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## TRUSTING MEDICAL AUTHORITIES: EFFECTS OF COGNITIVE AGING AND SOCIAL VIGILANCE

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When we consider how aging affects people's relationships with medical professionals, an important question to ask is whether older adults, compared with younger adults, are more likely to take supposed medical experts at their word. This question is especially relevant in the current environment, in which much marketing of traditional and nontraditional remedies is directed at the public through the mass media by both nonprofessional and professional practitioners. The vast array of information available from the media on a particular medical issue is overwhelming and might at times contain fraudulent claims and misinformation. It has also been suggested that the elderly are more susceptible to fraud than younger adults in a variety of settings (McCabe & Gregory, 1998; McGhee, 1983). Thus, it is possible that older adults also have a greater chance of falling prey to deception when they make health care choices. It is therefore important to examine

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whether older adults compared with younger adults are indeed more likely to trust supposed medical experts.

Many factors contribute to whether a person is persuaded by medical treatment recommendations given to him or her by professional or nonprofessional sources. Of particular interest in this chapter is the finding showing that people are more persuaded by others who are identified as experts than those identified as laypersons (Hass, 1981). People's trust in experts is often so strong that they accept their recommendations without much scrutiny, even if a recommendation is ambiguous (Chaiken & Maheswaran, 1994; Maddux & Rogers, 1980). Research on medical adherence has also shown that patients' impressions of a health care provider can affect persuasion from medical recommendations. People who have more trust in their health care provider report greater adherence to medication regimens and other treatment recommendations than those who report less trust (DiMatteo & Lepper, 1998; Thom, Ribisl, Stewart, & Luke, 1999). In general, the more positive people perceive their relationship with their physician or health care provider, the greater is the level of medical adherence (Garrity & Lawson, 1989).

Thus, when an older adult is given medical advice from a legitimate source who is competent, his or her trust in the professional's expertise can be a positive factor in promoting adherence. However, if the medical information comes from a fraudulent source who claims to be a medical expert, being trusting can have detrimental consequences. The question to ask then is, how do people determine whether others are trustworthy and competent?

It is reasonable to expect that people should be inclined to take the advice of a person they think is honest and competent but less inclined to be persuaded by either an untrustworthy or incompetent person. In this chapter we describe research that has examined how younger and older adults process information that has to do with others' moral and competence characteristics and how cognitive functioning differences between the age groups may affect the manner in which older and younger adults generate inferences about others' personalities.

#### THEMES OF MORALITY AND COMPETENCE IN SOCIAL INFORMATION PROCESSING

When people perceive and think about others and try to determine their intentions, emotions, and dispositions, numerous things can come to mind. How is it that people, for the most part, have little trouble in solving this potentially overwhelming cognitive task? One possibility is that people rely on recurring themes or schemas to organize and simplify their social world. Two potential themes that people appear to use to structure and

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make sense of their lives are morality and competence. *Morality* refers to characteristics relevant to ethics and a sense of right and wrong in interpersonal relationships, as exemplified by traits related to honesty, helpfulness, and sincerity, or the lack thereof. *Competence* refers to characteristics relevant to achievement and the accomplishment of tasks and goals, as exemplified by traits such as intelligence, being knowledgeable, and diligence.

The dimensions of morality and competence have been labeled differently by other researchers. For example, they have been termed *socially good-bad* and *intellectually good-bad* (Rosenberg & Sedlak, 1972), *social attraction* and *intellectual attraction* (Singh & Teoh, 1999), and *liking* and *respect* (Fiske, Xu, Cuddy, & Glick, 1999; Hamilton & Zanna, 1972). Regardless of how they are labeled, the underlying features point to common definitions of the two domains, as just described.

Research on a variety of topics suggests that much of the social information people process about others is related to moral- or competence-related characteristics. When forming impressions of others, morality- and competence-related traits account for most of the variance in multidimensional analyses (Rosenberg, Nelson, & Vivekananthan, 1968). This is consistent with Anderson's (1968) finding that among the 555 traits he studied, the traits that people most desired in others were related to morality and competence. Wojciszke (1994), in an analysis of open-ended descriptions of others, also found that impressions are mostly based on morality or competence considerations. Even at the level of mate selection, men and women across 37 cultures selected kindness and understanding (morality) and intelligence as the most important characteristics in a mate (Buss, 1998).

