

COGNITIVE LINGUISTICS APPROACH AND ITS IMPLICATION FOR LANGUAGE TEACHING

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ABSTRACT

The importance of understanding the relationship between language and cognition in language teaching has become a significant challenge, particularly in developing a more relevant and effective approach for students. This study aims to analyze the application of cognitive linguistics in language learning. The approach used is qualitative with a literature review method to explore cognitive linguistic theories and their application in language teaching. The main data sources come from academic articles, books, and scientific journals published in leading international databases. Through a systematic literature review, this study identifies how cognitive linguistic theories, such as cognitive grammar, conceptual metaphors, and mental schemas, are applied in the language teaching process. The findings show that cognitive linguistics can enrich language teaching by linking language concepts with cognitive processes and students' real-world experiences. Additionally, this study reveals the challenges in integrating cognitive linguistics theories into existing language education curriculum. The drawn conclusion indicates that the application of cognitive linguistics can enhance students' language comprehension and skills, although its implementation requires deeper adjustments in teaching practices.

Keywords: *Cognitive grammar; cognitive linguistics; conceptual metaphors; language education; language learning*

Cognitive linguistics is a branch of linguistics that has developed rapidly in recent decades. This approach views language not merely as an isolated system of rules or structures, but as a social phenomenon closely connected to human experience and cognitive processes (Dohman, 2022). In cognitive linguistics, language is considered a reflection of how humans understand and interact with the world around them. This approach emphasizes the role of cognition in language processing, which influences how individuals understand meaning and concepts through language (Alduais et al., 2022). Thus, the importance of applying cognitive linguistic principles in language learning becomes increasingly clear, as the concepts learned not only focus on the structural aspects of language but also involve aspects of understanding, thinking, and contextualizing meaning that can improve learners' language skills. For example, the application of miming and body language in English teaching is one aspect discussed by Najimova & Kartbaeva (2020) in their study on the contribution of cognitive linguistics to the language learning process.

In addition, cognitive linguistics focuses on the role of language in the process of conceptualizing and categorizing the world. In many recent studies, as discussed by Robbins (2018), the relationship between language and human consciousness encompasses not only linguistic rules but also the ways in which language categorizes and conceptualizes human life experiences through cognitive concepts such as metaphor, categorization, and the formation of more complex concepts. In this case, language and cognition cannot be separated because both influence each other in the process of learning and understanding language.

The main problem faced in this study is how to integrate cognitive linguistic theories into effective language learning practices. Although many studies have demonstrated the successful application of this approach, the biggest challenge lies in adapting these theories to existing learning curricula. For example, there is a need to explore how understanding metaphors and other cognitive concepts can be translated into concrete teaching techniques that are acceptable to a wide range of students from diverse cultural and educational backgrounds (Chibaya, 2019). This is often a challenge, given the differences in how people conceptualize the world based on their respective languages and cultures.

One solution proposed by experts is the use of a multidisciplinary approach to language learning, which combines cognitive understanding and the social functions of language. As explained by Zhou (2018), a cognitive linguistic approach to Mandarin Chinese teaching offers valuable insights into how usage-based language can help students understand the meaning and structure of language through real-life experiences in specific cultural contexts. This suggests that the application of cognitive linguistic principles should not only focus on theoretical aspects but also be adapted to the social and cultural conditions of learners, making this approach more applicable in everyday learning.

In addition, a cognitive linguistics approach involving basic theories such as Cognitive Grammar, as discussed by Langacker (2013), can provide a deeper understanding of how students can understand the differences between language and the ways of thinking that underlie its use. The relationship between cognitive linguistics and psychology and other cognitive sciences also provides important insights in designing more effective and holistic language learning. Langacker (2013) emphasizes the importance of the interaction between language theory and its application in real life, which should be at the core of cognitive linguistics-based language learning.

This study aims to delve deeper into the role of cognitive linguistics in language learning, focusing on its underlying theories and their applications in diverse language education contexts. The primary objective of this study is to analyze how the principles of cognitive linguistics can be integrated into language teaching and to explore the challenges inherent in its implementation. Based on the literature analysis conducted, this study is expected to significantly contribute to the understanding of the relationship between cognition and language, and how it can be used to design more effective language teaching methods. Finally, the scope of this study focuses on analyzing the literature examining cognitive linguistic theories and their applications in language learning, with the aim of filling the existing research gap in this field.

1. Definition and Epistemological Basis of Cognitive Linguistics

Cognitive linguistics conceptualizes language as an integral component of human cognition, grounded in general cognitive abilities such as perception, categorization, memory, and reasoning. Rather than treating language as an autonomous formal system, this approach assumes that linguistic structure emerges from recurrent patterns of embodied experience and conceptual organization (Urunbaevna, 2023). Meaning, therefore, is not inherent in linguistic forms alone but arises from the interaction between language and speakers' experiential knowledge.

