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CHAPTER SIX

Fact, Fantasy, and Public Policy

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As suggested by Fig. 6.1, the view of cognition that I discuss is a bit like a New Yorker's view of the United States, where Manhattan takes up most of the map, and after the Hudson River there is just a small strip with a slightly larger area when you get to California. (The blank region in Fig. 6.1, just below the Mishkin fissure, is Squire's area.)

There has never been any doubt in my mind that practical applications flow naturally from the insights of cognitive psychology. In fact, the wide-ranging applicability of one idea—the gestalt notion of figure/ground—is probably what seduced me into psychology in the first place. I saw the duck-rabbit figure for the first time the summer after I graduated from high school, in an introductory psychology book (Fig. 6.2). The deep meaning of this image lit up a lightbulb in my head—there were alternative ways of seeing the world, affecting even the way our very perceptions are structured. Here, I realized, was the origin of all human conflict—misunderstandings between friends and lovers, disagreements with parents, racism, the Cold War—we were seeing the duck and the Russians were seeing the rabbit (Fig. 6.3). Although all my college courses were interesting, there was nothing so profoundly important for understanding the human condition, it seemed to me, as this idea of alternative realities—the possibilities for experience were determined by the mind as well as the world. (Now, whenever I see the duck-rabbit, I think of the impact that a good metaphor can have on a 17-year-old.)

As an undergraduate and graduate student of experimental psychology at Berkeley (with the encouragement, especially, of Geoff Keppel and Leo

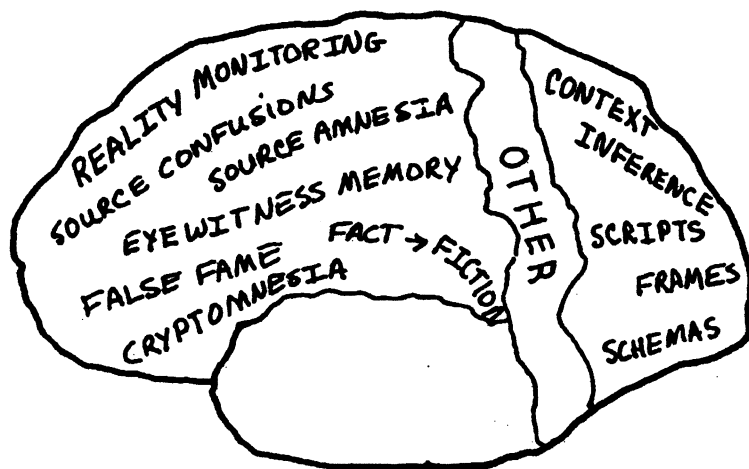


FIG. 6.1. View of mental landscape as seen from Princeton Cognition Lab.

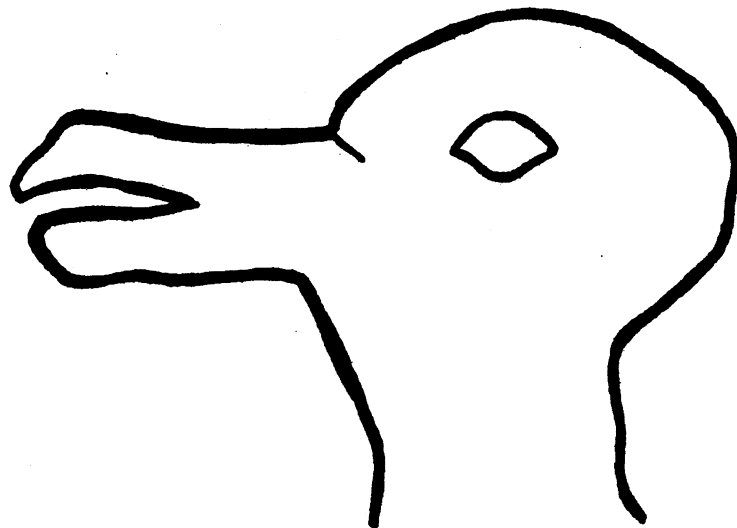


FIG. 6.2. An ambiguous duck-rabbit figure.

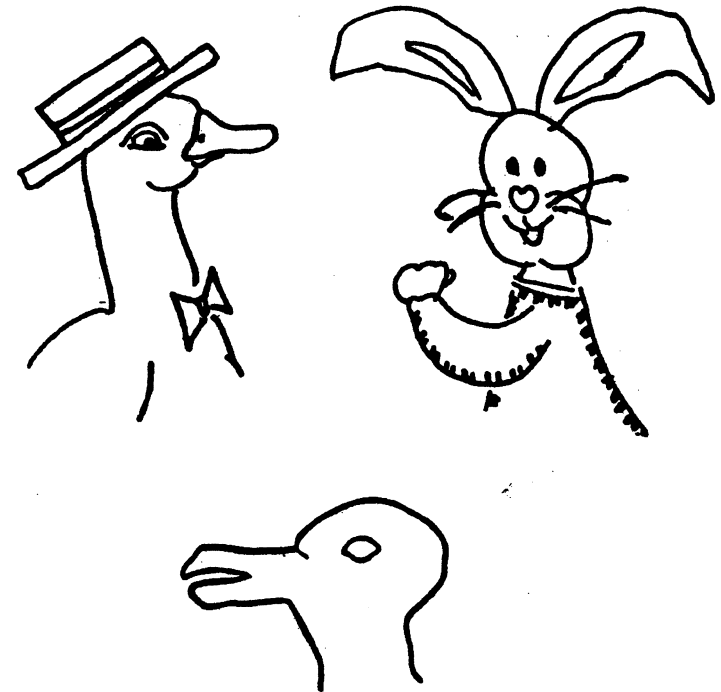


FIG. 6.3. Alternative interpretations of the duck-rabbit figure.

