

Guest Editorial

Social Influence on Memory

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Human memory does not record and store information like technical devices. Rather, memory can deviate in various ways from the original experience of an event. It is fragile and potentially unreliable. Some deviations from the original experience can be attributed to forgetting or trace decay, while other deviations reflect systematic biases and distortions (e.g., McDermott & Chan, 2003; Schacter, 1999). According to a view that has been prominent since the 1970s, memories are dynamic and temporary constructions that are profoundly shaped by a host of factors like the rememberers' cognitive schemata, attitudes, and environmental conditions (see, e.g., Conway & Pleydell-Pearce, 2000). An important source of environmental influences is contact and exchange with other people. Surprisingly, memory researchers have, for a long time now, paid little attention to such *social* influences on memory, while social psychologists have almost exclusively focused on attitude, judgment, and behavior rather than memory as the object of social influence. Investigations of whether and how memories can be biased through contact with others have clearly played the second fiddle in influence research conducted in social psychology (see Bless, Strack, & Walther, 2001). Testifying to this deficit, Roediger and McDermott (2000) concluded the following in a chapter of a reference handbook on memory research:

“One area of inquiry that has received little investigation thus far is the influence that social factors can impose upon the memory of an individual.” (p. 157)

Only in recent years have efforts to illuminate antecedents, processes, and consequences of social influence on memory intensified. This special issue presents current research that makes further progress in this endeavor, promoting a more integrated understanding of the social dimensions of memory. In the following we briefly trace the development and main findings of related research at the interface of memory and social psychology and outline the contributions of the six papers collected in this issue.

Seminal investigations of biasing influences on memory were conducted by Loftus and colleagues in the 1970s (e.g., Loftus, Miller, & Burns, 1975; for reviews see Loftus,

1979, 2005). Their research demonstrated that eyewitnesses can be led to remember false information about an event that is conveyed to them by subtle means, such as presuppositions in questions about a witnessed event. However, in these and many subsequent studies, the source of the biasing information was merely *implicitly* present, presumably being the experimenter or researcher. In recent years researchers have extended the approach to include other social sources of biasing information, for instance, another participant (Gabbert, Memon, & Allan, 2003; Wright, Self, & Justice, 2000) or a confederate of the experimenter (Meade & Roediger, 2002; Reysen, 2005; Roediger, Meade, & Bergman, 2001). In these studies the biasing social sources are physically present and interact with the to-be-influenced participant, thus allowing the investigation of social influence in more realistic conversational settings than was afforded by the earlier approaches. This body of research has focused on how a speaker may implant biasing information in a listener or replace information already existing in the listener's mind with new information. The typical structure of social influence in these studies is dyadic, and unilateral communication about the past in which biasing information from a source is transmitted to an individual recipient, who is the target of influence.

Related research has been concerned with how communication about the past in small groups shapes memory (e.g., Basden, Basden, Bryner, & Thomas, 1997; Weldon & Bellinger, 1997). The typical arena of social influence in these studies involves multilateral communication about past experiences between more than two people, who can be both transmitters and recipients of information. Regarding quantitative performance it was found that the recall of actual groups is often worse than the recall of so-called nominal groups, i.e., the pooled recall performance of individual group members remembering material separately (Weldon & Bellinger, 1997). This effect was labeled *collaborative inhibition*. It has been debated whether this inhibition might be due to social loafing, i.e., reduced performance motivation of individuals given the presence of other group members (see Weldon, Blair, & Huebsch, 2000), or the disruption of individual retrieval strategies during group remembering

(e.g., Basden et al., 1997). While this line of research has focused on the quantity of group recall, other studies have looked at how the quality of group members' memories is affected by remembering in a group setting, with special interest in whether and how group members may develop false memories for an original input experience. One way in which group remembering may lead to false memories is social contagion (for evidence in dyads, see Roediger et al., 2001), i.e., the spread of a piece of misinformation about an experience from one or more group members to the others (e.g., Basden, Basden, Thomas & Souphasith, 1998; Cuc, Manier, Ozuru, & Hirst, 2006; Hirst, Manier, & Apetroaia, 1997; Muller & Hirst, in press).