From this perspective, language functions as a symbolic system that both reflects and constrains how humans conceptualize reality. Cognitive linguistics rejects the strict separation between semantics and cognition by positing that linguistic meaning is inseparable from conceptual structure. As Turakhonova, (2022) and Muskat (2023) argues, linguistic expressions encode ways of categorizing experience rather than merely labeling external objects. Consequently, linguistic analysis must account for how speakers construe events, entities, and relations based on subjective experience.

Importantly, cognitive linguistics is grounded in usage-based and experience-driven assumptions. Language knowledge is shaped through repeated exposure and interaction in specific sociocultural contexts, linking linguistic competence to broader cognitive and social processes. This view has significant implications for applied linguistics, particularly in language teaching, where learners' prior knowledge, cultural background, and embodied experiences play a crucial role in meaning construction (Wei, 2023).

2. Core Theoretical Frameworks in Cognitive Linguistics

Building on these foundational assumptions, cognitive linguistics has developed several influential theoretical frameworks that explain how meaning is constructed and represented in the mind. Among the most prominent are conceptual metaphor theory, cognitive grammar, and conceptual blending theory, each addressing different dimensions of language–cognition interaction.

Conceptual metaphor theory, introduced by Lakoff and Johnson (1980), demonstrates that abstract concepts are systematically structured through more concrete experiential domains. Metaphors such as *time is money* reveal underlying cognitive mappings that shape not only linguistic expressions but also habitual patterns of reasoning. These mappings are culturally mediated and cognitively entrenched, making metaphor a central mechanism in both everyday language use and conceptual learning. In pedagogical contexts, metaphor-based instruction has been shown to facilitate learners' comprehension of abstract meanings by anchoring them in embodied experience (Feng, 2023).

Cognitive grammar, as proposed by Langacker (2013), offers a usage-based model in which grammatical structures are viewed as symbolic pairings of form and meaning. Grammar is not treated as an autonomous syntactic module but as an inventory of conventionalized patterns that reflect how speakers construe situations. This framework highlights the role of categorization, schematicity, and perspective in grammatical organization, thereby explaining variation and flexibility in language use as cognitively motivated rather than rule-exception driven.

Complementing these approaches, conceptual blending theory Fauconnier & Turner (2011) accounts for meaning construction that cannot be explained by direct metaphorical mapping alone. Through the integration of multiple mental spaces, blending enables the emergence of novel meanings, particularly in figurative language, creative discourse, and complex reasoning. Empirical studies have demonstrated the relevance of conceptual blending not only in qualitative semantic analysis but also in quantitative investigations of discourse patterns and language learning processes (Weinert, 2022).

Rather than functioning as isolated models, these theoretical frameworks collectively illustrate how language operates as a dynamic cognitive system. Conceptual metaphor explains systematic patterns of abstraction, cognitive grammar accounts for structural organization, and conceptual blending captures creative meaning emergence. Together, they provide a coherent analytical foundation for examining language as a cognitively grounded and experience-based phenomenon.

3. Cognitive Linguistics in Language Learning

Cognitive linguistics provides a new perspective on language learning by emphasizing that language comprehension involves not only grammatical aspects but also cognitive processes and life experiences. In this approach, language is understood as more than just a set of grammatical rules and vocabulary; it is studied in relation to how we process information and conceptualize the world through language itself (Moreno Mojica, 2016). Thus, cognitive linguistics-based language comprehension introduces a more holistic approach, emphasizing the importance of personal experience in language teaching. Language is not simply seen as a static structure, but as a reflection of the experiences and knowledge possessed by individuals. This leads to teaching methods that focus not only on mastering formal rules but also on understanding how language works in everyday life, how meaning is formed, and how concepts are processed by the mind (Motov, 2022).

In the cognitive linguistics approach, understanding how the human brain processes language is an essential foundation for language teaching. Language learning based on cognitive theory is not only viewed in terms of mastery of grammar rules and vocabulary, but also examines how language connects to students' cognition and everyday experiences. As explained by Mondal (2020), recent studies show that language and cognition are closely interconnected, and understanding this relationship is crucial for designing more effective language teaching methods. This concept suggests that language comprehension is not solely based on memorizing structures, but also on understanding how language is used in real-world contexts, involving the processing of information and deeper concepts. Therefore, language learning should accommodate broader cognitive aspects to help students understand and use language more effectively.