Postman), I tried various ways of exploring the idea that the conceptual schemas available to us determine how an ambiguous environment is perceived and remembered. My first experience of the thrill of collecting empirical data was an undergraduate project in which I found that the speed with which subjects saw a familiar nonsense form embedded in an "ambiguous" environment depended on whether or not they had previously named the form. My interpretation was that subjects used preexisting conceptual categories in naming and these were likely to result in an integrated, holistic representation, whereas when subjects did not name the forms they were more likely simply to notice some distinguishing feature (e.g., a jagged point). Once the forms were embedded in many similar forms, the previously distinguishing feature would not differentiate one form from another, whereas the gestaltlike properties of a named, integrated form would cause it to "pop out" from the background. This seemed, at the time, to capture the essence of life—an inherently unstructured and ambiguous world ordered by the categories one brings to it (truly Berkeley in the 1960s). I must admit that I am still trying to fully bake some of the half-baked ideas from those years.

When John Bransford and I both arrived in 1970 as new assistant professors at Stony Brook, we had the fun and excitement of a collaboration arising out of our mutual interest in constructive processes in comprehension and memory. For example, we had people listen to several short stories such as "It was late at night when the phone rang and a voice gave a frantic cry. The spy threw the secret document into the fireplace just in time since 30 seconds longer would have been too late." On a subsequent recognition test, subjects were likely to falsely recognize sentences that included tacit implications of what they had heard, implications such as "the spy burned the secret document" (Johnson, Bransford, & Solomon, 1973). Such false recognitions were interesting because they did not simply represent paraphrases of the information that was contained in the sentence. Rather, subjects were claiming to have heard information that was not necessarily true given what they had actually heard (e.g., the fire may not have been lit and the spy may have intended to hide rather than destroy the document). As part of normal comprehension, people construct a representation or model of the situation, drawing on general world knowledge about objects in the environment, people's intentions and actions, and so forth. This representation runs the risk of importing information that was not part of the actual perceptual event.

To avoid such false memories, one cannot simply turn off one's schemas or prior knowledge. Other studies showed that when you make it difficult for people to use prior knowledge to construct a representation of a situation, comprehension and memory suffer greatly. Consider the following paragraph (Bransford & Johnson, 1973):

If the balloons popped the sound wouldn't be able to carry since everything would be too far away from the correct floor. A closed window would also prevent the sound from carrying, since most buildings tend to be well insulated. Since the whole operation depends on a steady flow of electricity, a break in the middle of the wire would also cause problems. Of course, the fellow could shout, but the human voice is not loud enough to carry that far. An additional problem is that a string could break on the instrument. Then there would be no accompaniment to the message. It is clear that the best situation would involve less distance. Then there would be fewer potential problems. With face to face contact, the least number of things could go wrong.

Comprehension and recall are much greater if people have seen the picture in Fig. 6.4 before they get the passage than if they have not seen it or seen it only *after* hearing the passage. Thus, in spite of the potential cost of contextually or schematically driven inaccuracies, contextual information or schematic prior knowledge is essential for accurate recall.

The situation is further complicated by the fact that there may be more than one context or schema that can be brought to bear on a situation.

Consider the next paragraph about a *successful stockbroker* (Bransford & Johnson, 1973):

The man stood before the mirror and combed his hair. He checked his face carefully for any places he might have missed shaving and then put on the conservative tie he had decided to wear. At breakfast, he studied the newspaper carefully and, over coffee, discussed the possibility of buying a new washing machine with his wife. Then he made several phone calls. As he was leaving the house he thought about the fact that his children would probably want to go to that private camp again this summer. When the car didn't start, he got out, slammed the door, and walked down to the bus stop in a very angry mood. Now he would be late.

People who read this are likely to assume that the man is getting ready for work, reading the financial page, will buy the washing machine and send his kids to camp, and so forth. Now read the passage again, but as a passage about an *unemployed man*. Now people are likely to assume that the man is getting ready for a job interview, reading the want ads, cannot afford to buy the washing machine or send his kids to camp, and so forth. That is, the passage read from these two different points of view has a quite different affective tone and quite different implications (see also Hasher & Griffin, 1978; Pichert & Anderson, 1977; Snyder & Uranowitz, 1978; Spiro, 1977; Sulin & Dooling, 1974).

