



# Bilingual Acquisition of Language and Literacy: State of the Art and Beyond

**JOSEFIN LINDGREN** 

**ASSUNTA SÜSS** 

**NATALIA GAGARINA** 

\*Author affiliations can be found in the back matter of this article

## 1. INTRODUCTION

This special collection brings together selected papers from the conference Bilingual Acquisition of Language and Literacy (BiALL) that took place May 22–24, 2019, at the Leibniz-Centre General Linguistics, Berlin, Germany. The collection aims to provide an in-depth view on selected aspects of the bilingual acquisition of language and literacy in children aged 4 to 16. In particular, the four papers address reading and writing, narrative skills, and expressive and receptive vocabulary. The four studies, taken together, include data from over 300 children speaking four language combinations (Russian-German, Arabic-Swedish, Greek-German, Dutch-German). The papers in the special collection contribute substantially to the growing body of literature on bilingual acquisition and shed light on a number of interesting issues such as the importance of input for vocabulary in bilingual children's languages; the interaction between language dominance and linguistic distance in bilingual narrative development; and the role of factors such as lexical knowledge, reading experience, and home language classes in the development of biliteracy. In this introduction, we give an overview of relationships between the aspects brought up in the four studies. First, we discuss vocabulary and (oral) narrative skills (Section 2), after which we focus on oral language skills, including narrative skills, and biliteracy (Section 3), ending with a conclusion and overview of the studies in the special collection (Section 4).

## 2. THE RELATIONSHIP BETWEEN VOCABULARY AND (ORAL) NARRATIVE SKILLS IN BILINGUALS

While previous studies reveal strong relationships between lexical and grammatical development in specific domains (e.g., Bland-Stewart & Fitzgerald, 2001; Conboy & Thal, 2006; Kohnert et al., 2010; Marchman et al., 2004), vocabulary and narrative skills have shown more general associations. Results from previous studies of bilingual children, specifically, indicate that their vocabulary knowledge, often measured as a score on a vocabulary test, might have an impact on their narrative skills (e.g., Bitetti & Hammer, 2016; Bohnacker et al., 2020; Fiani et al., 2020; Iluz-Cohen & Walters, 2012; Pearson, 2002; Roch & Hržica, 2020; Uccelli & Pérez, 2007). The effect of vocabulary knowledge seems to be similar for both story comprehension and the production of story structure. For example, a number of studies have found a relationship in both languages between the bilingual child's vocabulary scores and either story comprehension (Bohnacker et al., 2020; Fiani et al., 2020) or production of story structure/narrative macrostructure (Bitetti & Hammer, 2016; Pearson, 2002; Uccelli &

COLLECTION:  
ASPECTS OF  
THE BILINGUAL  
ACQUISITION OF  
LANGUAGE AND  
LITERACY

**EDITORIAL**



**CORRESPONDING AUTHOR:**

**Josefin Lindgren**

Department of Scandinavian languages, Uppsala University, Uppsala, SE

[josefin.lindgren@nordiska.uu.se](mailto:josefin.lindgren@nordiska.uu.se)

**KEYWORDS:**

bilingualism; literacy; vocabulary; narratives

**TO CITE THIS ARTICLE:**

Lindgren, J., Süss, A., & Gagarina, N. (2022). Bilingual Acquisition of Language and Literacy: State of the Art and Beyond. *Journal of Home Language Research*, 5(1): 3, pp. 1–5. DOI: <https://doi.org/10.16993/jhllr.48>

Páez, 2007). In one seminal study of the narrative skills in both languages of 160 Spanish-English bilinguals, Pearson (2002) found significant correlations between the story score (a score that included macrostructure) and scores on standardized vocabulary tests. In a longitudinal study of 24 Spanish-English bilinguals at ages 5–6 and 6–7, Uccelli and Páez (2007) found that expressive vocabulary scores correlated significantly with story structure in both languages. A similar effect was found for receptive vocabulary by Bitetti and Hammer (2016), in another longitudinal study of Spanish-English bilinguals. In a recent study of 48 Lebanese Arabic-French bilinguals aged 5 to 9, Fiani, Henry and Prévost (2020) found correlations between the children’s expressive vocabulary and their story comprehension in both languages.

