on the part of both lawyer and client, make this a dangerous situation. Too many lawyers, myself included, have been sorely tempted to accept an early decision[^120] to go to trial. After all, it is his Sixth Amendment right. Most of us became trial lawyers because we wanted to try cases. It can be very satisfying to stride into the courtroom and demand an early trial date. Lawyer and client are both quite happy with their unrealistic, but strong expectation of success. Their happiness may not last, but if they are proven wrong, it will be too late.

Understanding the cognitive tendency to display overconfidence may only give another name to what many already understand as a general human tendency. It may also suggest some additional strategies for dealing with the problem. To the extent our greater access to information about ourselves is a contributing factor, lawyers might try to address that problem. We should probe Mr. Worth's belief that he will win. The simple assertion, “I am lucky,” must be unpacked. I have had conversations like this with clients who predictably recalled a spectacular gambling win, or some close call in an accident. Although the studies warn us that the bias is fairly resistant to information, the best strategies appear to be highlighting discordant information and offering feedback about the reasoning.[^121]

Here is the conversation with Mr. Worth:

“I know you said the jury is likely to convict on this evidence, but I just don’t think they will convict me,” Mr. Worth commented.

“Why do you think that?” I asked.

“I’m lucky. I’ve always been lucky. I won $1000 in the lottery.” He observed.

“That’s a lot more than the $100 I won at supermarket bingo, but you weren’t very lucky in this case. Out of all the people involved in all kinds of things, you got arrested.” I answered.

“Well, that wasn’t a great day for me, but I still don’t think the jury will convict me.” He answered.

“Did you think you were going to get arrested? Do you think most people expect the bad things that happen to them?” I asked.

[^120]: The desire to commit oneself far in advance may also be a strategy for overcoming another bias, the tendency to overestimate our ability to make a hard decision in the moment.

[^121]: Fischhoff, supra note 26. It can be very challenging to offer individualized feedback without making the client feel judged or criticized. This particular counseling requires that the attorney and client have developed good rapport and that the attorney have command over his or her counseling technique. Affect can be dispositive at moments like this.
“I see your point,” he said softly, “but I am not sure I want to plead guilty.”

“That is a different thing.” I answered.

If we recognize that a decision to take a very high risk with the expectation of being lucky may be fed by cognitive illusion, we may be prepared to take a more searching, assertive approach, but it can be one of the riskiest moments in the lawyer client relationship. If we have been successful in developing a strong relationship with the client, this may well be the moment we test just how much trust has developed between us, because this is a moment in which we challenge an emotionally loaded bit of the client’s reasoning. In the dialog I have presented, Mr. Worth accepted my observation, but this is also a moment at which many clients will understandably bristle. Although it is a difficult and perhaps dangerous moment, it is also a very important moment in the attorney client relationship. Whether we help our client overcome an irrational belief that could lead to a bad decision or we discover that there is a value choice underneath the assertion of luck, we have done a very important and helpful thing for our client and our lawyering.

D. Mr. Worth’s Decision and How Hindsight Bias Makes it so Difficult to Evaluate the Outcome

I talked with Mr. Worth for about an hour that day at the MCC. In addition to the snippets of conversation offered here, we discussed many of the details of pleas, cooperation and trials. Four days later Mr. Worth called and asked me when I could visit him again. He said he had been thinking a lot and talking to some of the other inmates. I went to the MCC two days later.

I went upstairs and met Mr. Worth. After a quick hello, he said that he wanted to offer his cooperation to the government. He quickly turned the conversation to the probable outcome of the trial.

“Nobody wins, I have talked to some guys here and that is what everyone says.” He observed.

“Some people win trials,” I responded. “It depends on the case. But a drug case where they have tapes and the drugs, that’s tough. I have already told you, I can’t say you would definitely be convicted, but it seems very, very likely to me.”