We believed that the comprehension processes that our lab and others were studying and the demonstrations we concocted illustrated fundamental processes of learning and memory (see Alba & Hasher, 1983, for an excellent review of work of this period). An obvious relevant practical domain was education—as in learning to read or learning about a new content area. And, as in the case of the duck-rabbit, and the forms embedded in ambiguous environments, I also believed that the understandings and misunderstandings that resulted when people brought various contexts or frames to situations created the backdrop for all self-knowledge and for all social and political interactions.

But something nagged at me about such a vision of cognition and memory. If even what we see depends on what we already know, and if what we remember depends on how we interpreted what we saw, and includes the not-necessarily-true inferences we drew, then what is the relation between what we perceive and remember to *reality* (Johnson & Sherman, 1990)? Yes, the mind constructs a reality from fragments of perception and memory, but are there any constraints to what can be constructed? How trapped are we by our own schemas? Surely not all constructions are equivalent. It may be all right to remember a duck or a rabbit, but there certainly was no elephant! An organism too loosely tied to reality via perception, learning, and memory mechanisms would have never survived all those evolutionary challenges.

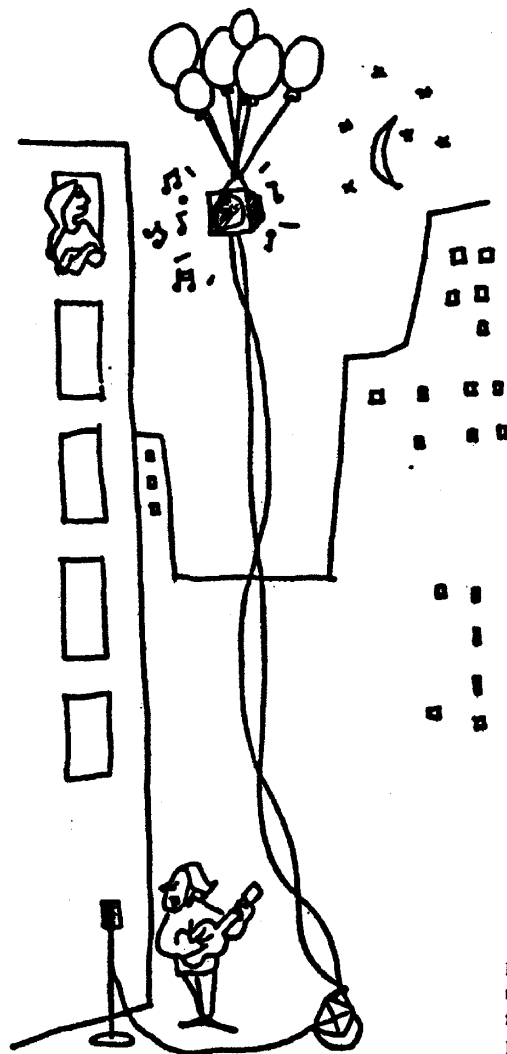


FIG. 6.4. Appropriate context for the balloon passage. (From Bransford & Johnson, 1973, reprinted by permission.)

Can we discriminate between reasonable alternative constructions of reality and fabrication? Are there some differences in the memory representations created by perceptual processes and those created by inference, imagination, fantasy, and dreams (Johnson, 1983)?

These issues were also brought home to me when, as an adult, I described a vivid childhood memory only to learn that it had not happened the way I remembered it. On a family trip, we had a flat tire and my mother, brother,

sister, and I waited in the car while my father hitchhiked up the road to have the tire fixed. Evidently, as I waited in the car, I imagined that my sister went to a farmhouse to get water. The memory of my sister's interaction with the woman at the farmhouse was filled with perceptual and contextual detail and I remembered my emotions about drinking the water and not saving some for my father. Years after the flat tire incident, I mistook this remembered fantasy of my sister's visit to the farmhouse for a real event (Johnson, 1985). How could this happen? How many other memories that make up one's autobiography—one's view of oneself—are false? This thought recurred as I considered the issue of the representation of perceived and imagined information in memory. One way that I could see to explore such issues was to investigate the psychological processes by which people discriminate real from imagined events. In this research, I have had many insightful collaborators, especially Carol Raye with whom I first mapped out an initial strategy for studying the problem of what we called "reality monitoring" (Johnson & Raye, 1981).

Of course, efforts from my lab have been part of a Zeitgeist. At the same time, many others have been addressing similar issues, such as Beth Loftus and her colleagues' investigations of eyewitness testimony (e.g., Loftus, 1979), and Larry Jacoby and his colleagues' work on misattributions of familiarity (e.g., Jacoby, Kelley, Brown, & Jasechko, 1989). There are now many studies exploring reality monitoring and more general issues of source monitoring (for reviews, see Ceci & Bruck, 1993; Johnson, Hashtroudi, & Lindsay, 1993; Johnson & Sherman, 1990) in which people confuse memories for what they perceived with memories for what they imagined, or where they confuse sources of information, for example, what they saw with what they read. For example, the more often people think about a picture, the more often they think they actually saw it (Johnson, Raye, Wang, & Taylor, 1979). People, especially children, confuse what they imagined doing with what they actually did, and they confuse what they imagined someone else doing with what that person did (Foley & Johnson, 1985; Lindsay, Johnson, & Kwon, 1991). We know that confusion is related to similarity between sources in perceptual, contextual, and semantic detail (Ferguson, Hashtroudi, & Johnson, 1992). We know that the information we generate most easily, or without voluntary effort, is most likely later to be confused with what we saw (Durso & Johnson, 1980; Finke, Johnson, & Shyi, 1988). We also know that thinking or talking about imagined events maintains and perhaps embellishes their clarity—a clarity that may later be taken, mistakenly, as evidence that the event actually happened (Suengas & Johnson, 1988). We also know that thinking about emotional aspects of past events can have different consequences for memory than thinking about factual aspects (Hashtroudi, Johnson, Vnek, & Ferguson, 1994). People make judgments about the origin of events partly on the basis of whether what they remember