The distinction between morality and competence is also found beyond the research domain of person perception. Leadership styles can be characterized as social-oriented leadership or task-oriented leadership (Bales, 1953; Fiedler & Chemers, 1974), with the first being concerned with the interpersonal and moral aspects of the group interaction and the latter being related to goal achievement and ability. Similarly, some groups that emerge in organizations are informal and arise to fulfill the socioemotional needs of the members, whereas other groups are more formal in nature and arise to fulfill task-oriented needs (Hammer & Organ, 1978). In another area of research, it has been shown that normative social influence (Asch, 1955) is fueled by people's interpersonal need to be accepted, whereas informational influence (Sherif, 1936) is motivated by a competence-related concern to be accurate (Cialdini & Trost, 1991).

Given how pervasive the categories of morality and competence are in social information processing, it is likely that when people interact with health care professionals in a medical context they will form impressions of the health care providers in terms of morality and competence as well. Information about the health care providers' morality and competence

should influence whether or not clients will subscribe to the providers' recommendations. For example, if you heard that your doctor was able to diagnose another patient's rare condition successfully, which had been misdiagnosed by many other doctors, such displays of competence should affect your impression of the doctor and increase the likelihood that you will adhere to his or her suggestions. But if you learned that your doctor was accepting kickbacks for prescribing drugs from a particular pharmaceutical company, knowing this should influence how you evaluate the doctor and the medical information he or she gives you, making you less likely to take your doctor at his or her word.

#### ARE PEOPLE MORE CHRONICALLY CONCERNED ABOUT MORALITY OR COMPETENCE?

Because morality and competence information are both important and potentially informative dimensions to consider about people, under ideal circumstances it would seem that people would weight and process such information about others equally with few biases. However, as will be described presently, an individual's social cognitive repertoire of person perception skills may lead them to be biased and to favor information from one dimension over another. Therefore, a question we must consider and that served as the motivation for the first study to be described is whether the morality or competence category dominates in information processing. One way to approach this question is by examining the evolutionary context in which the human capacity for processing social information developed.

#### **Indirect Reciprocity**

As human groups became larger than groups of close kin, there were increased opportunities to interact with nonkin. People probably became more dependent on receiving help from nonkin members in such large congregates, and *indirect reciprocity*, which occurs when help offered by one individual is returned from someone other than the recipient of the assistance (Alexander, 1987), had probably become a crucial component of such complex societies. Consequently, monitoring others' morality should have become more important than monitoring their competence because morality-related information reflects whether others generally have the intention to be reciprocating members of the social exchange network. Competence-related information, although still an important component in social perception, would not be as informative about others' potential contribution to the community because it does not reflect others' intention to help. Therefore, in such systems, which are still with us today, every

individual's moral reputation is constantly assessed by other group members to prevent "selfish" individuals from receiving help without ever helping others (McAndrew, 2002; Wedekind & Milinski, 2000; also see Cosmides & Tooby, 1992). Thus, being sensitive to and interested in information related to others' morality, especially their immorality, seems to provide an essential adaptation for the efficient operation of indirect reciprocity. This sensitivity might lead to morality being the primary domain of interest for perceivers in social information processing.

#### Morality and Social Costs

A related reason concerning why people should be more interested in morality-related than competence-related information when processing information about others is that the morality domain allows people to easily assess whether others pose potential costs and threats. As suggested by models of social inference, people hold the lay theory that *immoral* behavior is more informative regarding a person's dispositions than is *moral* behavior (Reeder & Brewer, 1979; Skowronski & Carlston, 1987; Ybarra & Stephan, 1996, 1999). This is the case because moral people tend not to do immoral things, whereas immoral people can do both moral and immoral things. Thus, the morality domain is where perceivers can readily glean information regarding potential threats and costs that stem from others' negative dispositional qualities.

The reverse tends to be the case in the competence domain. For this domain, people hold the lay theory that it is unlikely that an *incompetent* person will, all of a sudden, produce a competent performance. But it is likely that a *competent* person will on occasion, for a variety of possible reasons, do incompetent things (Reeder & Brewer, 1979; Skowronski & Carlston, 1987). Therefore, the most informative cue in the competence domain is positive person information, which should be less useful for signaling potential costs and threats in social exchange.

