



# ENHANCING VOCABULARY AND READING COMPREHENSION THROUGH MORPHOLOGICAL AWARENESS IN EFL LEARNERS

Sipri Hanus Tewarat<sup>1</sup>, Afriana<sup>2</sup>  
Universitas Putera Batam, Kepulauan Riau<sup>1,2</sup>  
[sipri.tewarat@puterabatam.ac.id](mailto:sipri.tewarat@puterabatam.ac.id)<sup>1</sup>

## Keywords

*EFL Learners, Morphological awareness, Reading Comprehension, Vocabulary acquisition*

## Abstract

This qualitative research explores the influence of morphological teaching strategies on the development of students' vocabulary and reading comprehension skills, with a specific focus on the instruction of prefixes and suffixes. The research is particularly relevant to English as a Foreign Language (EFL) learners, especially those in the Indonesian education system, where explicit instruction in morphology is often limited or overlooked. Many EFL students in such contexts struggle with vocabulary acquisition and understanding complex texts due to a lack of awareness about how words are formed and structured. By emphasizing the importance of morphological awareness—defined as the ability to recognize and manipulate morphemes, the smallest units of meaning—the study identifies it as a crucial factor in supporting language acquisition. The research adopts a literature review methodology, analyzing existing scholarly studies, articles, and academic findings to investigate the effectiveness of morphological instruction in the classroom. The evidence suggests that targeted teaching of morphological elements, particularly derivational and inflectional morphemes, enables students to decode unfamiliar vocabulary, enhance grammatical understanding, and improve their overall language proficiency. Furthermore, through morphological awareness, EFL learners' reading skills and vocabulary improve significantly. These strategies not only improve EFL learners' vocabulary but also foster greater confidence in reading. In conclusion, the study recommends incorporating structured, evidence-based morphological instruction into English language teaching practices.

## 1. Introduction

Language is a system that people use in communication. They use language to express their opinion and share their ideas. Other than that, they also use the language to express their feeling and give information to the others. It can be spoken, written, or expressed through other forms like gestures and signs. Language consists of a set of rules (grammar) that govern how words and sentences are formed, and it uses a set of symbols, such as sounds (in spoken language) or written characters (in written language), to represent meaning. It has close relationship with morphology since every utterance that produced by human creates one or two morphemes and it could more (Johan, 2024). It means that language is closely connected to morphology, which is the study of how words are formed using the smallest units of meaning—called morphemes. Every time a person speaks or writes, their utterance (spoken or written word) contains at least one morpheme, and often more. The utterances may range from very simple ones with just one morpheme (e.g., "cat") to more complex ones with several morphemes (e.g., "unbelievably"), showing the close relationship between language and morphology. This connection is important because understanding how morphemes function within

language helps learners and linguists analyze and understand the structure of words and language itself especially in education field.

In general, educational activities must incorporate various strategies to promote engagement in the learning process in order to motivate students in learning process. In this process, the implementation of these kinds of strategies will support learners in enhancing their abilities in four language skills namely listening, speaking, reading, and writing. Reading tasks and tests are the most challenging aspects which can lead to significant difficulties for students in schools. Bulgren and Scanion (1998) outline that students could possibly encounter various challenges and hurdles in typical understanding and that could be the factors contributing to students' lack of interest in learning or reading school textbooks.

Thus, educators have a crucial role in the process of teaching and learning, particularly when it comes to motivating students so that their reading skills abilities can be enhanced. In the hope of motivating students, educators need special instructions. According to Guatello, Beasley, and Sinarta (2000), teacher guidance the learning process can inspire students to participate actively in their education and improve their comprehension of reading materials. Somehow, in the classroom setting the educators tend not to offer much attention to students to enhance their language skills. Furthermore, teachers also stated that students face significant challenges as readers, often leading them to avoid from reading tasks and exhibit feelings of helplessness when confronted with reading materials (Brozo, 1991). Thus, Hall (2005) suggested that teachers should concentrate on content areas pertinent to the issues students face. Teachers can provide systematic and well-structured reading instruction that addresses the specific needs of students during reading activities. If the problem is not resolved correctly, students will face some difficulties to understand the text when they read it. They won't experience they will miss out on the advantages of reading activities and will have restricted vocabulary knowledge, which is essential in students' lives. It serves as a vital aspect of everyday communication, whether spoken or written.

