## **ABSTRACT**

Memory Determined by Schemata: A Cognitive Linguistic Analysis of the Effect of Culture- based Schemata on the Reproductive Competences of People from East and West.

I-Ying Lin (National Chengchi University, Taiwan)

iyinglin0729@gmail.com

Schemata have not only "revolutionized" the way the memory is perceived in cognitive linguistics but also set the foundation for extensive study of the effects certain types of schemata have on the reproductive abilities of people. Researchers like John & Berney (1968) and Invernizzi & Abouzeid (1995) have shown that these "mental structures acquired through many experiences [and] in routine" (1995) have a fundamental effect on the way an individual interprets and remembers a certain input.

This paper is based on these findings and analyzes in how far subliminal cultural concepts and schemata affect the action of learning and processing input. By investigating the way in which German and Taiwanese individuals remember and handle culturally biased stories, this paper answers the question whether the participant's Taiwanese and German cognitive cultural schemata result in different reproductive patterns when being exposed to foreign or native cultural input. An experiment based research methodology was implemented: A group of Germans and Taiwanese will each be selected and given a story from their own culture as well as a story from the opposing culture. In this context traditional folk and/or religious stories are considered to be most meaningful. The groups are then asked to remember and retell the story. This action of story retelling thereby resembles the most basic form of learning meaning the filtration of meaningful content as well as the memorization. The then following analysis of the story recalls is done by combining analytic tools introduced by Ivernizzi & Abouzeid (1995), Rumelhart (1977) John and Berney (1968) and Van Hell, Bosman, Wiggers and Stoit (2003) featuring story grammar, the complexity of the story recalls and the prevalence of chain elements on the level of semantics in a spreadsheet style. The aim of this paper is thereby to determine if learning and input processing is easier if the input content is sensitive to existing cognitive structures.

The results show the strong impact of schemata on the way and the complexity of the story recalls. Yet it is striking that the data shows some unexpected results. The analysis originally hypothesized that both German and Taiwanese participants would perform the story from their own culture better than reproducing the one from opposite culture. However, this hypothesis only matches the data from German participants. In other words, the consequences from Taiwanese candidates show

characteristics of both Western and Taiwanese schemata. It is suggested that this is due to the increased westernization of the schema-creating Taiwanese environment while the German participants are primarily shaped by Western schemata only. By further comparing the story recalls certain typical Western and typical Taiwanese schemata could be identified.

Offering a comprehensive insight into the impact of schemata as possible representations of cognitive concepts, this paper may serve as the basis for a broader investigation how learning as the most studied form of processing input is determined by schemata and concept. This may lead to the improvement of schema-conscious teaching of English as it is already introduced by Coady (1979), Carrel (1984), Carrel & Joan (1998) and Zhang (2010).

## Reference

- Bartlett, F. C. (1932). Remembering: A Study in Experimental and Social Psychology. Cmabridge, U.K.: Cambridge University Press
- Carrell, P. L. (1984). Schema Theory and esl Reading: Classroom Implications and Applications. *The Modern Language Journal*, 68(4), 332-343.
- Carrwl, P.L. & John C. (1998). Schema Theory and ESL reading pedagogy. *Interactive Approaches to Second Language Reading*. P.L. Carrel et al(ed). Cambridge. Cambridge University Press.
- Cody, J. (1979). A psycolinguistics model of the ESL reader. In R., mackay, B. Barkman & R.B. Jordan (eds.). *Reading in a Second Language*. Rowley, M.A: Newbury House Publisher.
- Engleberg, I. N., & Daly, J. A. (2009). *Presentations in everyday life: strategies for effective speaking*. Boston: A&B/Pearson.
- Glenn, C. G. (1978). The role of episodic structure and of story length in children's recall of simple stories. *Journal of Verbal Learning and Verbal Behavior*, 17(2), 229-247.
- Invernizzi, M.A., Abouzeid, M.P. (1995). One Story map does not fit all: Across-cultural analysis of Children's written story retelling. *Journal of Narrative and Life History*. 5(1), 1-19.
- John, V.P., Berney, J.D., (1968). Analysis of story telling as a measure of the effects of ehnic content in stories. In J. Helmuth (Ed.). *The disadvantaged child: Head start and early intervention*. (Vol.2) (pp. 258-287). New York: Brunner/Mazel.
- Kintsch, W., Grenne, E. (1978). The role of culture-specific schemata in the comprehension and recall of stories. *Discourse Process*. 1. 1-13.
- Kramsch, C. (1998). Language and Culture. New York: Oxford University Press.
- Menig-Peterson, C. & McCabe A.K. (1983). *The structure of children's Personal narratives: Three views*. New York: Plenum.
- McCabe A.K., (1998). Sentences Combined: Text and Discourse. In Gleason Jean and Ratner Nan (Ed.). *Psycholinguistics Second Edition*. (pp.276-308) Belmont, California: Thomson Wadsworth.

- Piaget, J. (1923). La langage et la pensée chez l'enfant: Études sur la logique de l'enfant.
- Piaget, J., & Cook, M. T. (1952). *The origins of intelligence in children*. New York, NY: \_\_\_\_International University Press.
- van Hell, J. G., Bosman, A. M., Wiggers, I., & Stoit, J. (2003). Childrens cultural background knowledge and story telling performance. *International Journal of Bilingualism*, 7(3), 283-303.
- Zhang C. The Teaching of Reading Comprehension under the Psychology Schemata Theory. *Journal of Language Teaching and Research*. 2010;1(4).