If the morality domain is primary in social information processing, it is likely that specific areas of the brain may be associated with the rapid and automatic processing of morality-related information. Recent research in neuropsychology suggests that this is the case. Using functional magnetic resonance imaging, Moll et al. (2002) found that people who were examining morality-related stimuli showed increased neuroactivity at the orbital and medial prefrontal cortex and the superior temporal sulcus, which were not activated when examining nonsocial stimuli or other stimuli unrelated to morality.

In another study, people who had sustained damage to the orbitofrontal cortex were shown to have an impaired ability to automatically process moral emotions (e.g., guilt, shame), although other social cognitive abilities

were preserved (Eslinger & Damasio, 1985; Saver & Damasio, 1991). Together with findings from other researchers (e.g., Damasio, 1994; Farrow et al., 2001), such evidence suggests that there are specific areas of the brain that are used in the processing of morality-related information. Such specialization in the brain could possibly contribute to efficiency in the detection and processing of information that signals whether or not others are rule-abiding members of the social exchange network.

The presumed sensitivity to morality-related information may be a general adaptation that at times, though, may be modified depending on specific situational factors. For example, people are most likely to be sensitive to morality-related information when they are forming impressions of others, but because people in social interactions can have goals other than forming general impressions (Jones & Thibaut, 1958), their cognitive strategies should be flexible and sensitive to different demands.

As discussed by Hilton and Darley (1991), some goals will lead people to engage in a broad survey of others' personalities, some goals will lead people to focus on specific domains, and some goals will lead people away from seeking additional information. Certain goals might actually lead people to become more sensitive to competence-related than morality-related information or make people equally sensitive to both domains. For example, people who anticipate competition with others are more interested in seeking competence-related information than morality-related information. This is so because those who anticipate competition need such information to size up their opponents (Chan & Ybarra, 2002). However, given that social exchange is a ubiquitous feature of human life, and because forming impressions of others is a common if not obligatory goal in social interaction, it is likely that on a general level people should be more sensitive to morality- than competence-related information in others.

#### THE CHRONIC CONCERNS OF YOUNGER AND OLDER ADULTS

A noncontroversial premise of the present research is that there are cognitive declines as a person grows older. As people grow older, their general ability to process information is reduced (Craik & Byrd, 1982), and they experience declines in speed of processing and working memory (for a review, see Park, 2000). *Speed of processing* refers to how rapidly people perform mental operations (Salthouse, 1991, 1996), whereas working memory is the online processing capacity available to store, retrieve, and manipulate information. There is evidence that age-related decreases in speed of processing and working memory account for age differences in a broad range

of behaviors, including long-term memory tasks (Park et al., 2000; Park et al., 1996); the assembly of three-dimensional figures from blocks (Morrell & Park, 1993); memory for television, radio, and print news (Frieske & Park, 1999); and reasoning about medical decisions (Zwahr, Park, & Shiffrin, 1999).

Despite these general age-related declines in cognition, people's chronic concern with others' morality (as opposed to their competence) is likely to be present regardless of a person's age. This should be the case because all people tend to remain embedded in a web of social relations (Antonucci & Akiyama, 1987; Charles & Carstensen, 1999), and the use of morality-related information plays a crucial role in monitoring others' status in complex social exchange. Thus, it might be expected that morality-related concepts should be more accessible in memory than competence-related concepts. In particular, it was expected that people would be fastest in reacting to concepts related to immorality. This was anticipated because such information processing supports the posited social exchange mechanism, whereby immorality signals potential costs and threats more effectively than the other types of information (e.g., positive morality- and competence-related information). In addition, it was expected that older adults would also be most sensitive to morality-related information despite being generally slower than the younger adults.

To examine these hypotheses, we conducted an experiment to compare younger and older adults' sensitivity to person information from the morality and competence domains (Ybarra, Chan, & Park, 2001). A lexical decision task (LDT) was used to examine the accessibility of morality- and competence-related concepts in memory. In an LDT, participants are asked to identify whether letter strings that are presented to them are words or nonwords as quickly and accurately as possible. Words related to concepts about which people are chronically concerned should be more accessible in memory and hence should be recognized as words faster than words related to concepts that are less accessible in memory (see Bruner, 1957). For example, people high in religiosity have been shown to be faster at identifying religion-related than religion-unrelated words (Blaine & Nguyen, 2002), and people who hold egalitarian goals have been shown to pronounce words related to egalitarianism faster than words irrelevant to egalitarianism (Moskowitz, Salomon, & Taylor, 2000).