fits with what they generally believe (e.g., [I didn't report that as my dream because] "this is not the sort of dream I ever have . . .") (Johnson, Kahan, & Raye, 1984). It is also important to note that people adopt different criteria for evaluating the sources of memories in different contexts; thus, under some circumstances confusions between what people saw and what was introduced by additional or misleading information can be eliminated by changing how the questions are asked (Dodson & Johnson, 1993; Lindsay & Johnson, 1989). And, I particularly want to emphasize that source-monitoring processes (and potential failures in source monitoring) play a critical role not only in our memories of autobiographical events, but also in our beliefs about ourselves and others, and in our opinions and knowledge about the world (e.g., Gerrig & Prentice, 1991; Johnson, 1988; Ross, 1989; Slusher & Anderson, 1987; Wilson & Brekke, 1994).

We and others have considered reality-monitoring and source-monitoring processes as they might help characterize clinically relevant phenomena such as delusions, amnesia, and confabulation from organic brain disease (e.g., Dalla Barba, 1993; Johnson, 1988, 1991; Schacter, Harbluk, & McLachlan, 1984). In the last few years, there has been some especially clever and thoughtful work done by Gail Goodman (in press; Goodman, Hirschman, Hepps, & Rudy, 1991), and by Steve Ceci and Maggie Bruck (1993) and others regarding suggestibility and source monitoring in young children. Steve Lindsay and Don Read (1994) recently wrote an excellent paper targeting the audience of practicing therapists, discussing the implications of work on reality monitoring and source confusions for understanding factors that might operate in the recovery of repressed memories.

We can understand quite a bit about source monitoring by investigating the impact of psychological processes like imagery, elaboration, rehearsal, and so forth, on source judgments. Also, as in understanding other aspects of cognition, neuropsychological evidence offers exciting possibilities. For example, the confabulations that sometimes occur as a consequence of frontal damage (Fig. 6.5), often in combination with damage to other brain regions, can be startling. A patient described by Damasio and colleagues (Damasio, Graff-Radford, Eslinger, Damasio, & Kassell, 1985) claimed to have been a "space pirate." A patient might not seem to recognize their hand and, when pressed, claim it belongs to the experimenter, and when the ring on the hand is pointed out, claim that the experimenter is wearing their ring (Joseph, 1989). In Capgras syndrome, patients exhibit a form of delusion in which they claim that someone, typically someone close or a family member, has been replaced by an impostor (Weinstein, 1991). Such examples strikingly illustrate how dependent we are on the smooth functioning of particular brain regions for the processes that ordinarily operate in reality monitoring (see also Baddeley & Wilson, 1986; Moscovitch, 1989).

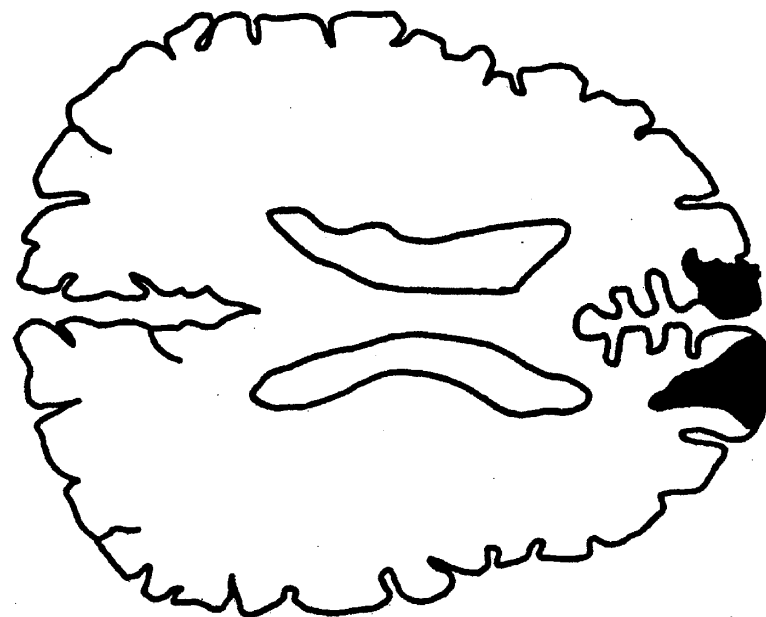


FIG. 6.5. Schematic illustrating a reconstruction of frontal lobe damage (in black) from the MRI brain scan of a hypothetical patient.