Amiljalili and Jabbari (2018) argued that vocabulary knowledge—understood as the understanding of word meanings—is closely linked to morphological awareness, which plays a vital part in students' reading comprehension. In addition, vocabulary aligns with to reading comprehension, and both factors can aid students in expanding their vocabulary and enhancing their reading abilities (Nation, 2001). Furthermore, Proctor et al. (2005) align with the earlier idea that both vocabulary growth and reading skills influence EFL and ESL learners to get involved in a reading process. To enhance students' understanding of vocabulary and reading, it is essential for them to engage with a crucial element known as morphological awareness (Zhang and Koda, 2012). Students can utilize it during their process of acquiring a second language to directly or indirectly determine their extent in vocabulary knowledge through their ability to interpret lexical items (Zhang & Koda, 2012). Additionally, students' limited mastery of vocabulary may contribute to challenges in reading comprehension (August & Shanahan, 2006).

In reference to the earlier statement, the instructional methods and strategies could assist students in addressing their challenges with reading activity and vocabulary. In addition, there are current studies on morphological studies worldwide. Stowe conducted the first study in 2019. She found out that morphology awareness could be a powerful and beneficial indicator to enhance students' ability in reading comprehension. Moreover, awareness plays a vital role in improving students' vocabulary and enabling them to accurately interpret specific words. The findings suggested that the morphological teaching strategies used in the classroom can help language learners to deduce or infer key words from the text, bridging the gap created by EFL learners' backgrounds through reading. Therefore, a second study on morphological analysis concerning students' vocabularies was carried out by Brandes and McMaster (2017).

Although numerous studies have demonstrated that morphological awareness significantly supports students' development in vocabulary, reading comprehension, spelling, and writing, limited research has focused on identifying which specific morphological teaching strategies are most effective for teaching prefixes and suffixes within reading comprehension tasks—particularly in EFL settings such as Indonesia. Additionally, although it is widely recognized that students often lack motivation or tend to avoid reading activities, there is still little understanding of how morphology-based instruction

might help address these behaviors and enhance students' ability to retain vocabulary. Thus, there are two research questions raised in this study: (1) What are morphological teaching strategies used to improve students' vocabulary knowledge of prefixes and suffixes? And (2) How can morphological instruction help address reading avoidance behaviors such as procrastination and binge-reading among EFL students? In order to answer these questions, the researcher uses literature review methodology where the researcher examines and integrates findings from existing studies focused on a particular topic.

This study contributes to both theoretical and practical aspects of language education. Theoretically, it addresses a gap in EFL research by focusing on how morphological instruction—particularly teaching prefixes and suffixes—can impact vocabulary development and reading comprehension in Indonesian contexts. It also explores the connection between morphological awareness and reading behaviors such as avoidance and lack of motivation, areas that have received limited attention in prior studies. Practically, the research offers useful strategies for teachers to support students' vocabulary growth and reading engagement through targeted morphology-based instruction. It also provides insights for curriculum planners and professional development programs, promoting the integration of morphological awareness into classroom practices to better support EFL learners.