One effective way to connect abstract concepts in language to students' concrete experiences is through the use of metaphors. Metaphors provide a clear and understandable way to introduce more complex ideas, as they allow students to connect abstract concepts to their everyday experiences (Villani et al., 2022). In the context of language teaching, the use of metaphors can help students understand the meaning and use of language in a deeper and more accessible context. Miao (2023) emphasizes the importance of using metaphors in teaching language and its meaning, as metaphors can illustrate a deeper connection between language and students' cognitive experiences. For example, the metaphor "time is money" not only illustrates how we think about time but also connects the concept of time to the concept of economic value, which is more easily understood by students. This use of metaphors makes teaching more relevant and allows students to see the connection between language and their life experiences.

However, although cognitive linguistics has made significant contributions to language teaching, its application faces several challenges. One major challenge is adapting existing educational curricula to accommodate the principles of cognitive linguistics. Implementing cognitive linguistics in curricula requires a deeper understanding of students' cognitive processes and how social and cultural contexts influence how students understand and use language. As explained by Wirag et al. (2022), although cognitive linguistics offers significant insights, its application in language teaching still faces obstacles in integrating cognitive theory with everyday teaching practices. Teachers need more intensive training to implement this approach effectively in the learning process.

Furthermore, in the context of multilingual learning, the application of cognitive linguistics faces limitations due to the differences in cognitive modes employed in different languages. Multilingual teaching requires a deeper understanding of how cultural and linguistic differences can influence how students understand and conceptualize meaning in the languages they learn. As

shown by Baranova et al., (2021), cultural and linguistic differences can influence how students understand the meaning contained in the languages they learn, which requires further adaptation in the application of cognitive linguistics. Different cognitive understandings in different languages require language teaching to be tailored to each language and cultural context, so that students can develop better language skills by taking these cognitive differences into account.

METHOD

1. Research Design and Approach

This study employs a qualitative research design grounded in a systematic literature review (SLR) to comprehensively examine how cognitive linguistics theories have been conceptualized and applied in the domain of language learning and teaching. A qualitative approach was chosen because the primary objective of this research is not to measure variables statistically, but to interpret, synthesize, and critically evaluate theoretical orientations, conceptual frameworks, and pedagogical applications of cognitive linguistics as discussed in prior scholarly works. The systematic literature review method was adopted to ensure that the process of identifying, selecting, and analyzing relevant studies was conducted in a structured, transparent, and replicable manner, distinguishing this study from a traditional narrative literature review (Fink, 2019). Through this approach, the study aims to map dominant theoretical trends, methodological patterns, and research gaps related to cognitive linguistics-based language learning.

2. Data Sources and Search Strategy

The primary data of this study consist of scholarly publications, including peer-reviewed journal articles and academic books, that address the intersection between cognitive linguistics and language learning. The literature was retrieved from reputable international academic databases, namely Scopus, Web of Science, DOAJ, and Google Scholar, which were selected due to their broad coverage and credibility in disseminating research in linguistics, cognitive science, and language education. The search process was conducted systematically using a combination of carefully selected keywords, such as “*cognitive linguistics*,” “*language learning*,” “*language teaching*,” “*cognitive grammar*,” and “*usage-based models*”. Boolean operators (AND/OR) were applied to refine the search results and to ensure that retrieved studies explicitly addressed both cognitive linguistic theory and educational practice. This multi-database strategy was employed to minimize publication bias and to maximize the comprehensiveness of the reviewed literature.

3. Inclusion Criteria and Literature Screening

To ensure both relevance and academic rigor, the literature selection followed explicit inclusion and exclusion criteria. The review focused on studies published between 2014 and 2024, reflecting contemporary theoretical developments and pedagogical discussions in cognitive linguistics. Only publications written in English and published in peer-reviewed academic outlets were included. Eligible studies were required to explicitly engage with core concepts of cognitive linguistics—such as cognitive grammar, conceptual metaphor, image schemas, embodiment, or usage-based approaches—and to demonstrate clear relevance to language learning or language teaching contexts. Studies were excluded if they addressed cognitive linguistics solely at a theoretical level without educational implications, focused primarily on neurolinguistics or experimental psycholinguistics without pedagogical relevance, or appeared in non-scholarly formats.

The screening process was conducted in several stages. An initial database search yielded approximately 120 publications. After removing duplicates and screening titles and abstracts for thematic relevance, 68 studies remained. These studies were then subjected to a full-text review based on the established criteria, resulting in a final corpus of 42 articles deemed suitable for in-

depth qualitative analysis. This multi-stage screening process ensured that the selected literature was both theoretically relevant and methodologically sound.