In Ybarra et al. (2001), participants were presented with 24 words that were related to morality (e.g., *honest*, *unhelpful*) or competence (e.g., *intelligent*, *unskilled*). Half of the person cues from each trait domain were positive and half were negative in valence. An equal number of nonwords (e.g., *ostroly*) was also presented to the participants. Participants were asked to indicate if the cue that they saw was a word or nonword as quickly as

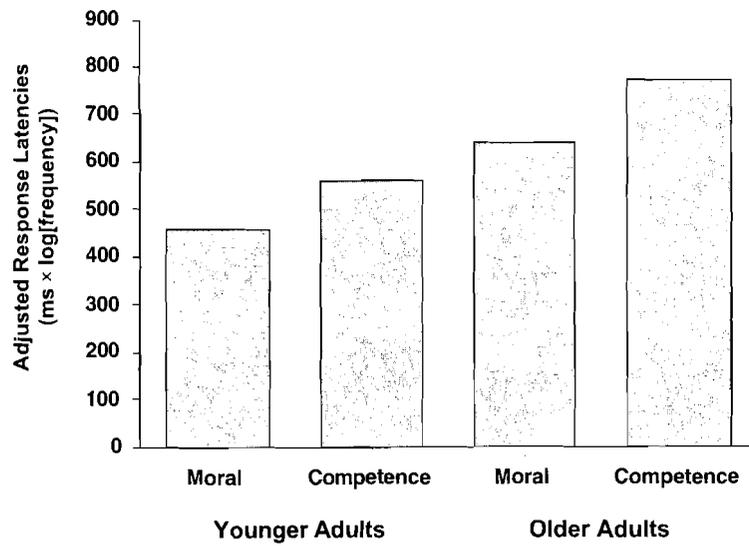


Figure 7.1. Younger and older adults' adjusted response latencies to morality- and competence-related word cues. The adjusted response latency was computed by multiplying the reaction time (ms) by log (word frequency). This was done to control for the influence of the frequency of occurrence of the words (see Balota & Chumbley, 1984). We conducted another study (Ybarra, Chan, & Park, 2001, Study 1) in which we controlled for word frequency experimentally and obtained the same results.

they could by pressing a key on the keyboard. The dependent measure of interest was how long it took participants to respond to the different person cues (traits).

Before the results were analyzed, the response time for each trait cue was corrected for frequency of occurrence (reaction time  $\times$  log [word frequency]; see Balota & Chumbley, 1984). The results of the study indicated that older adults were overall slower than the younger adults in identifying the cues. This finding is consistent with much research in cognitive aging that has demonstrated age-related declines, such as in speed of processing (for a review, see Park, 2000). When the younger and older adults' reaction times to the different types of person cues were examined separately (Figure 7.1), it was apparent that both the younger and the older adults were more sensitive and faster to respond to information from the morality than the competence trait domain. This finding is consistent with the hypothesis that the processing of morality-related person information should remain a central concern for people across the life span.

A closer examination of the reaction times to the morality- and competence-related person cues as a function of cue valence revealed that both younger and older participants were fastest to respond to immoral cues than the other three types of cues (Figure 7.2). Although the analysis



Figure 7.2. Adjusted response latencies to the positive and negative cues as a function of trait domain and participants' age.

revealed no age interactions, there was a trend that suggested that responses to the immorality cues produced the smallest difference between the younger and older adults: difference for moral negative = 160, compared with the differences for the other three types of traits: moral positive = 190, competence positive = 220, and competence negative = 190.

The findings of the first study thus indicated that people's sensitivity to morality-related information appears to be conserved across the life span. Such a pattern of responses may help people remain vigilant about others' contribution to the social exchange network and allow them to determine who is likely to default in social contracts.

#### FORMING MORALITY- AND COMPETENCE-RELATED PERSON IMPRESSIONS

The research reviewed in the first part of the chapter dealt with people's sensitivity to different types of person information. The findings showing that people are most sensitive to morality-related information have important implications for the manner in which people may actually form impressions and generate inferences about others' personalities. Forming impressions of others' personalities is affected by various factors, but one general factor that is bound to influence people's inferences about others is the accessibility of different types of information in memory.