However, there are also indications that the effect of vocabulary knowledge on narrative skills may differ between bilinguals’ two languages. For example, in a study of 30 children aged 5–7 with L1 (first language) Croatian who acquire Italian as an L2 (second language), Roch and Hržica (2020) found a correlation between story comprehension and receptive vocabulary in Croatian, but not in Italian. Similarly, in studies of 46 German-Swedish bilinguals aged 4 to 6, an effect of expressive vocabulary was found in the home language German, but not in the majority language Swedish, with similar results for both story comprehension (Lindgren & Bohnacker, 2020) and story structure (Lindgren & Bohnacker, 2022). These differences may be due to differences in the profiles of the bilingual groups studied, e.g., that the groups differ in the (relative) proficiency in the two languages and that this influences the relationship between vocabulary knowledge and narrative skills.

### 3. THE RELATIONSHIP BETWEEN VOCABULARY AND LITERACY IN BILINGUALS

As outlined above, the available evidence supports the assumption that vocabulary influences narrative skills. Based on these results, one might assume that vocabulary knowledge also has an impact on other language domains, such as the development of literacy. In this section, we address the relationship between vocabulary and literacy in bilingual language acquisition. Words can be seen as the small building blocks of reading and writing, that is of literacy (Neuman, 2006). Reading is a factor that enhances, and thus widens and deepens vocabulary. This has been shown for monolingual children with limited vocabulary (Hargrave & Sénéchal, 2000), as well as for those within their age-typical range (Donahue et al., 1999; Farrant & Zubrick, 2012; Highberger & Brooks, 1973; Jenkins et al., 1984). A number of studies have investigated the relationship between vocabulary and literacy development in bilinguals (e.g., Hammer & Miccio, 2006; Howard et al., 2014; Limbird et al., 2014; Rhys & Thomas, 2013; Zhang & Koda, 2018), and the first observation regarding the development of vocabulary and literacy is, unsurprisingly, a simple one: they are closely linked. In fact, vocabulary and literacy have been shown to develop in parallel over time, for example in the study by Hammer and Miccio (2006) of bilingual preschoolers from low-income families, where both skills were also found to benefit from the same interventions. Additionally, vocabulary knowledge may even be more important for the development of literacy skills in bilinguals than in monolinguals. In a study of Turkish-German bilinguals and German monolinguals, vocabulary knowledge was found to be more central for bilinguals’ reading comprehension in their majority language (German), compared to monolinguals (Limbird et al., 2014). In a large-scale longitudinal study from kindergarten to Grade 3, Schaars, Segers, and Verhoeven (2019) found that delays in reading comprehension in the majority language Dutch of Dutch-speaking bilinguals (N = 109) was linked to lower vocabulary knowledge in the same language in kindergarten (the home language was not investigated). In another recent study, Zhang and Koda (2018) showed that Chinese vocabulary size predicted Chinese reading comprehension in Chinese-English bilinguals. Howard et al. (2014), in a large-scale study of Spanish-English bilinguals in kindergarten (N = 292), Grade 3 (N = 85) and Grade 5 (N = 70), found that vocabulary in the majority language English significantly influenced reading accuracy and comprehension when socio-economic status and language exposure was controlled for. These results point to the importance of developing vocabulary knowledge in both languages, in order for bilinguals to acquire and develop biliteracy.

In one of the few studies of both languages of bilingual children, Rhys and Thomas (2013) investigated receptive vocabulary and reading accuracy and comprehension of 175 Welsh-English bilingual children aged 7 to 11 growing up in Wales with Welsh as their primary language of schooling. In both languages, they found significant correlations between vocabulary and both reading measures, irrespective of the children's amount of exposure to the languages in the home. However, both vocabulary and reading skills were influenced by the amount of language exposure; children receiving more exposure to a language at home performed better in that language. These results emphasize that supporting both languages is important not only for oral skills, but also for the development of biliteracy.