4. Data Analysis Procedures

The selected studies were analyzed using qualitative content analysis, which enabled a systematic examination of patterns, themes, and conceptual relationships across the literature. Each article was read closely and coded according to several analytical dimensions, including: (1) the cognitive linguistic theories employed, (2) the research context and educational setting, (3) methodological approaches used, and (4) pedagogical implications for language learning. Through iterative coding and constant comparison, recurring themes and dominant theoretical orientations were identified. The findings from individual studies were then synthesized to reveal broader trends in how cognitive linguistics informs language teaching practices, as well as areas where empirical evidence remains limited or theoretically underdeveloped. This analytical process allowed the study to move beyond mere description and toward interpretive synthesis, which is central to qualitative systematic reviews.

5. Trustworthiness and Research Rigor

To enhance the credibility, dependability, and transparency of the review, several strategies were employed. First, the exclusive use of peer-reviewed and indexed sources ensured the academic quality of the analyzed literature. Second, source triangulation across multiple databases strengthened the robustness of the findings and reduced the risk of database-specific bias. Third, all stages of the review process—including search strategies, screening criteria, and analytical procedures—were carefully documented to ensure methodological accountability and replicability. By adhering to systematic review principles and qualitative research standards, this study aims to provide a reliable and theoretically grounded synthesis of existing research on the role of cognitive linguistics in language learning.

FINDINGS AND DISCUSSION

1. The Concept of Cognitive Linguistic Philosophy

1.1 Understanding Cognitive Linguistics

A. Basic Definition

Cognitive linguistics is a field of study that views language as an integral part of human cognition, namely the entire mental process that includes perception, memory, reasoning, and understanding. Unlike formal linguistic approaches (such as generativism), cognitive linguistics rejects the view that language is an autonomous module separate from other cognitive functions (Lakoff & Johnson, 1980).

Lakoff & Johnson (1980), pioneers in this field, emphasized that language cannot be fully understood without relating it to the other mental processes that operate behind it. Language is not simply a system of rules or symbols, but rather a reflection of how humans understand, organize, and interpret the world around them. In other words, the study of language cannot be separated from the study of the human mind.

B. Language as a Cognitive Phenomenon

In cognitive linguistics, language is viewed as *a cognitive phenomenon* inherent in the entire mental system. This means that all forms of linguistic activity (e.g., forming sentences, understanding speech, generating meaning) involve mental mechanisms such as perception, memory, categorization, and reasoning (Evans & Green, 2018).

Furthermore, meaning is a primary focus in cognitive linguistics. More than just sounds or structures, language is studied as a system of meaning dynamically constructed through experience, perception, and social interaction. Research on conceptual metaphor by Lakoff &

Johnson (1980) shows how metaphor is not merely a stylistic device, but a fundamental part of how humans think and understand abstract concepts through concrete experience.

C. Integration with Cognitive Studies

The cognitive linguistics view integrates the study of language with other branches of cognition, such as cognitive psychology, neuroscience, and the philosophy of mind (Langacker, 2013). The study of *mental representations*, *schemas*, and *models of the world* in the human brain is crucial for understanding how language works in everyday life.

D. Case Example

For example, our understanding of the concept of time is often metaphorized with space: "We will pass this exam," "Time flies." Studies like this demonstrate that the way humans use language is heavily dependent on more fundamental cognitive structures and processes.

1.2 Basic Assumptions in Cognitive Linguistics

Cognitive linguistics is based on several basic assumptions that distinguish it sharply from the traditional linguistic paradigm. Here is a detailed description of these assumptions:

A. Cognitive Structure of Language

a. Language Reflects Cognitive Structure

Cognitive linguistics assumes that language structure reflects human cognitive structure (Langacker, 2013). This cognitive structure encompasses how humans understand the world, categorize experiences, and construct meaning. Every linguistic phenomenon—from phonology to pragmatics—reflects how the mind works to understand reality.

b. Non-autonomous language

In contrast to modularity theory (Fodor, 1983), cognitive linguistics rejects the notion that language is an autonomous module separate from general cognition. Language is considered fully integrated into the human cognitive system.