## **2. Literature Review**

### **2.1 Morphology**

Morphology is a study related to the words. Aronoff & Fudeman, (2011) describes morphology as a discipline which examines the systematic connection structure and its significance or meaning. Additionally, Aronoff and Fudeman (2011) also describe morphology as a study on how words are formed, emphasizing their internal structure and formation processes. In addition, morphology is a field of study that examines the relationship between words and their structure (Johan, 2024). Thus, learning about morphology is comparable to learning grammar. Initially, learners must grasp word forms and engage with the language, recognizing that numerous words possess a discernible internal structure influenced by linguistic rules, that enabling the creation of new words through derivation and compounding (Domínguez, 1991). Additionally, morphology examines how words are structured internally and the ways in which new words are created from existing ones through several processes. This process includes the word formation such as affixation, compounding, conversion, truncation, repetition, and other methods of word formation. These processes allow languages to adapt and evolve by generating new vocabulary to meet changing communication needs. It also contributes significantly to the creation of morphemes and words, serving as the foundation for the development of phrases, clauses, sentences, paragraphs, and discourse.

Generally, it also plays a valuable role in the word formation as the basis formation of phrases, clauses, sentences, paragraphs, and discourse (Halid, 2022). Therefore, it can be concluded that morphology focuses on the structure and significance of words, particularly how words are constructed and deconstructed within a language. It is central not only to the structure of individual words but also to the larger structure of language. By understanding how words are created through processes like affixing, compounding, and word conversion, we can see how language evolves and adapts. Morphology provides the building blocks that allow us to form meaningful sentences, paragraphs, and extended discourse. This makes it essential to both understanding and producing language at every level.

Thus, investigating morphology has played a crucial role in helping students achieve success in literacy development. A solid understanding of morphological concepts not only improves knowledge regarding how words are formed and broken down but also enhances language abilities, making communication more effective in both speech and writing. English consists of many rules, making it particularly advantageous for students learning it as a foreign language, as they can find the learning process more manageable (Carlisle, 2010)

The English language includes many exceptions within its own structure. The process of creating English words has specific rules along with exceptions. Thus, a student's understanding of word-formation rules greatly influences their ability to recognize and understand word meanings. As a

result, in teaching morphology, it usually targets the following primary goals: identifying the structure or composition of words, understanding the meanings of particular prefixes and affixes including roots, exploring how the morphemes within a word influence its meaning, grammatical function, or spelling; and creating strategies for applying morphology analysis to infer word meanings (Carlisle, 2010).

Understanding morphology, particularly in English, is essential for students in universities and schools (Domínguez, 1991). Students in high school get limited exposure related to morphology compared to other subjects. The Indonesian education system focuses on a text-genre methodology. It focuses on text mastery and excludes learning material such as morphology. Morphology is only introduced when students are studying text genres, and there is no dedicated time for its examination. Learners who have a solid grasp of morphology are expected to produce outcomes that clarify the meanings of words while also monitoring the analysis and merging various components to form English vocabulary. This is expected to help students enhance their performance in communication, focusing on not only fluency but also accuracy (Badawi, 2019).

While we use dictionary to search the various definition of verb "find" it is unsurprising that there are no distinct entries for word "find", "found", and "found". As a result, it would be beneficial if dictionaries combined entries for easier searching since the terms "find," "finds," and "found" are missing from the entry. It is thought that people do not require this detail. This information deficiency arises since the various English terms are viewed as the identical word, with the word "find" representing the form of the reference. Furthermore, we need to distinguish among the definition of "find" and its factual meaning when we use it in a sentence. This indicates that specific forms like "find," "finding," and "found" are considered as different tenses from lexeme or root "find." The understanding in language will include learners' awareness. It is the awareness of systematic relationships that exist between the word forms and meanings of words. The lexemes "find," "finds," "found," and "finding" demonstrate a connection in both form and meaning. These relationships are systematic, as a comparable pattern applies to thousands of other verbs in English. The branch of linguistics that focuses on such patterns is known as morphology (Booij, 2005).