We talked more about what would happen at a trial, but Mr. Worth was just confirming what he had already decided he knew. The conversation soon turned to the mechanics of cooperation. We discussed how Mr. Worth could try to make the prosecutor and agents believe and like him. That afternoon I called the prosecutor and set up a meeting. Mr. Worth succeeded. He established a solid working
relationship with the government, testified at the trial of a defendant he had set up through a phone call and offered information about others. His cooperation was judged successful by the government and he received the coveted 5K1.1 letter\textsuperscript{122} from the government.

Twenty two months after his arrest, Mr. Worth was sentenced to time served. After the sentence was imposed, his brother and I went to the cellblock to await his release. I buzzed the deputy marshal and we talked over the intercom system. A few moments later that big metal door opened and the deputy took the change of clothes Mr. Worth’s brother had brought for him. After about an hour, when the warrant check had cleared, we heard the lock clang. The door opened and out came Mr. Worth. He hugged his brother and shook my hand. With a big smile, he said, “I am so glad to be out. I knew this was the best thing to do.”

“I am so glad this worked out. Until the judge said it, I just wasn’t sure you were walking out today.” I remarked.

“I knew I was walking out today.” Mr. Worth responded.

“Let’s not stand around here.” I suggested and started toward the elevator. We rode down to the lobby and as we walked to the front door, I reminded Mr. Worth to call the probation department today and set up an appointment. The three of us walked out of the courthouse and down the steps. I stopped on the sidewalk and put out my hand. Mr. Worth and I shook hands again. I shook hands with his brother and wished them good luck. Mr. Worth smiled and he and his brother walked down the block to the subway. I felt I had done a good day’s work but how is one to know?

Mr. Worth made a reasonable choice, but it is still quite difficult to evaluate whether it was the best choice. In retrospect, things take on a cast of inevitability. We are cognitively wired to see contingent, random events falling into a pattern because we tend to update our memories with later acquired information. We believe that we knew all along things we did not in fact know until later. This is hindsight bias. Hindsight bias infects judgments about our relationship to past events. Although it is usually analyzed as a problem for decisions that turn on later judgments of the foreseeability of an event, I am particularly interested in how it effects our evaluation of our own behavior. Uncertainty in prospect is seamlessly replaced by certainty in retrospect, making fair evaluation of our earlier choices very difficult. Taken with the egocentric and motivational tendency for psychologically healthy people to validate whatever choice they have made, hindsight bias makes evaluating client choices very difficult.

\textsuperscript{122} U.S. SENTENCING GUIDELINES MANUAL, supra note 61, at § 5K1.1.
Both Mr. Worth and Mr. Reade (the client who went to trial rather than turn on his friend) knew at the end of their sentences that they made the right choice. Yet both took risks, faced real consequences and had no competing experiences against which to measure their choices. Mr. Worth will never know how the trial would have come out. Mr. Reade will never know how he would have felt if he had cooperated and received the sentence of probation or six months in jail that the judge who heard his case would likely have imposed. Nor did Mr. Reade experience the violence or psychological damage that many suffer in prison. What he does know is that he was a stand up guy and made it through his prison experience.

At the end of Mr. Reade’s sentence, it all seemed to have worked out just as he had foreseen five years before. The same is true for Mr. Worth. At the moment of his release, he was pleased. I can report that in the moment, both men seemed to me to display hindsight bias and both probably did, but now I think the most error laden judgment was mine. For a long time I thought it obvious that Mr. Reade had made a bad choice but used hindsight bias, and other psychological defense mechanisms, to convince himself that he made the right choice. I could not get past my own narrow framing of Mr. Reade’s problem to recognize that his devotion to a principle may well have given him greater inner resolve to face his fate than I appreciated. The choices Mr. Reade and Mr. Worth made cannot be directly compared and I have come to appreciate that Mr. Reade’s choice, like Mr. Worth’s choice, turned on a value choice applied to a reasonably accurate understanding of the likely consequences. As I have come to understand Mr. Reade’s choice in this light, I have also come to think that he had a firmer basis that I thought for believing things worked out as he knew they would.