B. Meaning as a Dynamic Construction

a. Meaning is not an inherent entity

Meaning in cognitive linguistics is not inherent to a particular word or language form, but rather is constructed through experience and interaction (Evans & Green, 2018). Thus, meaning is contextual and dynamic.

b. The Role of Experience in the Formation of Meaning

Meaning arises from the concrete and abstract experiences an individual has. For example, the meaning of the word "home" can vary depending on personal, cultural, and social experiences.

c. Gradient Grammaticality

In cognitive linguistics, the phenomenon of grammaticality is understood as a spectrum, not a binary category. Expressions considered "ungrammatical" in formal theory may be acceptable and understandable in certain contexts (Langacker, 2013).

d. Embodiment and Grounding

Another important assumption is *embodiment*, which is the idea that human cognition, including language, is based on bodily experiences and sensorimotor interactions (Johnson, 2013). Studies show that the meaning of language is strongly influenced by physical perception, movement, and emotion.

e. Prototype Category

According to (Rosch, 1975), humans group concepts based on *prototypes*, not rigid boundaries. For example, the most prototypical category of "bird" is represented by "robin," not "penguin" or "ostrich." This phenomenon influences the way language groups and differentiates entities in the world.

f. Concept of Metaphor and Metonymy

- **Conceptual Metaphor**

In cognitive linguistics, *metaphor* is understood as a conceptual mechanism, not simply a figure of speech. For example, "ARGUMENT IS WAR" shows how one conceptual domain is understood through another (Lakoff & Johnson, 1980).

- **Metonymy**

Metonymy is the use of one entity to refer to another related entity. For example, "The crown" for "the monarchy." Metonymy is a very common cognitive process in everyday language.

g. Blending and Other Cognitive Constructs

The concept of *blending* developed by Fauconnier & Turner (2011), highlights how humans combine several conceptual models into new, innovative meanings.

1.3 Key Figures and Central Ideas

The development of cognitive linguistics has been heavily influenced by the thinking of key figures. Here's a detailed explanation of these pioneers and their central ideas:

A. George Lakoff

George Lakoff is a central figure in cognitive linguistics, particularly with his idea of *conceptual metaphor*. Together with Mark Johnson, Lakoff argued that metaphor is not merely a rhetorical ornament, but a fundamental mechanism in human thought (Lakoff & Johnson, 1980). Through their studies, they demonstrated that humans understand abstract concepts through physical experience—for example, talking about *time* using *spatial metaphors*.

B. Ronald Langacker

Ronald Langacker is a pioneer of *Cognitive Grammar theory*. He states that grammar is part of human cognitive abilities and cannot be separated from meaning (Langacker, 2013). His theory emphasizes the importance of mental representations and cognitive schemas in understanding grammatical structures.

C. Leonard Talmy

Leonard Talmy researches *motion events* in language. He shows how language specifically describes movement, its source, destination, and trajectory. His research provides insights into how humans process spatial and motion events in their minds.

D. Eleanor Rosch

Eleanor Rosch is known for *her prototype theory* of categorization. She demonstrated that concepts and categories in the human mind are not always rigidly defined but are instead prototypically structured (Rosch, 1975). This finding refutes the view that linguistic and cognitive categories are always arbitrary.

E. Mark Johnson

Mark Johnson contributed through his study of *embodiment*—that is, how bodily experiences form the basis of cognition and language (Johnson, 2013). His research shows that the meaning and comprehension of language are heavily influenced by sensorimotor and emotional experiences.

F. Gilles Fauconnier & Mark Turner

Fauconnier and Turner developed the theory of *Conceptual Blending*, explaining how the human brain is able to combine concepts from different domains to form new meanings (Fauconnier & Turner, 2011). This theory is widely used in the analysis of complex metaphors, humor, and linguistic innovation.

1.4 Underlying Philosophy of Science

Cognitive linguistics is not only based on linguistic assumptions and theories, but is also built on a strong and progressive foundation of philosophy of science. Here are some of the key philosophies that underpin this approach:

A. Anti-Modularity

The cognitive linguistics paradigm rejects the concept of modularity (that language is a separate module in the brain). Instead, language is seen as closely integrated with other cognitive systems, such as perception, memory, and reasoning (Lakoff & Johnson, 1980).

B. Empiricism

Cognitive linguistics places a strong emphasis on empirical approaches. Linguistic knowledge must be based on experience, observation, and real-world data, both spoken and written (Evans & Green, 2018). Field research, language corpora, and psychological experiments are the primary methods for building valid theories.

C. Naturalism

The naturalist approach means that the explanation of language phenomena is carried out within an objective scientific framework, without involving metaphysical or supernatural assumptions (Langacker, 2013). Language is understood as a biological and psychological phenomenon that can be explained through testable scientific theories.

D. Holism

Holism is the principle that language is an interconnected system—changes in one part will affect other parts. Therefore, linguistic analysis must consider the relationships between aspects (e.g., phonology, morphology, syntax, semantics) as a whole.

E. Constructivism

Constructivism emphasizes that the meaning of language is not determined passively, but rather is actively constructed by individuals through interaction, experience, and context (Johnson, 2013). This is in line with findings in cognitive psychology that show that humans actively construct reality and meaning.