Finally, a study of monolingual children shows where the research of bilinguals' literacy may be on its way. The results from the longitudinal study by Suggate et al. (2018), who followed 58 English monolinguals for 15 years and investigated the combined interactions of vocabulary, oral narrative skills, early literacy skills, and reading comprehension, suggest the continuing interrelation of various factors, with vocabulary at age 19 months predicting reading comprehension at age 12. The authors also conclude: "Controlling for maternal and infant vocabulary, children's oral narrative skill around school entry related uniquely to reading comprehension 10 years later" (Suggate et al., 2018, p. 82). During the last years, research is moving away from examining simple relationships between two factors, e.g., vocabulary as a predictor of reading, towards the investigation of complex interrelations between background factors and language skills, such as narrative or literacy skills (e.g., Reese et al., 2010) as well as between a number of different language skills. This type of studies investigating bilinguals has not yet been carried out. In sum, the studies described here show that vocabulary is a constant factor linked to bilingual children's reading skills across languages and suggest a reciprocal relationship between vocabulary and literacy; progress in one area benefits the other. However, studies investigating a wider range of language pairs and more complex interrelationships are still needed.

#### 4. CONCLUSION AND OUTLINE OF THE SPECIAL COLLECTION

In this introduction, we have discussed several aspects of the relationships between, on one hand, vocabulary and narrative skills, and, on the other, vocabulary and literacy in bi- and multilingual children. Despite the growing number of papers investigating these topics, much is still unknown about the development of language skills, such as vocabulary and narrative skills, and literacy and how they are influenced by different types of social, cognitive and linguistic factors. Here, the papers in this special collection provide new insights. Additionally, the papers show the breadth of current research into bilinguals' acquisition of language and literacy. The paper by *Bohnacker, Haddad and Öberg* adds to the body of research investigating bilinguals' vocabularies with their study of receptive and expressive vocabulary in both languages of 100 Arabic-Swedish bilinguals aged 4–7, where effects of age, socio-economic status, age of onset, daily exposure and home language use in the family are explored. The paper by *Knopp* contributes to the research on factors influencing bilingual children's narrative skills. Her study investigates the effects of language dominance and typological proximity on narrative skills in 30 Greek-German and Dutch-German bilinguals aged 10–11. The paper by *Usanova and Schoor* reports results from a longitudinal study of scriptural skills in Russian as a home language. In this study, 131 Russian-German bilinguals were followed for two years starting either at age 13 (Grade 7) or age 15 (Grade 9) and their reading and writing skills were analyzed. Finally, the paper by *Krause and Ritter* used eye-tracking to investigate silent and oral text reading in both languages of Russian-German bilinguals aged 9–10 and 15–16. The age groups and reading modes were compared and the bilinguals were also compared to monolinguals.

Vocabulary, narrative skills and literacy are linked to different functions within communication, and, in bilingual children, they impact one another in a number of complex ways. Despite or maybe even because of that complexity, it is through studying both languages of bilingual children that we can better understand these aspects and their relationships, and in the end the fascinating phenomenon that is language. Future research should thus consider investigating the interplay of a wide range of background factors (such as socio-economic status, age, and school background) and language combinations with various language skills, which should not be restricted only to, for example, productive and receptive lexicon, but be expanded to

include language skills in other domains, including different aspects of literacy. Such research would not only help our understanding of the language skills preceding and predicting literacy development, but also have a practical impact in serving as a base for practical resources and guidelines for teachers to support the development of early literacy.

## COMPETING INTERESTS

The authors have no competing interests to declare.

## AUTHOR AFFILIATIONS

**Josefin Lindgren**  [orcid.org/0000-0003-3995-8315](https://orcid.org/0000-0003-3995-8315)  
Department of Scandinavian languages, Uppsala University, Uppsala, SE

**Assunta Süß**  [orcid.org/0000-0002-5136-1071](https://orcid.org/0000-0002-5136-1071)  
Linguistics Department, University of Potsdam, Potsdam, DE

**Natalia Gagarina**  [orcid.org/0000-0002-9797-0278](https://orcid.org/0000-0002-9797-0278)  
Leibniz-Centre General Linguistics, Berlin, DE