Mr. Reade was more likely to be happy in the end because his choice did not turn so much on the outcome. He stood for a principle and did not expect a material reward for it, while Mr. Worth made a deal and expected to benefit. Yet they both made choices in a world of contingencies, in which happenstance probably played a larger role than their evaluations, shaped in part by cognitive illusions. Before the jury came back, Mr. Reade hoped to win the trial. Before the judge imposed sentence I told Mr. Worth he could get a lengthy

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123 Remaining ignorant of the trial outcome will motivate some people to settle to avoid the regret a dispositive ruling might engender. Chris Guthrie, *Better Settle Than Sorry: The Regret Aversion Theory of Litigation Behavior*, 1999 U. ILL. L. REV. 43 (offering empirical support for the argument that the emotional desire to avoid regret in the event the trial outcome is not favorable is a significant and independent motivator of settlement for some plaintiffs).
sentence.

Our subjective evaluations of the choices we have made are shaped by a range of factors, but in the end they are malleable and the stories we tell about outcomes are shaped by cognitive bias and a range of other psychological factors. Mr. Reade made a choice that removed some of the uncertainty; whatever sentence he received, he would have the psychic benefit of loyalty while Mr. Worth gambled all on the magnitude of the benefit he would receive. Yet neither defendant accounted for all the anxiety and uncertainty in their retrospective evaluation and in one case the lawyer could not see beyond his own narrow framing of his client's problem for many years.

**DON'T BELIEVE EVERYTHING YOU THINK**

Like Cerberus guarding Hades, three closely related perils guard the gates leading from cognitive confusion. We must avoid injury from the ideas we never thought (representativeness bias), "the things we know that ain't really so" (framing bias) and the paralysis that comes from disbelieving all of our ideas. Finding the right degree of skepticism and aiming it correctly is an art. While I could not give instructions, I have tried to offer guideposts.

The first problem is identifying cognitive bias in ourselves and our clients. These biases are subtle, unconscious and intuitively satisfying. They are often hard to spot. But when predictions have to be made or outcomes compared, we should be alert to the possibility that cognitive bias will rear its head. Differences of opinion about predictions and the relative desirability of different outcomes can cause friction between a lawyer and his or her client. When that friction develops, or when a difference in judgment threatens to cause friction, the lawyer should consider whether the style, quality or substantive content of the analysis is a problem.

Turning too quickly to cognitive bias to explain counseling problems is also a danger. Lawyers can make up a story to fit most facts, so we could often blame the client's faulty reasoning. We should test for this possibility by offering more information and coaching the client through his or her reasoning. If the problem is not resolved, we should be slow to conclude that the client is beset by insuperable cognitive biases. A client who persists in a surprising or troubling choice may do so from commitment to different values or because of some other situational or personal factor. The law, rules of professional responsibility and practice norms encourage us to accept the client's choice.

When we have identified a potential cognitive bias problem, we should also test ourselves, as well as our clients. As I have described,
lawyers also face these problems. They are often harder to see in ourselves than in others. Cognitive illusion carries with it the false assurance of feeling correct. We all feel that for ourselves. It is, unfortunately, often easier to have insights into others than into ourselves.

If we think bias is at play, we still face that three headed dog. How do we get past the representativeness problem to think about the things we are not thinking about? It requires discipline to take the time to consciously push the ideas that naturally flow into our immediate consciousness out of the way. Then we have to search our minds for other ideas that may not be so readily accessible but nonetheless may do some good. The problem solving books are full of exercises to help us do this sort of thing, although many feel skeptical about a recipe for creativity.

The second problem is recognizing "the things we know that really ain't so." We find this in framing bias, where it is clear to us that the settlement is a win or a loss, even though we are wrong. When we reason explicitly toward a prediction, we must monitor the facts upon which we rely. Most of us could be more careful to act upon the best and most reliable information we can get when we help others make very important decisions.

The third problem is the threat of losing faith in our judgments because they are not perfect. All of this talk of bias and illusion must not obscure the tremendous power of human judgment. Our ability to reflect upon and correct error is one of the great strengths of our reasoning. We should not believe everything we think, but we should believe much of what we think, especially if we can develop the habit of checking up on ourselves. Perhaps there is some comfort in knowing that our choice will usually seem all right in hindsight.