Cognitive linguistics presents a new paradigm in the study of language, placing language as an integral part of human cognition. This field is based on the assumption that language reflects and is shaped by experience, cognitive structures, and social interactions. Figures such as Lakoff, Langacker, Rosch, Johnson, Fauconnier, and Turner have contributed significantly to formulating and developing the main theories that now form the foundation of cognitive linguistics.

From a philosophical perspective, cognitive linguistics espouses the principles of anti-modularity, empiricism, naturalism, holism, and constructivism. As such, the field continues to develop dynamically, adapting to new discoveries in psychology, neuroscience, and other interdisciplinary studies.

2. Conceptual Framework of Cognitive Linguistics

2.1 Conceptual Representation Model in Language

A. Definition of Conceptual Representation

Conceptual representations are mental structures of knowledge that individuals use to understand and produce language (Evans & Green, 2018). These representations serve as intermediaries between real-world experiences, mental processes, and linguistic expression. When a person speaks or understands an utterance, they are actually activating a series of concepts and mental relationships already organized in their mind.

B. Key Elements in Conceptual Representation

There are several central elements in the conceptual representation model that have a great influence on the development of cognitive linguistics, including:

a. Categories and Prototypes

- Categories are the mental process of grouping entities based on similarities or certain characteristics (Rosch, 1975). Humans naturally categorize the world to facilitate perception and interaction.
- A prototype is the best or most representative example of a category. For example, a "canary" or a "pigeon" is more often considered a prototype of a "bird" than a "penguin" or an "ostrich" (Lakoff & Johnson, 1980). The prototype model shows that categories do not always have rigid boundaries.

b. Schema and Frame

- A schema is a mental structure that represents the relationships between concepts in a particular context (Kronenfeld et al., 1978). Schemas act as a framework that helps individuals understand new situations or events, by referring to previous experiences.
- Frames, as developed by Fillmore (1982), are data structures that describe stereotypical situations in life, for example "restaurant", "travel", "football match". Frames provide context for understanding the meaning of words and phrases in language.

c. Conceptual Metaphor

Conceptual metaphors are cross-domain mappings from one area of experience to another (Lakoff & Johnson, 1980). Metaphors such as "*time is money*" signify time as an entity that can be "wasted," "saved," or "spent," just like money.

d. Variation of Conceptual Representation in Language

Collier et al.'s (1973) study of color names in different languages showed that the way cultures group colors can differ greatly from one another. This suggests that conceptual representations are not universal, but are influenced by culture, experience, and environment.

C. Concrete Examples of Conceptual Representation Models

a. Time metaphor

In the metaphor of "time is money", Western society understands time as something of economic value and limited, whereas in many traditional cultures, time is seen as more cyclical and inseparable from nature.

b. Color category

In Russian, light blue ("goluboy") and dark blue ("siniy") are considered two different color categories, while in English it is just "blue" (Winawer et al., 2007).

c. Restaurant frame

When hearing the sentence "He ate at the restaurant last night", the reader automatically activates the "frame" about the restaurant: there is a waiter, a menu, ordering food, paying, etc.

2.2 The Relationship between Language, Thought, and the Real World

A. Language and Thought: The Conceptualization Process

Cognitive linguistics assumes that language and thought are inseparable (Evans & Green, 2018). Language is one expression of conceptualization, namely the mental process of constructing and processing concepts in the human mind.

a. Language as a Reflection of Thought

Language reflects how humans think. The language structures we use in everyday life reveal how our brains process the world around us. For example, the phrase "The book reads

easily" (Goldberg, 1995) shows that humans often map physical experiences (reading) into flexible sentence structures.

b. Language Shapes Thoughts

Language not only reflects but also *shapes* thought. The structures and terms in a particular language can influence how its speakers perceive the world. Levinson (2003) shows that speakers of languages that use absolute orientations (such as "north-south") to describe space have a different way of thinking spatially than speakers of languages that rely more on relative orientations (right-left).

c. Conceptualization and Language Structure

Language facilitates conceptualization through structure. Fauconnier & Turner's (2011) theory of *conceptual blending* shows how humans combine two or more mental structures to construct new meanings. Examples include metaphorical expressions, wordplay, or analogies.

d. Dynamics of Meaning Construction

Meaning in language is not fixed. It is dynamically constructed in the mind through the interaction of experience, context, and linguistic structure (Barsalou, 1999). Thus, understanding an utterance is heavily influenced by world knowledge and personal experience.

e. Language, Memory, and Perception

Language is not only related to abstract thought, but also influences memory and spatial perception. For example, certain grammatical structures in language can strengthen memories or direct attention to certain aspects of experience (Levinson, 2003).