The accessibility of information in memory reflects in part the frequency with which that information has been activated and used in the past. It is reasonable to expect that the more chronically accessible an information category is in memory, the more efficient its use in inference generation, such as in making judgments about others' personalities and intentions. By comparison, an information category that is less accessible in memory should result in more inefficient information processing and inference generation. Therefore, given the greater accessibility of morality-related compared with competence-related information, it would be expected that social cognitive processes that rely on or operate on morality-related information should be more efficient than those that rely on or operate on competence-related information.

The aforementioned reasoning has important implications when we consider age-related cognitive declines. Compared with less efficient processes, more efficient processes should result in social cognitive outcomes that are less likely to be disrupted by cognitive strain, such as the strain produced by age-related cognitive declines. Therefore, given that the processing of morality-related information should be efficient, impression formation that relies on morality-related information may be less affected by a person's age and the person's associated level of cognitive functioning. In contrast, the processing of competence-related information should be less efficient than the processing of morality-related information. Given age-related cognitive declines, it would thus be expected that compared with younger adults, older adults would be less able to generate appropriate inferences regarding a person's level of competence.

#### **Older Adults and Morality Impressions: No Jumping to Conclusions**

In Chan, Ybarra, and Park (2006), older and younger adults were asked to form an impression of a person whom they did not know. Inefficiency in impression formation was assessed by the extent to which participants relied on "cognitive shortcuts" to generate inferences about the person. Participants' reliance on these shortcuts was indexed by the degree to which they showed a primacy effect in impression formation, that is, a bias to base their judgments of the person using the first pieces of information they were presented compared with the last pieces of information.

Primacy reflects people's willingness to jump to conclusions without reviewing all of the available information, and the use of primacy information indicates a person's inability to devote the cognitive energy or motivation to the judgment at hand (Kruglanski & Webster, 1996). For example, the favoring of primacy cues is more likely to occur when people's cognitive resources are reduced by aversive working environments, fatigue, or when the task is tedious (Kruglanski, 1975). An absence of primacy in judgment

or the presence of a recency effect (weighting the last pieces of information to a greater extent in judgment) indicates that people suspended judgment until all of the available information was evaluated. This requires the availability of cognitive resources or the execution of efficient cognitive processes (see Kruglanski & Webster, 1996).

With regard to the present conceptualization, it was thus expected that when it came to forming morality-related impressions, both the younger and older adults would fail to show a primacy effect in their impressions. This was expected because processes that use or operate on morality-related information should be efficiently executed by all people, which precludes any disruption by age-related cognitive declines. By contrast, processes that use or operate on competence-related information, because of their inefficiency, should be amenable to disruption by age-related cognitive declines. Thus, it was expected that older adults would show primacy effects when they formed competence-related person impressions, whereas the younger adults would not. We tested these hypotheses in the experiment we describe next.

### **Empirical Evidence: Older Adults Remain Fluent in Morality Impressions**

In this experiment (Chan et al., 2006), younger and older adults were presented with either morality-related or competence-related behavioral information, and half of this information was positive and half was negative in valence. Participants formed only one impression that was based on either morality-related or competence-related information. Depending on the experimental condition, each participant read five honest and five dishonest acts (morality condition) or five intelligent and five unintelligent acts (competence condition). In addition, for both the morality and competence conditions, the presentation order of the positive and negative information was varied, so that half of the participants scrolled through all of the positive information first then the negative information, and vice versa for participants in the other condition.

After the participants read the behavior statements and formed an impression of the person, they were asked to render their judgments. Participants who formed morality-related impressions were asked to judge the target's honesty, whereas participants who formed competence-related impressions were asked to judge the target's intelligence. The dependent measure consisted of a single trait judgment that was made on a 7-point scale, with higher scores indicating more positive ratings (greater honesty or greater intelligence). From the pattern of trait judgments, we were in a position to infer whether or not participants favored the primacy cues in their impressions.