### 3. Research Method

This study adopts a descriptive qualitative approach through a comprehensive literature review, drawing on a wide range of credible sources—such as journal articles, scholarly publications, books, and research focused on morphological instruction. The selected materials are meticulously analyzed via content analysis to uncover common themes, identify gaps in the literature, and extract valuable insights. The research is grounded in Morphological Awareness Theory, which emphasizes the significance of understanding word components (e.g., roots, prefixes, and suffixes) for vocabulary growth and enhanced reading comprehension. This theoretical lens explains how learners can effectively decode new words, retain vocabulary, and refine their reading and writing skills. By fostering an awareness of morphemes, learners—particularly those studying English as a Foreign Language (EFL)—can better navigate unfamiliar vocabulary and improve textual understanding. Foundational works by Carlisle (2004), who investigated morphological processing in literacy, and Kuo and Anderson (2006), who examined cross-linguistic reading development, provide key theoretical support for this study.

The data will then be examined using content analysis. In this study, the researcher uses As outlined by Nilamsari (2014), there are several approaches to analyze information from related documents. In this research, the writer will follow four steps. First, the researcher will collect information connected to morphological strategies and their role in teaching and learning. After that, the writer will analyze the data to evaluate the strengths and weaknesses of these strategies. Then, the researcher will highlight the significance of morphological awareness for students, particularly in helping second language learners develop English proficiency. Finally, the study will draw conclusions about the ways of students in utilizing morphological strategies and instruction during the learning process to reach their educational objectives.

### 3.1 Technique of Collecting Data

In this study, in order to collect the data, the researcher carried out the research through brief review relevant and appropriate sources such as journals, academic papers, and books. The sources pertain to the subject of the study which the writer intends to examine.

In this research there are specific steps were followed. First, the writer gathered the data related to the application of morphological techniques in teaching the English language. Second, the writer will analyse the data to assess the benefit and limitations of the morphological strategies. After that, the writer will investigate the morphological awareness roles among students and emphasized the importance of such strategies in supporting second language learners in developing English proficiency. Lastly, the writer will make conclusion about the way of students in implementing the morphological strategies and instruction to reach their learning objectives.

## 4. Result and Discussion

Teaching English as a second language presents significant challenges. In Indonesia, educators often face difficulties in helping students understand English vocabulary and structure. To expand students' vocabulary, it is essential for teachers to recognize their students' needs within the classroom setting. Anwar and Rosa (2020) emphasize that teachers play a crucial role in helping students understand the importance of vocabulary development in mastering English. A solid grasp of linguistic components, particularly morphology, is key to this process. Morphology, a branch of linguistics, enables students to break down and interpret words more effectively.

Anwar and Rosa (2020) highlight the importance of teachers creating and applying diverse teaching strategies to strengthen students' morphological awareness, which is essential for understanding how words are formed and how they function in language. By incorporating morphology into language instruction, students can better grasp the structure of words, leading to improved vocabulary and reading comprehension. When students are actively engaged in learning about word formation, it not only deepens their linguistic knowledge but also encourages greater interaction and collaboration between students and teachers. This active participation fosters a supportive classroom environment where learning becomes a shared process.

Supporting this idea, Oz (2014) emphasizes that teachers can guide students through the learning of word structures by explicitly teaching elements such as roots, prefixes, and suffixes, which are key to helping learners decipher the meaning of unfamiliar words and expand their language skills. Kieffer and Lesaux (2012) discovered that students who apply morphological awareness during classroom activities generally develop a richer vocabulary and better reading comprehension. In addition to these benefits, Templeton (2012) notes that such students also typically demonstrate improved writing abilities. Therefore, morphology can serve as an effective instructional approach to help learners build their vocabulary. A well-developed vocabulary allows students to participate more confidently in both spoken and written communication.

Teachers play a key role in helping students become aware of the morphological features of the English language. Once students develop this awareness, educators can guide them in understanding the significance of morphology within the teaching and learning context in the classroom activity. Coutu-Fleury (2015) stated that learning morphology involves grasping certain procedures. Coutu-Fleury outlines three main approaches that students can apply when studying morphology. The first approach is recognizing the lack of direct correlation between English spelling and pronunciation. Then, learners must understand the types of morphemes such as inflectional and derivational morphemes. Finally, they must learn about the phonological rules and processes.