## REFERENCES

- Bitetti, D., & Hammer, C. S.** (2016). The home literacy environment and the English narrative development of Spanish-English bilingual children. *Journal of Speech, Language, and Hearing Research*, 59(5), 1159–1171. DOI: [https://doi.org/10.1044/2016\\_JSLHR-L-15-0064](https://doi.org/10.1044/2016_JSLHR-L-15-0064)
- Bland-Stewart, L. M., & Fitzgerald, S. M.** (2001). Use of Brown's 14 grammatical morphemes by bilingual Hispanic preschoolers: A pilot study. *Communication Disorders Quarterly*, 22(4), 171–186. DOI: <https://doi.org/10.1177/152574010102200403>
- Bohnacker, U., Lindgren, J., & Öztekin, B.** (2020). Bilingual Turkish-Swedish children's understanding of MAIN picture sequences: Individual variation, age, language and task effects. In U. Bohnacker & N. Gagarina (Eds.), *Developing narrative comprehension: Multilingual Assessment Instrument for Narratives* (pp. 99–147). John Benjamins. DOI: <https://doi.org/10.1075/sibil.61.04boh>
- Conboy, B. T., & Thal, D. J.** (2006). Ties between the lexicon and grammar: Cross-sectional and longitudinal studies of bilingual toddlers. *Child Development*, 77(3), 712–735. DOI: <https://doi.org/10.1111/j.1467-8624.2006.00899.x>
- Donahue, P. L., Voelkl, K. E., Campbell, J. R., & Mazzeo, J.** (1999). *NAEP 1998 Reading report card for the nations and states*. U.S. Department of Education, Office of Educational Research and Improvement, National Center for Education Statistics.
- Farrant, B. M., & Zubrick, S. R.** (2012). Early vocabulary development: The importance of joint attention and parent-child book reading. *First Language*, 32(3), 343–364. DOI: <https://doi.org/10.1177/0142723711422626>
- Fiani, R., Henry, G., & Prévost, P.** (2020). Narrative comprehension in Lebanese Arabic-French bilingual children. In U. Bohnacker & N. Gagarina (Eds.), *Developing Narrative Comprehension: Multilingual Assessment Instrument for Narratives* (pp. 32–60). John Benjamins. DOI: <https://doi.org/10.1075/sibil.61.02fia>
- Hammer, C. S., & Miccio, A. W.** (2006). Early language and reading development of bilingual preschoolers from low-income families. *Topics in Language Disorders*, 26(4), 322–337. DOI: <https://doi.org/10.1097/00011363-200610000-00005>
- Hargrave, A. C., & Sénéchal, M.** (2000). A book reading intervention with preschool children who have limited vocabularies: The benefits of regular reading and dialogic reading. *Early Childhood Research Quarterly*, 15(1), 75–90. DOI: [https://doi.org/10.1016/S0885-2006\(99\)00038-1](https://doi.org/10.1016/S0885-2006(99)00038-1)
- Highberger, R., & Brooks, H.** (1973). Vocabulary growth of Head Start children participating in a mothers' reading program. *Home Economics Research Journal*, 1(3), 185–187. DOI: <https://doi.org/10.1177/0142723711422626>
- Howard, E. R., Páez, M. M., August, D. L., Barr, C. D., Kenyon, D., & Malabonga, V.** (2014). The importance of SES, home and school language and literacy practices, and oral vocabulary in bilingual children's English reading development. *Bilingual Research Journal*, 37(2), 120–141. DOI: <https://doi.org/10.1080/15235882.2014.934485>
- Iluz-Cohen, P., & Walters, J.** (2012). Telling stories in two languages: Narratives of bilingual preschool children with typical and impaired language. *Bilingualism: Language and Cognition*, 15(1), 58–74. DOI: <https://doi.org/10.1017/S1366728911000538>
- Jenkins, J. R., Stein, M. L., & Wysocki, K.** (1984). Learning vocabulary through reading. *American Educational Research Journal*, 21(4), 767–787. DOI: <https://doi.org/10.3102/00028312021004767>