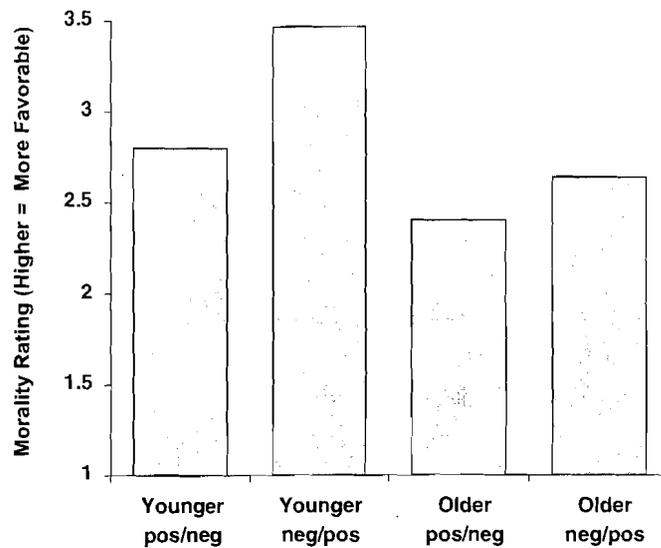


Figure 7.3. Younger and older adults' morality trait judgments as a function of trait domain and presentation orders.

Overall, the findings indicated that morality impressions received lower ratings (i.e., more negative) than competence impressions, despite the fact that both positive and negative information was processed in both conditions. This finding is consistent with the earlier discussion regarding people's greater sensitivity to immorality-related information because such information signals potential costs and threats.

To determine whether participants favored primacy cues in the different conditions, we examined the effect of presentation order (positive-negative or negative-positive) on participants' trait judgments (Chan et al., 2006). A primacy effect was defined as a more positive judgment when the first pieces of the presented information were positive and a more negative judgment when the first pieces of presented information were negative.

With regard to the participants who formed morality-related impressions (honesty, dishonesty), the results indicated that both younger and older adults showed no tendency toward using the primacy information in their judgments (see Figure 7.3). In fact, consistent with expectations, the presentation order effect was significant, indicating that a recency effect was obtained. The trait judgments were more positive if the last pieces of information were positive and more negative if the last pieces of information were negative. Such a pattern of findings indicates that all of the participants suspended their judgments until all of the morality-related information was processed.

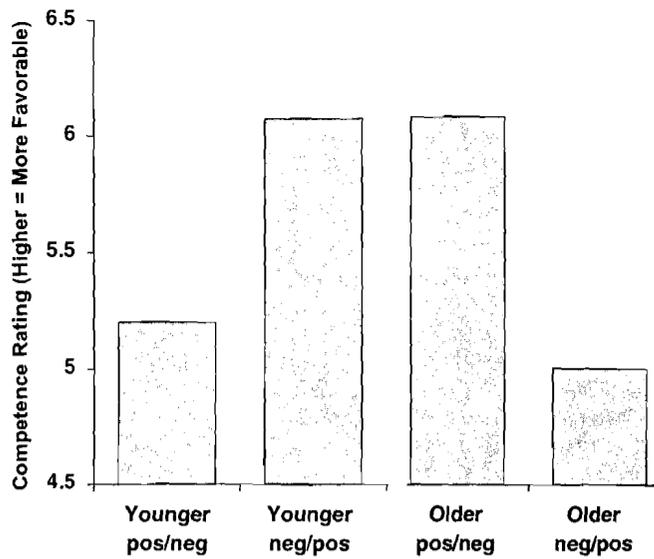


Figure 7.4. Younger and older adults competence trait judgments as a function of trait domain and presentation orders.

For the participants who formed impression judgments related to competence (intelligent, unintelligent), the results indicated that the older adults favored using the primacy cues whereas the younger adults did not (Figure 7.4). The trait judgments made by the older participants were more positive when the first pieces of information were positive but more negative when the first pieces of information were negative. In contrast, the younger adults did not favor the primacy cues but appeared to have suspended judgments until they reviewed all of the available information, resulting in a recency effect. Thus, the older adults appeared to have jumped to conclusions regarding the person's level of competence.

#### CONCLUSIONS AND IMPLICATIONS

The results from the first study (Ybarra et al., 2001) indicated that people are poised to process and recognize information that has to do with a person's morality, especially any indication of immorality. These findings were obtained for both younger and older adults, suggesting that the morality category is more accessible in memory than the competence category, and this sensitivity to morality-related information is conserved across the life span. On the basis of these results, we suggested that the accessibility of person information in memory should affect the efficiency with which perceivers form impressions and generate inferences that are based on either

morality- or competence-related information. This issue was taken up in the second reported study.

