From Semantic Processing and Representations to Semantic Development

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In the past 40 years, the research of cognitive psychology has been changing in both theory and technology to make this field more diverse and yet more integrative than before. This article provides a critical review on the changes of semantic processing and semantic representations with a focus on Chinese studies of Taiwanese researchers. The authors point out what potential limitations are in the literature and how subsequent changes come to answer critical questions. Two trends of changes on semantic processing and representations are observed, including a shift from adult participants to child participants and a shift from behavioral measures to neuroimaging measures. In the end, three suggestions are proposed for future directions: exploring topics of metaphor to understand semantics beyond the character/word level, recruiting neurologically impaired participants to examine the functional architecture of semantic representational systems, and using a longitudinal approach to evaluating developmental changes of semantic processing and representations.

Keywords: *representations, change, processing, development, semantics*