In phonological processes, certain words may contain the same letter combinations but are pronounced differently. These pronunciation differences are not random; in many cases, they are consistent with morphological rules—for example, the verb "present" and the noun "present." In 2004, Casalis, Cole, and Sopo describe morphological awareness as the recognition of being conscious that enables students to form words according to proper linguistic patterns. This awareness involves understanding morphemes, such as suffix and affix in both inflectional and derivational morpheme. A

further explanation of these morphemes—prefixes, derivational suffixes, and inflectional suffixes—is provided below.

### a) Prefixes

Prefix can be defined as a set of letters that can be added to the beginning of a root word in order to form new word. The example of prefix can be seen in the root of a word “unhappy”, the prefix *un-* means “not” and is attached to the root word “*happy*”, forming the word “*unhappy*”, which means “not happy.”

The other examples are:

- *dis + cover = discover*
- *in + correct = incorrect*
- *un + happy = unhappy*

### b) Suffixes (Inflectional)

Suffix can be defined as set of letters that usually added to the end of a root word to create a new form that have new meaning and new word class although some of them doesn’t change in the term of word class. However, inflectional suffixes do not change the fundamental meaning of the word; instead, they usually signal grammatical modifications such as tense, number, or comparison. According to Allerton (2017), there are several types of inflectional morphemes such as:

- **Plural Noun** | -s | Example: They have five **books**
- **Possessive Noun** | -s | Example: That is **Dhani’s** pencil
- **Verb Present Tense (3<sup>rd</sup> Person)** | -s | Example: He **plays** football
- **Verb Past Tense (Regular)** | -ed | Example: She **walked**
- **Verb Past Participle (Regular)** | -ed | Example: She has **decided**
- **Verb Past Participle (Irregular)** | -en | Example: She has **admitted** it
- **Present Participle (Verb)** | -ing | Example: I am **reading**
- **Adjective Comparative** | -er | Example: Her hair is **longer** than my hair
- **Adjective Superlative** | -est | Example: He is the **tallest** student in the class

### c) Derivational Suffixes

Derivational suffixes alter both the meaning and the grammatical category (part of speech) of a word. Although the new word has a different function or meaning, it still retains a connection to the original word's meaning. It's also possible to add multiple suffixes to a single base word to form new words. According to Critten (2014), derivational morphemes can be divided to several types such as:

- **Verb to adjective** | -ing: live (V) to living (Adj) | Example: The **living** cost is higher in Jakarta than in Semarang.
- **Noun to adjective** | -ful: beauty (N) to beautiful (Adj) | Example: The **beautiful** lady is sitting on the table.
- **Noun to adverb-al** | in-: deed(N) to indeed (adv) | Example: The movie was long, but it was **indeed** worth watching
- **Adjective to adverb -able** | -ly: bad (Adj) to badly (Adv) | Example: The team played **badly** in the second half.
- **Verb to Verb** | re-: play (V) to replay (V) | Example: Can you **replay** that part of the song? I love the melody.
- **Adjective to Adjective** | un-: sure (Adj) to unsure (Adj) | Example: She felt **unsure** of her new job

In the early discussion we already talked about the various types of morphemes, which students can better understand through the development of morphological awareness. This kind of awareness allows learners to create new words by modifying both their meanings and grammatical functions. It also helps students recognize common patterns in word formation, such as regular plural

forms like books or bottles, which is crucial for accurate communication in both speaking and writing. Gaining a solid understanding of these word parts and the rules governing pluralization is important, as it helps students avoid frequent mistakes and improves their overall command of English.