In the second study (Chan et al., 2006), the findings showed that in forming morality-related impressions, participants' impressions were not based on the first pieces of presented information, which suggests a suspension of judgment until all of the information was processed. These results were not affected by participants' age. In contrast, participants who formed competence-related impressions showed differences in their inferences as a function of their age. The younger adults once again appeared able to suspend their judgments, as they did not show a primacy effect. However, the older adults showed strong primacy effects in forming competence-based impressions, consistent with the idea that they were unable to suspend judgment until they evaluated all of the competence-related information.

Taken together, the results described in this chapter indicate that certain domains of person information are more efficiently processed than others. Social cognitive processes that rely on or operate on morality-related information tend to be more efficient, which makes them more likely to preclude disruption by cognitive strain such as that created by age-related cognitive declines. In contrast, the processes that use or operate on competence-related information seem less efficient, which appears to leave them open to disruption by age-related cognitive declines.

People's sensitivity to morality-related information and their seeming efficiency in processing such information make sense in that it provides a social cognitive medium through which indirect reciprocity in social systems can operate. In all social systems, each person's moral reputation is constantly assessed by other group members to prevent cheaters from receiving help without ever helping others (McAndrew, 2002; Wedekind & Milinski, 2000; see also Cosmides & Tooby, 1992). This is a constant concern for people, which may help explain people's sensitivity to these aspects of others across the life span. In contrast, although competence-related information is an important component in social perception, it is not as informative about others' potential contribution to the community because it does not reflect others' intention to help or inclination to cheat. Thus, compared with the processing of morality-related information, it makes sense that the use of and processing of competence-related information would be less efficient.

When we consider medical situations, the general implication of the present research is that older adults may be apt to jump to conclusions when evaluating the competence of the source giving the medical recommendation. This tendency may be exacerbated by the fact that medical situations are often surrounded by a sense of crisis and urgency, which should further increase older adults' propensity to rely on primacy cues. This should be the case because the presence of stress, fatigue, and the pressure to learn new medical information may further reduce their cognitive

capacity. If the first bits of information they receive about the source of the medical advice are positive, older adults may develop more positive impressions than if the first pieces of information are negative. In terms of the former possibility, this could put older adults in the position of prematurely favoring a promising miracle treatment suggested by a con artist who presents himself or herself as an expert, even though subsequent information may clearly indicate incompetence. With regard to jumping to the conclusion that the health care provider possesses negative dispositions, this inference could sway the older adults to terminate their relations with the health care provider or to not abide by his or her recommendations, even though later it is discovered that this individual is indeed quite competent and highly regarded.

Some research indicates that older adults generally believe their own physicians are very competent but that physicians and health care providers in general are not highly competent in making judgments regarding older adults (Gould & McDonald-Miszczak, 1996). Thus, another implication of the present research is that older adults are likely to maintain beliefs regarding their health care provider's competence even if they encounter subsequent information that would disconfirm these initial expectations. As a result, an older patient may be less likely to question and be more likely to adhere to medical advice that he or she receives from a practitioner with whom he or she has an established relationship. This should not be a concern in cases in which the practitioner is truly competent. However, in rare cases in which the practitioner is not qualified to provide medical advice and treatment or when the practitioner actually has deceptive intentions, it might be difficult for the older patient to recognize the incompetence of the current practitioner. In addition, the belief that health care providers in general are not highly competent may serve as a barrier to older adults who need to switch to a new practitioner.

Finally, it is of interest to consider research with younger adults in which researchers have provided a mix of morality- and competence-related information to be used in impression formation. The findings from these studies have shown that under such circumstances, impressions of others tend to be swayed more by the morality- than the competence-related information (e.g., De Bruin & Van Lange, 1999; Martijn, Spears, Van der Pligt, & Jakobs, 1992). Thus, one implication of these findings is that to induce a healthy skepticism in older adults when evaluating medical personnel and other sources of medical information, it may be useful to have them focus on determining not only the person's competence but, more important, the person's morality, for example, whether or not the person is honest and helpful. Such a focus may have the unintended effect of allowing older adults to consider more of the available information before making important medical decisions.

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