B. Language and the Real World: Embodiment and Mental Simulation

a. Embodied Experience

According to Johnson (2013), physical experience and sensorimotor interactions form the basis for understanding abstract concepts in language. Many abstract concepts are understood through mappings from concrete bodily experiences, also known as *embodied cognition*. Classic examples are conceptual metaphors such as "head" (the top), "base" (the bottom), or "far-near" in understanding space and time.

b. Mental Simulation

Glenberg's (2010) confirms that understanding language involves mental simulation, the process of mentally imagining the situation or action described in the utterance. When someone hears the word "catch," the brain automatically activates a physical simulation of catching an object.

c. Language Concepts and Simulations

Gallese & Lakoff (2005) studied the relationship between language and motor brain activity. They found that action verbs like "grasp" or "kick" are not only processed semantically but also activate areas of the brain associated with the physical activity in question.

d. Language of Space and Time

Boroditsky (2001) shows that the use of spatial language (such as "forward," "backward") influences how individuals understand the concept of time. In some languages, time is described horizontally ("forward," "backward"), while in others it is described vertically ("up," "down").

C. Examples of the Relationship between Language, Thought, and the Real World

a. Verb simulation

When someone hears the sentence "He threw the ball", the brain will subconsciously activate the motor representation of the throwing action, as if actually doing the action.

b. Language of color

Speakers of languages that have many color terms (e.g., Russian for blue) will be quicker and more accurate at distinguishing those colors than speakers of languages that have only one term (Winawer et al., 2007).

c. Time depiction

In English, the future is “in front” and the past is “behind,” whereas in Aymara (Andean), the past is described as “before the eyes” because it can already be “seen.”

D. Theoretical and Practical Implications

a. Theoretical Implications

Conceptual representation models and the relationships between language, thought, and the real world have transformed the traditional linguistic paradigm from a highly formal and structural one to a more dynamic, contextual, and empirical one. Language is no longer understood as a closed system, but rather as part of a cognitive system integrated with real-world experiences and perceptions.

b. Practical Implications

- **Artificial Intelligence (AI) Development:** Knowledge of conceptual representation is crucial in the development of natural language processing-based AI systems, so that AI can better “understand” meaning, rather than simply processing words literally.
- **Education:** Understanding how conceptual representations work can help teachers teach abstract language or concepts in ways that are easier for students to understand.
- **Translation and Cross-Cultural Communication:** Translators must be sensitive to the differences in conceptual representations and cultural frames that exist in the source and target languages.
- **Neuroscience and Psychology:** The study of how language is “simulated” in the brain opens up great opportunities for the therapy of language disorders and the development of rehabilitation methods for patients with cognitive disorders.

Cognitive linguistics offers a rich understanding of how language works in relation to the mind and the real world. Through conceptual representational models of categories, prototypes, schemas, frames, and metaphors, we can see how humans organize knowledge and experience into communicable forms. The relationship between language, the mind, and the real world is two-way: language reflects and shapes the mind, while physical and cultural experiences provide the foundation for how we use and understand language.

A thorough understanding of these two aspects not only enriches linguistic theory but also has a tangible impact in education, technology, translation, and cross-cultural communication. Recent developments in neurolinguistics and cognitive psychology further strengthen the connection between language and human mental activity, opening up broader opportunities for interdisciplinary research.

2.3 Principles of Cognitive Linguistic Analysis

The first principle in cognitive linguistic analysis is the relationship between language and cognition. Language is not simply a tool for conveying information, but also reflects how we think and understand the world. This theory arises from the perspective that human cognition is inseparable from the use of language. For example, when someone expresses feelings or thoughts, the language they use reflects the underlying mental processes. According to Lakoff & Johnson (1980), language is often used to describe our understanding of the world in ways that reflect a direct relationship with cognition. This means that our understanding of the world and ourselves is reflected in the way we use language.

For example, in the sentence “I feel trapped in this situation,” this expression reflects not only a physical state (being trapped), but also a person’s mental or emotional state, illustrating the direct connection between language and complex thoughts. Another example is in the sentence “My mind is running all over the place,” this expression describes disorganized cognitive processes and confusion. The use of the word “running” associated with physical movement illustrates how someone describes chaotic and uncontrolled mental processes. This shows that language often uses physical metaphors to reflect more abstract mental processes, such as confusion. In this case, the use of words like “running” illustrates the disorganization of cognitive processes. As another example, the sentence “My life feels like a long journey” also demonstrates the connection between language and cognition. The metaphor of a journey is used to describe a person’s life experiences full of challenges and changes. The concept of a journey, which involves moving from one place to another, is used to organize a person’s understanding of their evolving life.