Rosa (2013) notes that inflectional forms appear more frequently than derivational ones and tend to follow predictable patterns in meaning. In contrast, derivational forms are often harder to analyze due to their complex meanings and the irregular phonological changes they bring about (Coutu-Fleury, 2015). In order to gain a clearer insight into how morphological awareness contributes to the teaching and learning of the English language, a number of studies have been examined. One of the studies is conducted by Khoshkhoonejad, Khalifelu, and Abdipour in 2016. In the study, they examined the impact of morphological awareness on vocabulary acquisition among Iranian students. They used a proficiency test, a morphological relatedness test, and a morphological structure test. Their findings indicated that incorporating morphological awareness in the classroom significantly supports second language learners in improving their English vocabulary.

Hidayat (2016) conducted a study that explored how educational games can be used as a tool to improve students' vocabulary mastery. The study was conducted with seventh-grade students at a junior high school. It is involved the use of word-based games designed to address gaps in vocabulary proficiency and enhance learners' reading comprehension abilities. The findings revealed that incorporating these games into the learning process was highly effective in helping students retain vocabulary encountered in reading materials. Moreover, the interactive and enjoyable nature of the games increased students' motivation and enthusiasm for learning, making vocabulary acquisition more engaging and memorable.

In addition, Aswandi (2020) explored the use of a different vocabulary-building activity known as the matching game. This study aimed to support teachers in addressing students' difficulties with vocabulary learning. Many students struggle to recognize, understand, and remember similar or unfamiliar words. The use of engaging learning tools was seen as an effective solution. Aswandi implemented the matching game as an alternative instructional method using a classroom action research approach. The results indicated that this game significantly enhanced students' vocabulary mastery.

Incorporating linguistic elements into the teaching and learning process can be highly beneficial. Therefore, it's important to take linguistic theories—particularly those related to morphology—into account when teaching English to school-aged learners. By applying morphological strategies, students can develop foundational understanding and improve their use of English vocabulary. In his study, Oz (2014) emphasizes the importance of morphology, which helps learners to properly understand a language. Morphology is the study of linguistics. It examines the internal composition of words and emphasizes the smallest units of meaning in language, referred to as morphemes. The morphemes can refer to roots (the simplest form of the word), prefixes (morphemes placed before the roof of word), suffixes (morphemes attached at the end of root word), and infixes (morphemes inserted in a middle of another morpheme). The more the learners understand the operation of morphemes together, the better they can make sense of word formation and meaning construction. In addition to the knowledge of word structure enhancing vocabulary development, it also helps with reading comprehension.

## 5. Conclusion

In conclusion, this study aimed to explore morphological teaching methods in relation to reading comprehension, specifically focusing on improving students' awareness of prefixes and suffixes. It discussed practical classroom strategies that educators can apply to strengthen students' morphological knowledge, as well as enhance their phonological skills, vocabulary acquisition, and reading comprehension—particularly for learners facing challenges with language and literacy.

Additionally, the study highlighted the benefits of incorporating morphological concepts into instruction, as supported by existing research, showing its positive impact on vocabulary development and reading understanding. Various findings from previous studies have contributed to the growing understanding of how morphological awareness supports language acquisition. The study also

examined how teachers can use theory-based and strategy-driven approaches to support students who struggle with morphological learning.

The review of literature on morphological instruction and its application in language learning provides a foundation for identifying key issues for future research. While some researchers have proposed guidelines for teaching morphology, this study offers the following recommendations: First, it is essential that researchers adopt clear, evidence-based methodologies for designing, implementing, and reporting studies on morphological instruction. This includes using research designs that allow for causal conclusions, helping to determine which instructional practices are most effective for enhancing vocabulary and reading comprehension. Furthermore, future studies should offer detailed explanations of how the instruction was delivered and how the results were interpreted.