Increasing efforts are being directed at characterizing patterns of confabulations and associated cognitive profiles (e.g., Dalla Barba, 1993; Johnson, O'Connor, & Cantor, 1995) and in better specifying associated locations and extent of brain lesions (e.g., Fischer, Alexander, D'Esposito, & Otto, 1994). New and improving imaging and brain mapping techniques hold out some exciting possibilities for correlating psychological and neurological levels of analysis in both brain damaged and neurologically intact individuals. For example, John Kounios is working with my lab to explore ERP correlates of memories for perceived and imagined events and of source monitoring in general.

But just as we should be able to deepen our understanding of reality monitoring by going "down" to the neurological level, we should be able to expand it by going "up" to the social/cultural level. Individual reality monitoring takes place within a social/cultural context. This cultural context helps determine what evidence should be considered, the criteria for evaluating it, and what an acceptable error rate is. The cultural context provides social support for relevant hypotheses and conclusions and affects how

much evidence we feel we need. Suppose I said I am hearing strange noises; if you suggested I get an examination for tinnitus ("noises produced by the muscles governing the function of the middle ear," Saravay & Pardes, 1970, p. 237), that would be a very different social context than if you suggested it might be my angel trying to communicate with me (Johnson, 1988). Your comment may not only affect my memory for what I experienced, but the next time I hear the noise, my interpretation of it may be influenced by what you suggested as well. What might seem nutty and unlikely to be suggested in one social context might seem quite plausible in another. The impact of an individual's network of family and friends would be a rich domain for studying social aspects of reality monitoring.

I want to focus here, however, on yet another level of analysis. Consider also the reality-monitoring role that organizations and institutions serve in our culture. Think about the institutions and organizations in our society responsible for getting at or telling the truth: experts and professionals such as doctors and therapists who help people sort out real from imagined causes for their aches and problems; journalists whose role it is to dig up and report the truth; courts charged with establishing the "fact of the matter"; researchers, scientists, and educators who generate and transmit knowledge. Do we have an acceptable rate of reality-monitoring failures in our social organizations and institutions? Or do we, so to speak, have lesions in our cultural frontal lobes? Are some institutions or professional organizations suffering from anosognosia as well—that is, unawareness of deficit? (See Fig. 6.6; this is a schematic of a scan of patient U.S. As you can see, there is bilateral damage in the Washington, D.C. area, near the Congressional sulcus, with somewhat greater lesions on the right than the left.)

We have credentialing procedures for getting to participate in this cultural reality monitoring. These procedures include apprenticeships, journalism schools, professional programs, licensing exams, and so forth—the ways for transmitting the metaknowledge and reality-monitoring criteria that are to be applied along with specific domain knowledge. Scientists learn to spot confounds; journalists learn to watch for the political spin doctors; therapists learn to listen for the meaning behind the words; lawyers learn to find flaws in the other side's case; scholars and educators learn critical thinking. As in individual reality monitoring, these various institutional reality monitoring criteria are often used relatively automatically; when discriminating fact from fantasy is tough, they are used more deliberately and usually involve retrieving more information and integrating the evidence derived from multiple sources to come up with the best judgment given the available evidence. As with individual reality monitoring of autobiographical memories, there may be few conclusions that can be made with 100% certainty.

As individuals, we are often unaware of our own reality-monitoring processes until they fail. The same is true at the social level. However, we can



FIG. 6.6. Reconstruction from the MRI scan of patient U.S., illustrating cultural frontal lobe damage (in black).

tell that we, as a society, implicitly count on these institutions by the surprise or shock we express when the reality-monitoring mechanisms do fail. Revelations of fictitious or composite stories reported as news shock us, as do reports of fraud in science, and perjured testimony before Congress or the courts. There are sanctions for those who violate the norms for collecting, evaluating, and reporting information; for example, you can be fired, lose your grant, lose a libel case, go to jail for perjury, or be disbarred.

In 1981, a reporter for the *Washington Post*, Janet Cooke, was stripped of a Pulitzer Prize she had been awarded for a story about an 8-year-old boy named Jimmy who had been a victim of the drug culture in which he lived. It turned out that Jimmy was fictitious, representing what Cooke saw to be the general situation she was describing (Pippert, 1989). On the other hand, in 1989, a California appeals court dismissed a libel suit by psychoanalyst Jeffrey Masson against Janet Malcolm. Malcolm had written a *New Yorker* article in which she attributed a number of phrases to Masson that he claimed were fabricated. "The court ruled that even if Masson did not say those words, Malcolm's inventions were permissible because they did not 'alter the substantive content' of what he actually said, or were a 'rational interpretation' of his comments" (Henry, 1989, p. 49). That was not the end of this case, however. The Supreme Court reversed the lower court's decision and the case was subsequently tried twice. The first resulted in a mistrial when the jury found in favor of Masson but could not agree on an award amount. The second jury found in favor of Malcolm, deciding that two

disputed quotations were false and one was defamatory, but none were created with the reckless disregard for the truth required in libel cases (Margolick, 1994). The long history of the Malcolm-Masson case is testimony to the difficulty of some of the issues involved in legally differentiating fact from fiction. These two examples show reality monitoring from both within a professional community (in the case of Cooke, journalists) and (in the case of Malcolm) of one institution (the media) by another (the courts).

