PRACTICAL ASPECTS OF AUTOBIOGRAPHICAL MEMORY

David C. Rubin
Psychology Department, Duke University
Durham, NC 27706 USA

ABSTRACT

The study of autobiographical memory forces psychologists to consider many practical aspects of memory that are often overlooked in more traditional research. These include changes in the remembererer from the time of encoding to the time of retrieval, the phenomenological experience of remembering, and differences in the initial perception of the stimulus. Implications for theory and application are discussed.

One of the most practical aspects of autobiographical memory is a theoretical one. Studying autobiographical memory has forced us to question and broaden our concept of memory to include many factors needed to understand memory in real-world settings. In most laboratory settings, memory can be operationally defined by a situation in which a) a stimulus is presented to a subject, b) time passes, and c) the subject attempts to recall or recognize the initially presented stimulus. Theoretical conceptions of memory stemming from the laboratory situation stay close to the operational definition. Many of the most practical aspects of autobiographical memory research expand such a conception. Each of the following three sections discusses an issue that expands our understanding of memory.

THE REMEMBERER CHANGES OVER TIME

It is common in studies of autobiographical memory to have a person at age 70 recall events that happened at age 5. In such cases the stimulus is recalled by a very different subject than the one to whom it was presented. There are at least two classes of reasons for this. First, a 70-year-old does not have the mind of a 5-year-old. Second, stimuli presented in the context of one time appear different in the context that exists 65 years later (Linton, 1986; Neisser, 1982). In most laboratory experiments, the changes that occur to the subject and the subject's context are minimal and are directly related to the material presented or other manipulated factors. This is not the case in autobiographical memory studies. Theoretically, such changes in subject and context are challenging. However, in traditional laboratory studies of human memory , such long-term changes in cognitive functioning are usually not considered.

First, consider changes in the subjects themselves. Phenomena such as childhood amnesia and reminiscence force the study of autobiographical memory to examine changes in the cognitive ability of subjects over time. There must be some change in the

early years that results in childhood amnesia and some change in early adulthood, middle age, or both that results in reminiscence (Rubin, Wetzler, & Nebes, 1986). In addition, if the subject changes due to injury or illness, the resulting effects can be of great practical importance.

Less dramatic developmental changes in the subject also become important because the events remembered span a lifetime. For instance, we need to know what people of different ages can remember from an event. In addition to changes in the basic cognitive processing, there are vast additions to the knowledge people accumulate over their lives, and this knowledge can alter the way in which earlier knowledge is accessed. Developmental psychologists have dedicated much of their efforts to understanding such changes (Fitzgerald, 1986), but in most areas of cognition outside the study of autobiographical memory, this understanding can be ignored.

Second, consider changes in the environment outside the laboratory. Such changes are usually ignored by cognitive psychologists; they are the subject matter of anthropology or sociology. Moreover, for most of the work we do, such environmental changes are irrelevant because they affect all subjects in a fairly uniform way. In studying autobiographical memory, however, such changes occur within individual subjects and therefore cannot be removed from the study by selecting a homogeneous subject population. For instance, memories about a war or a work place can be affected, not only by initial encoding, but also by later changes in and attitudes toward that war or work place. Similar effects can be even more pronounced in memories about the self and other people. Effects and concepts more common to anthropology and sociology, and particularly to the psychology of aging (Schaie, 1965), need to be included in the study of autobiographical memory to a much greater extent than they do in other areas of memory research.

THE PHENOMENOLOGICAL EXPERIENCE OF RECALLING IS CRUCIAL

To have an autobiographical memory, a person must have a sense that he or she actually experienced the recalled event. In a recall or recognition experiment, especially where guessing is encouraged, this is not the case. Traditional experimental psychology is often concerned with the relation between knowing something and knowing that you know something, between explicit and implicit knowledge, and similar distinctions; but in autobiographical memory, additional aspects are added that can be of great practical importance. Assume that a friend tells you about an event you observed. It may seem familiar to you, but you do not remember the actual event. You then take a recall or recognition test concerning the event and do so successfully based on your friend's report. You may have a memory for the event as measured by the test, but not an autobiographical memory [i.e. a personal memory by Brewer's (1986) definition]. The autobiographical memory is not real to you because you do not remember the event, you only remember being told about it. You have no sense of reliving the event. You have no belief that you actually experienced the event. Occasionally, theories of laboratory recognition (e.g. Mandler, 1980) do make use of the subjective feeling of familiarity in a sense that is similar to, yet different from, the notion of reliving.