## References

- Allerton, D. J. (2017). *Essential of grammatical theory (a consensus view of syntax and morphology)*. NewYork: Routledge
- Amirjalili, F. & Jabbari, A. A. (2018). The impact of morphological instruction on morphological awareness and reading comprehension of EFL learners. *Teacher Education and Development*, 5, 1-30.
- Audring, J., Masini, F., Audring, J., & Masini, F. (2018). Introduction: Theory and Theories in Morphology. *The Oxford Handbook of Morphological Theory*. January 2025, xxii-16. <https://doi.org/10.1093/oxfordhb/9780199668984.013.1>
- August, D. & Shanahan, T. (2006). *Developing literacy in second-language learners: Report of the national literacy panel on language-minority children and youth*. New Jersey: Lawrence Erlbaum Associates
- Badawi, M. F. A. (2019). The Effect of Explicit English Morphology Instruction on EFL Secondary School Students' Morphological Awareness and Reading Comprehension. *English Language Teaching*, 12(4), 166. <https://doi.org/10.5539/elt.v12n4p166>
- Booij, G. (2005). *The Grammar of Words: An Introduction to Linguistic Morphology*. In *The Grammar of Words: An Introduction to Linguistic Morphology* (1st ed.). Oxford University Press Inc. <https://doi.org/10.1093/acprof:oso/9780199226245.001.0001>
- Brandes, D. R. & McMaster, K. L. (2017). A Review of Morphological Analysis Strategies on Vocabulary Outcomes with ELLs. *Insight into Learning Disabilities*, 14 (1), 53-72.
- Brozo, W. (1991). Hiding out in content classrooms: Coping strategies of unsuccessful readers. *Journal of Reading*, 33, 324-328.
- Bulgren, J., & Scanlon, D. (1998). Instructional routines and learning strategies that promote understanding of content area concepts. *Journal of Adolescent & Adult Literacy*, 41(4), 292-302.
- Carlisle, J. F. (2004). Morphological processes that influence learning to read. In C.A. Stone, E. R. Silliman, B. J. Ehren, & K. Apel (Eds.), *Handbook of language and literacy*. NY: Guilford Press.
- Carlisle, J. F. (2010). Effects of Instruction in Morphological Awareness on Literacy Achievement: An Integrative Review. *Reading Research Quarterly*, 45(4), 464-487. <https://doi.org/10.1598/rrq.45.4.5>
- Coutu-Fleury, C. (2015). The effects of morphological awareness training on the reading and spelling performance of young dyslexics. *Langues et Linguistique*, 35, 72-79.
- Critten, S. (2014). Inflectional and derivational morphological. Spelling abilities of children with Specific Language Impairment. Vol 5. 1-10. <https://doi.org/10.3389/fpsyg.2014.00948>
- Crosson, A. C., McKeown, M. G., Moore, D. W. & Ye, F. (2018). Extending the bounds of morphology instruction: Teaching Latin roots facilitates academic word learning for English learner adolescents. *Reading and Writing*, 1-39.
- Domínguez, J. A. (1991). The Role of Morphology in the Process of Language Acquisition and Learning. *Revista Alicantina de Estudios Ingleses*, 4, 37-47.