Journalists are now quite self-consciously worried about the implications of the rise of "reality" TV, docudramas, technologies for altering photos, and so on. They are concerned about their perceived credibility. Some argue for increasing professionalism, better and continuing training, less quoting of unnamed sources, and more attention to ethics (e.g., Belsey & Chadwick, 1992; Fry, 1985; Pippert, 1989). For individual consumers of newspapers, magazines, TV, radio, the movies, and so forth, the potential for conflating fact and fantasy information seems to be increasing exponentially because of the rapid transmission of information and the vividness of TV and movie images. In a year or so, when we think back on the O.J. Simpson case, will we be able to sort out the hard news reports of the actual facts from the inevitable docudrama embellishments?

At the individual level, we might be able to ward off some of this confusion by exercising exposure control (Gilbert, 1993) in order to prevent mental contamination (Wilson & Brekke, 1994) (see Fig. 6.7). We can try to read reliable sources and avoid sensationalized TV presentations. We can minimize or at least clearly contextualize our fantasy life. What are the analogous or appropriate controls to institute at a social level? Here we come up against some deeply held beliefs. One arises from a cultural appreciation of the importance of the duck-rabbit lesson—even when it seems perfectly obvious that something is a duck, we want to protect the right of someone to publicly suggest that it is a rabbit.

This is part of the "free press" rationale for tolerating tabloid journalism. In fact, it appears that mainstream journalism has abandoned the tabloids to the courts for reality monitoring. For example, in 1981, the comedienne and actress Carol Burnett sued the *National Enquirer* and was eventually awarded \$800,000. One researcher suggested, "In the wake of Carol Burnett's successful libel suit, the tabloids are increasingly careful in their celebrity coverage; it may not all be accurate, but relatively little is defamatory" (Bird, 1992, p. 47). Bird also made the interesting observation that tabloid journalism serves an important cultural function, much like the myth-making oral or narrative tradition of earlier times. This is a more sophisticated version of the idea that tabloids are essentially entertainment. From the neuropsychological perspective, tabloids may be the cultural equivalent of the neuropsychological concept of anosodiaphoria. Anosodiaphoria is the term used

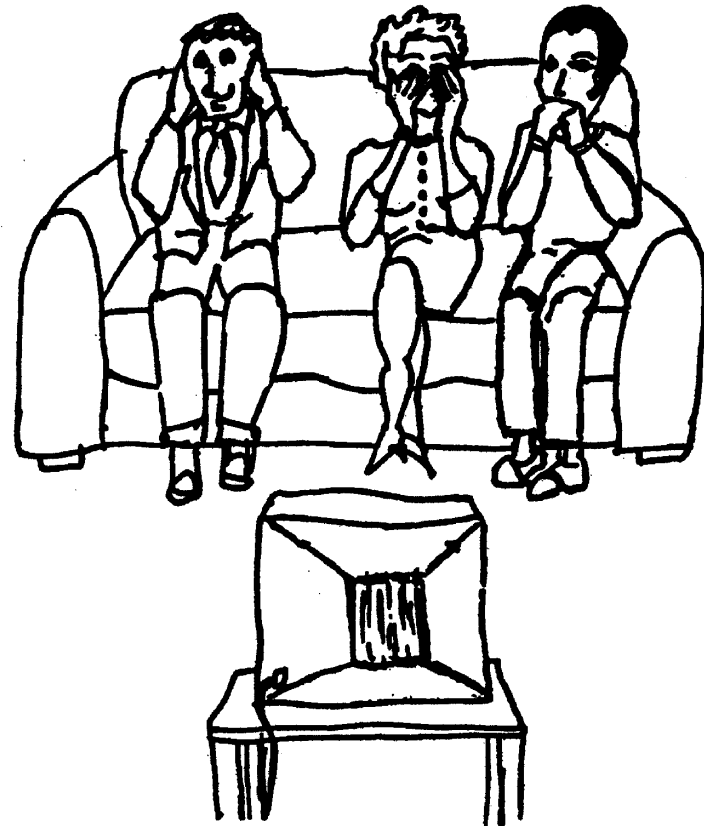


FIG. 6.7. Example of individual exposure control (Gilbert, 1993) to avoid mental contamination (Wilson & Brekke, 1994).

when a brain-damaged patient exhibits a casual acceptance of, or indifference to, an acknowledged deficit.

