

# R3: Effects Of Phonological and Semantic Cues on Word Learning among Jordanian Preschool Children With SLI

Amer MA, Rogayah AR

Speech Sciences Program, School of Rehabilitation Sciences, Faculty of Health Sciences

## ABSTRACT

**Introduction:** Word learning is one of the most common problems faced by children with specific language impairment (SLI). The current study aims to investigate the word-learning abilities of Arabic speaking Jordanian SLI children with the aid of phonological and semantic cues. **Methods:** Two groups of pre-school children with SLI and typically developing (TD) children participated in this study. The two groups were matched in terms of: IQ score, age, gender and socioeconomic status. An independent-sample t-test was conducted to compare the mean performances and to find out the efficacy of the cues on word learning of the children with SLI and TD children. **Results:** The findings showed that there were significant differences ( $p < 0.01$ ) between children with SLI and TD children in the mean scores of the production and comprehension tasks during the five days of word learning, and there were significant differences ( $p < 0.02$ ) between children with SLI and TD children in the mean scores of the recognition task during the five days of word learning. The result also showed that children with SLI scored significantly lower than TD children in production, comprehension and recognition of words. **Conclusion:** This study concluded that children with SLI performed poorly compared to the TD children in semantics, phonological tasks and word learning. The children with SLI benefitted from phonological and semantics cues but it was not sufficient for them to perform at par with the TD children. Our findings suggested that the children with SLI had improved on the semantics representation of words in terms of comprehending and recognizing the word, however they have more difficulties in producing new word because they still do not have sufficient amount of phonological representation.

## KEY WORDS:

SLI, Phonological cues, semantics cues, phonological awareness, semantics awareness

---

# R4: Treatment of Single-Word Writing for A Malay Patient with Acquired Dysgraphia following Stroke: A Single-Case Experimental Study

Mohd Azmarul AA<sup>1,2</sup>, Rogayah AR<sup>3</sup>

<sup>1</sup>Speech Therapy Unit, Cheras Rehabilitation Hospital, Ministry of Health Malaysia, <sup>2</sup>Clinical Research Centre, Cheras Rehabilitation Hospital, Ministry of Health Malaysia, <sup>3</sup>Speech Sciences Program, School of Rehabilitation Sciences, Faculty of Health Sciences, National University of Malaysia

## ABSTRACT

**Introduction:** Disruption to the processes that supports spoken language in people with aphasia following stroke also tend to interfere with the ability to write or referred to as dysgraphia. **Method:** This study examined the effectiveness of a novel treatment for writing by Beeson (1999) administered on a Malay patient (GM) who had significant conduction aphasia affecting both spoken and written language. GM received Anagram and Copy Treatment (ACT), a clinician-directed treatment that required the arrangement of component letters presented in scrambled order (i.e., an anagram) for the patient to form a target word, followed by repeated copying of the word. Single-subject multiple-baseline design was used with sets of words (both nouns and verbs) sequentially targeted for treatment. Prior to the initiation of the writing treatment, a series of single-word writing and reading assessments were conducted. Probes assessing generalizations to untrained pictures were presented at 8th, 13th and 18 th sessions. The assessments were repeated after the treatment was completed in order to monitor the progress of the writing treatment. **Results:** Prior to treatment, GM showed minimal ability to write words, but subsequently demonstrated rapid learning for spelling of the words targeted. He showed steady improvement in the writing of trained nouns and verbs: from 0-10% baseline accuracy to over 90% accuracy at end of treatment for nouns and verbs. Generalizations to untrained nouns and verbs also showed similar results. GM exhibited marked progress: from able to write 22 nouns (44%) and 19 verbs (38%) in the first probe to 47 nouns (94%) and 38 verbs (76%) in final probe. Pre- and post-assessments results revealed that GM performed better in all of the tasks measured. **Conclusion:** Single-word writing treatment may improve dysgraphia among adults with aphasia through the administration of a structured and systematic treatment.

## KEY WORDS:

Nouns, verbs, aphasia, dysgraphia, writing treatment