For researchers interested in influence from social sources it is important to understand how the perception of the source moderates its impacts on a recipient, be it in dyadic or group situations. The study of the role that the perception of the source plays in such processes is indeed an interface par excellence between social and memory psychology. As traditional research on persuasive communication in social psychology suggests (e.g., Hovland & Weiss, 1951), the impact of transmitted information on a recipient should depend on the perceived credibility or trustworthiness of a social source. Indeed, studies have found that the influence of misinformation on recipients' memory is reduced when the information is provided by an apparently low-credibility (vs. high-credibility) source, both when credibility is manipulated before (Dodd & Bradshaw, 1980; Smith & Ellsworth, 1987; Underwood & Pezdek, 1998) or after the delivery of misinformation (Chambers & Zaragoza, 2001; Echterhoff, Hirst, & Hussy, 2005; Echterhoff, Groll, & Hirst, 2007; Highhouse & Bottrill, 1995). Evidence suggests an important precondition of successful resistance against influence from a misinformation source in the latter case, i.e., when recipients learn about the low credibility of a source after the encoding of biasing information. Social contagion or misinformation influence can be reduced to the extent that recipients can attribute potential event information correctly to the source at the time of remembering (Echterhoff, Hirst, & Hussy, 2005; Echterhoff et al., 2007).

Two papers in this special issue examine the role of group members' characteristics in the influence of joint remembering in small groups. One important way by which these papers make a novel contribution to the field is the integration of source features into the research on effects of group memory. *Brown, Coman, and Hirst* focus on two characteristics of a group member in shaping other group members' memories: the group member's perceived expertise and the degree to which she or he adopts the role of a narrator in the group, thus dominating the conversation about to-be-remembered material. Their findings show that expertise and narratorship independently allow a group member to influence the other members' memory. *Peker and Tekcan* investigate the role of

familiarity among group members on collaborative inhibition and social contagion, thus addressing both quantitative and qualitative aspects of group remembering. The standard collaborative inhibition effect is found in joint recall of both friend and nonfriend groups; however, groups of nonfriends outperform nominal groups in a subsequent recognition test, suggesting that groups can benefit in the long run from initial joint recall. Social contagion is more pronounced in groups of friends, perhaps because of greater reliance of group members on each other's memory.

Focusing on traditionally social-psychological phenomena, *Vernet, Vala, Amâncio, and Butera* examine the extent to which socially relevant attitudes depend on explicit source memory. The authors argue that a societal value (here, women's rights) is often dissociated from the source (here, the feminist movement) that once promoted it. Their findings indicate that the rejection of the feminist minority (as well as hostile sexism) can be reduced by reminding people about the source of that commonly shared value, i.e., by a reassociation between a political program and its source. Apparently, the reassociation with a valued political position can benefit the perception of the source – but only if the dissociation is blamed on mere forgetting rather than on outright discrimination. This approach, thus, reveals the potential significance of source memory in a broader socio-political context.

All the effects outlined so far are instances of "classical" social influence such as persuasion or conformity which have been demonstrated long ago by social psychologists (e.g., Asch, 1956; Deutsch & Gerard, 1955; Sherif, 1935; for reviews, see Cialdini & Trost, 1998; Wood, 2000). A plethora of social influence studies in social psychology has revealed that people's attitudes, judgments, or behaviors may change as a result of other people's communication or responses to a situation. For instance, it has been shown that people's judgments concerning a variety of objects, ranging from simple physical stimuli to complex social issues, can be affected by what other people say about the object. In classical social influence, the information that can potentially exert biasing effects on a target individual emanates from other social agents. Thus, the potentially biasing information is produced by others in the social environment of the person who is ultimately influenced. Analogous to these studies of classical social influence, the above approaches showed that a person's memory for a target event can be shaped by information communicated by others about the event (for a discussion of the analogy, see Bless et al., 2001).