The neuropsychological literature provides the most striking examples of dissociation of the ability to report a past event from the sense that the report is an autobiographical memory. There are cases both of patients who cannot remember events that they know occurred and of patients who remember events that did not occur. For instance, Crovitz (1986) described a closed head injury patient who could not remember an event he knew had occurred. The patient knew about details of the event, but had no sense that he was remembering those details from firsthand experience. In contrast, Baddeley and Wilson (1986) described instances of patients with prefrontal lobe injury who remember firsthand experiences of events that never occurred. Cognitive psychologists have examined the relation of subjective reports to memory and other cognitive processes (Ericsson & Simon, 1980), but the autobiographical memory literature adds a new dimension and reality to the phenomenological aspect of memory reports.

THE STIMULUS VARIES WITH THE SUBJECT

For purposes of later recall, subjects in traditional laboratory recall experiments create their own realities just as subjects in autobiographical memory experiments do. The difference is that traditional laboratory experiments succeed in making the constructed reality much more similar for all subjects than is possible for most studies of autobiographical memory. Past histories, motivation, immediate context, and other factors play a role in traditional memory studies. One reason such studies often use stimuli that are of no inherent interest to the subjects is to minimize the effects of these factors, or at least to make them as constant as possible across subjects. For most studies of autobiographical memory, the stimulus is an event of inherent interest to the subject.

In practical terms the observation that the stimulus is perceived differently by different subjects makes questions of verifiability and of degree of recall more difficult to answer. Would errors normally attributed to memory be observed if subjects were asked to describe the stimulus while it was still present? Would the differences in the amount reported, which are normally attributed to memory, be present if subjects were asked to describe everything they saw while an event was occurring? Laboratory research can minimize differences in initial perception that autobiographical memory research usually cannot.

Another way of viewing the same problem is to say that the relation of memory to other `faculties' is more variable in studying autobiographical memory. The perception, motivation, personality, and self-concept of a subject play a role in all memory experiments, but their differential effects are larger in studies of autobiographical memory. Studying memory in isolation from other `faculties' has been, and will continue to be, a productive enterprise, but integrating memory with other `faculties' is a useful balance.

CONCLUSION

Autobiographical memory forces us to view memory in a more realistic way as part of a functioning person. It makes clear the

limitations and artificial boundaries we impose on our science. At times these boundaries are useful and serve us well, but we must remain conscious of what we are excluding from study. In practical situations, many of the factors we exclude from traditional laboratory study are of central importance. Autobiographical memory research forces us to reexamine these factors.

REFERENCES

Baddeley, A., & Wilson, B. (1986). Amnesia, autobiographical memory, and confabulation. In D. C. Rubin (Ed.), Autobiographical memory (pp. 225-252). Cambridge: Cambridge University Press.

Brewer, W. F. (1986). What is autobiographical memory? In D. C. Rubin (Ed.), Autobiographical memory (pp. 25-49). Cambridge: Cambridge University Press.

Crovitz, H. F. (1986). Loss and recovery of autobiographical memory after head injury. In D. C. Rubin (Ed.), Autobiographical memory (pp. 273-290). Cambridge: Cambridge University Press.

Ericsson, K. A., & Simon, H. A. (1980). 'Verbal reports as data', Psychological Review, 87, 215-251.

Fitzgerald, J. M. (1986). Autobiographical memory: A developmental perspective. In D. C. Rubin (Ed.), Autobiographical memory (pp. 122-133). Cambridge: Cambridge University Press.

Linton, M. (1986). Ways of searching and the contents of memory. In D. C. Rubin (Ed.), Autobiographical memory (pp. 50-67). Cambridge: Cambridge University Press.

Mandler, G. (1980). 'Recognizing: The judgement of previous occurrence', Psychological Review, 87, 251-271.

Neisser, U. (1982). Snapshots or benchmarks? In U. Neisser (Ed.), Memory observed: Remembering in natural contexts (pp. 43-48). San Francisco: Freeman.

Rubin. D. C., Wetzler, S. E., & Nebes, R. D. (1986). Autobiographical memory across the lifespan. In D. C. Rubin (Ed.), Autobiographical memory (pp. 202-221). Cambridge: Cambridge University Press.

Schaie, K. W. (1965). 'A general model for the study of developmental problems', Psychological Bulletin, 64, 95-107.

AUTHOR NOTES

Support was provided by NIA grant number AG04278.

PRACTICAL ASPECTS OF MEMORY: CURRENT RESEARCH AND ISSUES

VOLUME 1

Memory in Everyday Life

EDITED BY

M. M. Gruneberg
University College of Swansea

P. E. Morris
University of Lancaster

R. N. Sykes
University College of Swansea

JOHN WILEY & SONS
Chichester · New York · Brisbane · Toronto · Singapore

Proceedings of the 2nd International Conference on Practical Aspects of Memory held under the auspices of the Welsh Branch of the British Psychological Society, in Swansea from August 2nd–8th 1987

British Library Cataloguing in Publication Data available

ISBN 0 471 91234 4

Printed in Great Britain