Well, just how serious do people find various sorts of deviations from the truth? In one preliminary study (Johnson, 1993) addressing this issue, we asked Princeton undergraduates to rate the "seriousness" of a number of situations in which falsehoods occur, on a scale ranging from 0 (not at all serious) to 10 (extremely serious). Consider the case of a tabloid newspaper printing a story about a woman who claims to have been picked up by an alien spaceship when the newspaper has no other evidence that it happened; the mean rating of 2.18 indicates that subjects thought this was only a slightly more serious falsehood than the rating of 1.58 given to a

12-year-old child telling her uncle she likes a present when, in fact, she hates it. In contrast, it was seen as a much more serious falsehood (7.68) when a TV news program sets a car on fire with explosives to have videotape illustrating that the car model has a high incidence of bursting into flames during accidents. This is interesting because it may reflect, in an indirect way, the higher procedural standard people have for the TV news than for tabloids. Presumably, the TV newscasters know of evidence indicating the car's lack of safety and just want to illustrate it. However, it is seen as a serious breach of norms and values when what appears on the screen is not authentic, even if it may depict a true state of affairs. In contrast, the tabloid has no corroborating evidence for the woman's story about the alien—it is simply a good story. It is probably false, but not too serious a breach of norms and values for the paper to publish it anyway. The staged TV video betrays a reality-monitoring trust, a trust that we do not have in the tabloids in the first place. These ratings, we think, reflect the attitude that "everybody" knows those supermarket tabloids are dumb, nobody trusts them, people read them for fun, and nobody is fooled. Hence, loose reality-monitoring criteria are acceptable in what is basically an entertainment medium.

But do tabloids only serve the function of entertaining storytelling? Or do some people get their news and reinforce their beliefs from the tabloids? And do others read them for entertainment and subsequently forget the source of what they remember? A 1990 Gallup poll found that 24% of Protestants and 34% of Catholics believed in extraterrestrial visitors (about the same percentages believe in clairvoyance). Even allowing for the possibility that the questions might have been worded oddly or misunderstood, or the individuals interviewed may have been responding to demand characteristics in the interview, these figures are worth pondering. We do not know, of course, whether tabloids reflect existing beliefs or help establish and maintain them. But a good guess is that the effects are reciprocal and iterative.

Now let's consider another illustration of the complex relations among individual reality monitoring, monitoring at the level of professional organizations, and cross-institutional monitoring—the practice of psychotherapy. There are a number of interrelated controversies raging about the possibility that certain techniques used by therapists are highly suggestive and may create false memories and beliefs in the people the therapists are attempting to help. For example, children who may be reluctant to describe abuse may be repeatedly questioned about it. However, there is some experimental evidence that children who are repeatedly asked about an event that did not happen may develop an embellished account of it (Ceci, Croteau Huffman, Smith, & Loftus, 1994). It has been suggested that multiple personality disorder is the result of a coconstruction between the therapist and the patient—with therapists suggesting various personalities that the patient then role plays (Spanos, 1994). Likewise, a question has been raised about

whether reports of ritualistic, or "satanic," sexual abuse are also products of fantasy, given the absence of documented evidence of some of the purported practices (Bottoms, Shaver, & Goodman, 1994). There is the extremely charged debate going on about whether adults ever show recovery of repressed memories—some claim that traumatic events are never repressed and others claim that this is a relatively common response to trauma, especially abuse (e.g., articles by Holmes, 1994; Horowitz, 1994).

The possibility of specific suggestion is very strong in some of the accounts of therapy or interview sessions; you wonder what the therapist could have been thinking, but certainly it was not about potential pitfalls in reality monitoring (e.g., suggesting to a child that a particular act occurred, or promising a child a prize if they "tell"). The appropriateness of particular therapeutic techniques such as hypnosis, guided imagery, or sodium amytal is under active discussion because of the possibility that these procedures may induce imagined events that later will be the sources of reality monitoring failures (e.g., Lindsay & Read, 1994).

We should also consider how therapists come to hold and sometimes change their views or at least their practice on such important issues. Obviously, those therapists who have been credentialed through some standard path (e.g., an APA accredited clinical psychology program) took courses, were supervised in clinical practice, and passed a state licensing exam. Others went through different credentialing procedures, with different philosophies or emphasis in training, for example, psychiatrists and social workers. In some states, I believe, therapy can be offered with no specific clinical credentials as long as you are careful what title you use.

Surveys of practicing clinicians suggest that few read the research literature or, if they do, few find the results of outcome research very useful (Morrow-Bradley & Elliott, 1986). I suspect that the results of research about basic cognitive and social processes are even less likely to be used than the results of outcome studies. Then how do therapists update their knowledge or expand or alter their approach after leaving training? They report learning from their own experiences and from talking to colleagues. These are, clearly, appropriate and important sources of knowledge (Hoshmand & Polkinghorne, 1992). There is a thoughtful, self-critical literature from within the academic/clinical tradition on how to improve training programs and how to increase the usefulness of research to the practicing clinician (e.g., Galassi & Gersh, 1993; Goldfried, Greenberg, & Marmar, 1990; Kazdin, 1993). A number of practitioners engage in research themselves or are open to interactions with and/or contributions from empirical researchers. But, for many therapists, like journalists, what will get their attention are the court cases that have implications for them.