Adopting a focus different from that of classical influence research, researchers have examined how the communication of experiences can affect the speakers' own memory for the experience (Adaval & Wyer, 2004; Echterhoff, Higgins & Groll, 2005; Echterhoff, Higgins, Kopietz, & Groll, 2008; Tversky & Marsh, 2000; for reviews see Chiu, Krauss, & Lau, 1998; Echterhoff, Hig-

gins, & Levine, in press; Marsh, 2007). In this case, the biasing information is produced by the person who is ultimately influenced, not by other social agents. Compared to the influence of speaker on listener, this type of creating shared memories in conversation has received less attention by researchers (also see Hirst & Echterhoff, 2008). The idea that speakers' memory for experiences can be biased by their own communication about these experiences is arguably less prominent in people's intuitions or lay theories about memory than is the notion that speakers may bias others' (i.e., recipients' or listeners') memory. People may suspect being unduly influenced when another person provides her or his version of a jointly experienced event. In contrast, they may not suspect that their own talking about the past may exert unwanted influences.

Two papers in this special issue by *Kopietz, Echterhoff, Niemeier, Hellmann, and Memon* and by *Echterhoff, Lang, Krämer, and Higgins* examine when and how communicators' memory is influenced by audience tuning, that is, communication tailored to the audience's perspective or attitude regarding the topic. To explain the occurrence of audience-tuning effects on memory, they draw on shared reality theory (Echterhoff et al., in press; Hardin & Higgins, 1996). Partly because of their origin in early social cognition research (Higgins & Rholes, 1978; also see Higgins, Rholes, & Jones, 1977), existing studies of audience-tuning effects have focused on memory and judgment regarding a target person, based on ambiguous verbal input material that communicators describe to their audience. Kopietz and colleagues extend the approach to eyewitnesses' retellings of an incident to a co-witness, employing complex visual input material, that is, video-filmed behaviors of target persons. In their study, student participants tune their retelling of a witnessed incident to their audience's evaluation of the suspects in the incident. It is found that participants' own memories and judgments regarding the incident are more biased toward their audience when they are more (vs. less) motivated to create a shared view with a particular audience (a student with a similar vs. dissimilar academic background).

Returning to audience-tuning effects on memory for a target person, Echterhoff and colleagues examine, in the context of personnel assessment in an organization, the role of audience characteristics. Student communicators described an employee to either an equal-status audience (a student temp) or a higher-status audience (a company board member). Although audience tuning is found in both conditions, it biases communicators' memory only in the equal-status condition. The authors argue that the equal-status audience, while lacking domain-specific expertise, is perceived as a more trustworthy partner for creating a shared reality.

The concluding contribution to the special issue is a theoretical paper by *Blank*, who proposes a framework for an integration of approaches from memory and social

psychology. According to this framework, memory retrieval involves two stages: the conversion of accessed memory information into memory beliefs (validation stage) and the subsequent generation of memory statements (communication stage). Drawing on a common social-psychological distinction between different types of influence, Blank argues that social influence at the first stage is primarily informational, while social influence at the second stage is predominantly normative.

Beyond the specific insights into different types of social influence on memory, this special issue is also intended to reveal implications of this line of research that reach beyond the confines of memory phenomena. As the work on shared reality indicates, only by understanding the complex dynamics by which communication reshapes the memories of speaker and listener can psychologists begin to appreciate how social interactions aid in the intersubjective construction and experience of what is real and meaningful (see Echterhoff et al., in press). Moreover, as scholars have dug deeper into the influence social interactions have on memory, they have also begun to explore how communities can come to remember the past in similar ways. The new – and growing – interest in a psychology of collective memory arises in part out of the awareness that collective memories ground collective identities. The study of social influences on memory offers tools for researchers for investigating how the mechanisms of individual memories can shape something as socially encrusted as collective memory and identity (Hirst & Manier, 2008). Given these broader perspectives, the present papers could contribute to a larger effort to understand the role individual memory plays in fundamentally social phenomena such as the interpersonal construction of reality, knowledge, and identity.

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