- Kohnert, K., Kan, P. F., & Conboy, B. T.** (2010). Lexical and grammatical associations in sequential bilingual preschoolers. *Journal of Speech, Language, and Hearing Research*, 53(3), 684–698. DOI: [https://doi.org/10.1044/1092-4388\(2009/08-0126\)](https://doi.org/10.1044/1092-4388(2009/08-0126))
- Limbird, C. K., Maluch, J. T., Rjosk, C., Stanat, P., & Merkens, H.** (2014). Differential growth patterns in emerging reading skills of Turkish-German bilingual and German monolingual primary school students. *Reading and Writing*, 27(5), 945–968. DOI: <https://doi.org/10.1007/s11145-013-9477-9>
- Lindgren, J., & Bohnacker, U.** (2020). Inferential comprehension, age and language: How German-Swedish bilingual preschoolers understand picture-based stories. In U. Bohnacker & N. Gagarina (Eds.), *Developing narrative comprehension: Multilingual assessment instrument for narratives* (pp. 61–98). John Benjamins. DOI: <https://doi.org/10.1075/sibil.61.03lin>
- Lindgren, J., & Bohnacker, U.** (2022). How do age, language, narrative task, language proficiency and exposure affect narrative macrostructure in German-Swedish bilingual children aged 4 to 6? *Linguistic Approaches to Bilingualism*, 12(4), 479–508. DOI: <https://doi.org/10.1075/lab.20020.lin>
- Marchman, V. A., Martinez-Sussmann, C., & Dale, P. S.** (2004). The language-specific nature of grammatical development: Evidence from bilingual language learners. *Developmental Science*, 7(2), 212–224. DOI: <https://doi.org/10.1111/j.1467-7687.2004.00340.x>
- Neuman, S. B.** (2006). Building vocabulary to build literacy skills: How to help children build a rich vocabulary day by day. *Early Childhood Today*, 20(4), 12–14.
- Pearson, B. Z.** (2002). Narrative competence among monolingual and bilingual school children in Miami. In D. K. Oller & R. E. Eilers (Eds.), *Language and literacy in bilingual children* (pp. 135–174). Multilingual Matters. DOI: <https://doi.org/10.21832/9781853595721-008>
- Reese, E., Suggate, S., Long, J., & Schaughency, E.** (2010). Children's oral narrative and reading skills in the first 3 years of reading instruction. *Reading and Writing*, 23(6), 627–644. DOI: <https://doi.org/10.1007/s11145-009-9175-9>
- Rhys, M., & Thomas, E. M.** (2013). Bilingual Welsh-English children's acquisition of vocabulary and reading: Implications for bilingual education. *International Journal of Bilingual Education and Bilingualism*, 16(6), 633–656. DOI: <https://doi.org/10.1080/13670050.2012.706248>
- Roch, M., & Hržica, G.** (2020). Narrative comprehension by Croatian-Italian bilingual children 5–7 years old: The role of receptive vocabulary and sentence comprehension. In U. Bohnacker & N. Gagarina (Eds.), *Developing narrative comprehension: Multilingual assessment instrument for narratives* (pp. 172–196). John Benjamins. DOI: <https://doi.org/10.1075/sibil.61.06roc>
- Schaars, M. M. H., Segers, E., & Verhoeven, L.** (2019). Cognitive and linguistic precursors of early first and second language reading development. *Learning and Individual Differences*, 72, 1–14. DOI: <https://doi.org/10.1016/j.lindif.2019.03.008>
- Suggate, S., Schaughency, E., McAnally, H., & Reese, E.** (2018). From infancy to adolescence: The longitudinal links between vocabulary, early literacy skills, oral narrative, and reading comprehension. *Cognitive Development*, 47, 82–95. DOI: <https://doi.org/10.1016/j.cogdev.2018.04.005>
- Uccelli, P., & Pérez, M. M.** (2007). Narrative and vocabulary development of bilingual children from kindergarten to first grade: Developmental changes and associations among English and Spanish skills. *Language Speech and Hearing Services in Schools*, 38(3), 225–236. DOI: [https://doi.org/10.1044/0161-1461\(2007/024\)](https://doi.org/10.1044/0161-1461(2007/024))
- Zhang, H., & Koda, K.** (2018). Vocabulary knowledge and morphological awareness in Chinese as a heritage language (CHL) reading comprehension ability. *Reading and Writing*, 31(1), 53–74. DOI: <https://doi.org/10.1007/s11145-017-9773-x>

#### TO CITE THIS ARTICLE:

Lindgren, J., Süß, A., & Gagarina, N. (2022). Bilingual Acquisition of Language and Literacy: State of the Art and Beyond. *Journal of Home Language Research*, 5(1): 3, pp. 1–5. DOI: <https://doi.org/10.16993/jhrlr.48>

**Submitted:** 21 April 2022

**Accepted:** 28 July 2022

**Published:** 13 September 2022

#### COPYRIGHT:

© 2022 The Author(s). This is an open-access article distributed under the terms of the Creative Commons Attribution 4.0 International License (CC-BY 4.0), which permits unrestricted use, distribution, and reproduction in any medium, provided the original author and source are credited. See <http://creativecommons.org/licenses/by/4.0/>.

*Journal of Home Language Research* is a peer-reviewed open access journal published by Stockholm University Press.