For example, consider one recent case. Holly Ramona, a college student, was seeing a therapist for treatment of bulimia. During the course of therapy

(including a session with sodium amytal), she began to experience what she concluded were previously unremembered memories of sexual abuse from her father. She instigated a suit under a recent California ruling that allows cases even from many years ago to be tried after abuse is remembered. The father, Gary Ramona, brought his own suit against the two therapists involved, charging that his daughter was, in effect, a victim of suggestive therapeutic techniques that lead to false memories. Mr. Ramona's case against the therapists was recently decided in his favor. According to press reports (Butler, 1994), Mr. Ramona's legal costs have been somewhere around \$1.7 million; \$250,000 was for five expert witnesses, some of whom testified that it is possible for people to confuse real and imagined events and that the techniques used by the therapists could well have resulted in false memories. He was awarded \$475,000 in damages. It is a sobering thought that this kind of judgment against therapists may be more likely to affect future therapeutic practice than a reasoned article in a journal about the nature of memory.

Are the courts the best place for separating out fact and fantasy in this area? Is the courtroom the place to determine whether recovery of repressed memories is a real phenomenon or which therapeutic practices are prudent and which are imprudent? Professional organizations are also considering such issues, of course. For example, the American Psychological Association has appointed a task force to work on this; the American Psychiatric Association's DSM-IV (1994) warns that some clinicians are concerned that there may be overreporting of adult recovery of memories of childhood sexual abuse and notes the possibility of suggestion in assessing dissociative amnesias. A recent issue of the Harvard Mental Health Letter included two articles debating the possibility of repressed memories (Holmes, 1994; Horowitz, 1994). Clearly, there are a variety of ways professional organizations are considering these issues and attempting to keep practicing therapists informed.

Is there reason to expect that all therapists want to be aligned with the criteria of mainstream professional organizations? It has been suggested, for example, that cases of recovered memories of child sexual abuse and of ritual abuse may come disproportionately from a relatively few therapists. On this, or some other issue, the profession of psychotherapy could treat some subset of practitioners like mainstream journalists treat the tabloids, and leave them to the courts to monitor. Like libel suits against the press, negligence or malpractice suits potentially can correct flawed practice. But, like libel suits against the press, they also can have a chilling effect on unpopular ideas. And, if potential consumers do not make as sharp a distinction between mainstream and marginal therapists as they do between mainstream and tabloid newspapers, then confidence in all therapists will suffer when such incidents hit the courts.

Whom do we trust to do our social/cultural reality monitoring? A Gallup Poll (conducted March 25–27, 1994) assessing confidence in institutions

found these percentages of people saying they had either a great deal or quite a lot of confidence in: the Supreme Court, 42; television news, 35; public schools, 34; newspapers, 29; and the criminal justice system, 15. (Too bad they didn't ask about therapists or researchers.) Now, admittedly, these numbers reflect many factors in addition to how confident people feel about the reality monitoring functions of these institutions. Nonetheless, these figures are interesting. For example, they suggest a large disparity between the trust people place in lower courts and the trust they place in the Supreme Court. And even the Supreme Court does not rate very high. These judgments of confidence are likely bound up with people's estimates of how much institutions are guided by shared values and defensible procedures, and how much they are guided by material rewards. I wonder, for example, how widespread are feelings such as "There is freedom of the press for anyone who can afford to publish a newspaper," or "The courts offer justice to anyone who can afford to pay for it."

The roles of individuals, groups, organizations, and institutions are intertwined in cultural reality monitoring. Regardless of whether journalists, therapists, politicians, educators, lawyers, and so forth act in good faith or purposefully deceive, their relevant professional organizations and their consumers and clients (whether other institutions or individuals) tacitly or explicitly monitor the veridicality of the information generated. And, although an individual with an intention to deceive may start out knowing the reality status of what they say, under what conditions do they come to believe their own deception? Professional organizations and individual consumers may unwittingly collude with their deceivers by not challenging information that they have reason to believe cannot be right. Silence or passive acceptance can result in a cultural *folie à deux* that produces professionals committed to ideas they only half believed to begin with. Thus, politicians might come to believe their own unrealistic stump speeches, therapists might come to believe in the efficacy of dubious practices, lawyers to believe that misleading is not lying, and journalists to believe that any source is as good as another as long as it is cited.

A consideration of reality-monitoring processes suggests a healthy skepticism about one's own memory; a consideration of social/cultural reality-monitoring processes suggests a healthy skepticism about what you read in the newspaper or see on TV; about the possibility for error in the courts; and about the suggestions of experts such as therapists, heart surgeons, and even professors and researchers. But in all of these domains, an unhealthy skepticism would be as counterproductive as no skepticism at all. That is, we cannot function either as individuals or as a culture without intact reality monitoring mechanisms that we can assume work. Can we improve our criteria for cultural reality monitoring without sacrificing values such as freedom of expression, open access to professions, or an adversarial court sys-

tem? Can we distinguish between normal reality-monitoring errors and more serious signs of breakdown? In the complex interrelations among cognitions, motives, values, and material constraints operating within and among individuals, organizations, and institutions, can we identify where the lesions are likely to be that produce cultural confabulation, cultural anosognosia, and cultural anosodiaphoria?

Discriminating the origin of memories, knowledge and beliefs—reality monitoring and, more generally, source monitoring—is fundamental not only to individual cognition and social cognition, but also to what might be called “cultural cognition.” Intriguing research questions and challenging issues of social values arise from considering potential applications in domains of public interest.

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