- Griva, E., & Anastasiou, D. (2009). Morphological strategies training: The effectiveness and feasibility of morphological strategies training for students of English as a foreign language with and without spelling difficulties. *Journal of Writing Research*, 1(3), 199-223.
- Guastello, F., Beasley, M. & Sinatra, R. (2000). Concept mapping effects on science content comprehension of low-achieving inner-city seventh graders. *Remedial and Special Education*, 21, 356-365.
- Halid, E. (2022). Analisis kesalahan bahasa dalam bidang morfologi pada surat kabar kompas.com edisi november-desember 2021. *Jurnal Ide Bahasa*, 4(1), 39-52. <https://doi.org/10.37296/idebahasa.v4i1.81>
- Hall, L. (2005). Teachers and content area reading: Attitudes, beliefs, and change. *Teaching and Teacher Education*, 21, 403-414.
- Hall, L. A. (2006). Anything but lazy: New understandings about struggling readers, teaching, and text. *Reading Research Quarterly*, 41 (4), 1-4.
- Hammarström, H., & Borin, L. (2011). Unsupervised learning of morphology. *Computational Linguistics*, 37(2), 309-350.
- Hidayat, N. (2016). Improving students' vocabulary achievement through word game. *Journal of Educators Society*, 1(2), 95-104.
- Johan, M. (2024). Peleapan morfem pada tuturan minang kabau: Suatu kajian morfologi. *eScience Humanity Journal*. 5 (1) 145-152. <https://doi.org/10.37296/esci.v5i1.183>
- Kieffer, M. J., & Lesaux, N. K. (2012). Development of morphological awareness and vocabulary knowledge in Spanish-speaking language minority learners: A parallel process latent growth curve model. *Applied Psycholinguistics*, 33, 23- 54.
- Khoshkhoonejad, A., Khalifelu, S. F., & Abdipour, S. (2016). Exploring the Effect of Morphological Instruction on Vocabulary Learning among Iranian EFL Learners. *Journal of Education and Learning*. 10(2), 151-158.
- Kuo, L. and Anderson, R.C. (2006) Morphological Awareness and Learning to Read: A Cross-Language Perspective. *Educational Psychologist*, 41, 161-180. [https://doi.org/10.1207/s15326985ep4103\\_3](https://doi.org/10.1207/s15326985ep4103_3)
- Levesque, K. C., Kieffer, M. J. & Deacon, S. H. (2018). Inferring meaning from meaningful parts: The contributions of morphological skills to the development of children's reading comprehension. *Reading Research Quarterly*.
- Manyak, P. C., Baumann, J. F., & Manyak, A. M. (2018). Morphological Analysis Instruction in the Elementary Grades: Which Morphemes to Teach and How to Teach Them. *Reading Teacher*, 72(3), 289-300. <https://doi.org/10.1002/trtr.1713>
- Nagy, W. E., Beminger, V., Abbott, R. & Vaughan, K. (2003). Relationship of morphology and other language skills to literacy skills in at-risk second-grade readers and at-risk fourth-grade writers. *Journal of Educational Psychology*, 95(4), 730-742.
- National Assessment of Educational Progress. (2004). Long Trend Assessment Results in Reading. Retrieved February 6, 2006, from <http://nces.ed.gov/nationsreportcard/ltr>
- Nilamsari, N. (2014). Memahami studi dokumen dalam penelitian kualitatif. *Wacana*, XIII(2), 177-81. Oz, H. (2014). Morphology and implications for English language teaching. In A. Saricoban (Ed.), *Linguistics for English language teaching studies* (pp. 83-120). Ankara: Ani Publishing.
- Proctor, C. P., Carlo, M., August, D. & Snow, C. E. (2005). Native Spanish-speaking children reading in English: Toward a model of comprehension. *Journal of Educational Psychology*, 97, 246-256.
- Rosa, R. N. (2013). Introduction to linguistics. Padang: Sukabina Press. Sarfras, S., Tariq, U. & Abbas, A. (2018). Effectiveness of Morphological Awareness in English Writing Composition of Pakistani Students at the Undergraduate Level Case Study. *Journal of Education and Practices*, 9(19), 78-84.
- Templeton, S. (2012). Teaching and learning morphology: A reflection on generative vocabulary instruction. *Journal of Education*, 192(2/3), 101-107

- Yurtbaşı, M. (2015). Building English vocabulary through roots, prefixes, and suffixes. *Global Journal of Foreign Language Teaching*. *Global Journal of Foreign Language Teaching*, 05(1), 44-51.  
[www.awer-center.org/gjflt/](http://www.awer-center.org/gjflt/)
- Zhang, D. & Koda, K. (2012). Contribution of morphological awareness and lexical inferencing ability to L2 vocabulary knowledge and reading comprehension among advanced EFL learners: Testing direct and indirect effects. *Reading and Writing*, 25(5), 1195– 1216.