2.4 Comparison with Structuralism and Generative Frameworks

Cognitive linguistics emphasizes the close relationship between language and cognition, in contrast to the structuralist approach. Structuralism, pioneered by Ferdinand de Saussure (2023), views language as a sign system separate from individuals and cultures. In the structuralist view, meaning is generated by the relationships between elements within a language system, rather than by direct connections between words and objects in the world. In contrast, cognitive linguistics focuses on the ways in which language reflects the mental processes underlying our understanding of the world, as well as how language is used to express our everyday experiences. For example, the grammatical structure of language is seen not simply as a fixed sequence of words, but as a representation of how we think and process information.

Generative theory, developed by Chomsky (1953), proposes that language is the result of innate human mental capacities structured in the form of universal grammatical rules. According to this theory, humans are born with the capacity to produce sentences never before heard, based on grammatical rules already present in their brains. This concept differs from cognitive linguistics, which focuses more on how language reflects evolving cognitive processes and life experiences. In this regard, cognitive linguistics views language as inseparable from human cognitive understanding and experience.

3. Implications of Cognitive Linguistics for Language Learning

3.1 The Role of Cognitive Concepts in Language Teaching

Cognitive concepts play a crucial role in language teaching. Language learning involves mental processes that enable students to understand and produce language based on their experiences. Piaget (2003), in his constructivist theory, argues that learning is the result of students' mental constructions through interactions with the environment. In language learning, students construct linguistic knowledge through relevant and contextual experiences. Vygotsky (1978) also emphasized that language develops in a social context, meaning that social interaction is highly influential in language learning. Language learning involves more than just learning vocabulary or grammatical structures, but also understanding how language is used in social contexts, which influence our thinking.

3.2 Language Learning as a Meaning Construction Activity

Language learning is more than simply mastering words or grammatical rules. It is an activity of constructing meaning within a powerful social and cultural context. The theory of linguistic relativity, or the Sapir-Whorf hypothesis, proposed by Sapir and Whorf in Chandler (1994), suggests that language influences the way we think and categorize the world. Therefore,

in language learning, it is important for educators to consider students' social and cultural contexts to make the process of constructing meaning more relevant and effective. For example, the word "love" in Indonesian culture refers not only to feelings of affection for a partner but also to respect for family, friends, or even specific objects. Language learning must take this contextual meaning into account.

3.3 Implications for Curriculum and Material Design

A language curriculum should be designed by considering how language concepts are formed and processed in students' minds. In cognitive linguistics, language is considered a mental representation of human experience. Therefore, a language curriculum should reflect the cognitive processes underlying language use. For example, the teaching of prepositions can be introduced using picture schemes and diagrams depicting spatial relationships, in accordance with the principles of Cognitive Grammar. Furthermore, the curriculum can also integrate the teaching of conceptual metaphors to help students understand the deeper meanings and nuances of language (Zaghlool & Khasawneh, 2024).

Language learning materials should be designed to reflect the cognitive structure of language, as described in cognitive linguistics. For example, teaching phrasal verbs and prepositions can focus on simpler and more frequently used grammatical constructions, as these structures are found to be easier for students to learn. A cognitive linguistic approach can help students develop critical thinking skills by encouraging them to understand how language reflects the way we think and understand the world. This can be achieved through the analysis of metaphors, idioms, and other language structures that reflect particular thought patterns (Wirag et al., 2022). In the context of foreign language teaching, the application of cognitive linguistics can help students understand conceptual differences between the source and target languages. For example, differences in the use of prepositions or sentence structure can be explained through underlying cognitive schemas (Christison & Murray, 2021)s.

3.4 Cognitive Linguistics-Based Teaching Strategies

Cognitive linguistics-based teaching strategies involve the use of visual aids and diagrams to help students understand abstract concepts in language. Research by Draijati et al. (2018) supports the use of image schemas in scientific and literary texts as an effective way to enrich students' understanding of complex linguistic concepts. Furthermore, teaching conceptual metaphors is also important to help students understand how to think and speak in the target language. Technology in teaching, such as interactive learning apps and language visualization software, can also help students understand language in a more concrete and contextual way, in line with the principles of cognitive linguistics (Pokrivčáková, 2019).

The results of this study demonstrate that language is not merely symbols or grammatical structures separate from cognition, but rather an integral part of human mental processes. Language is understood through experience, perception, and social interaction, which dynamically shape meaning. These findings illustrate that our understanding of the world is influenced not only by the information conveyed through language, but also by how we construct that understanding and relate that information to our own experiences. Thus, language is more than just a means of communication; it is a reflection of how humans think and process information.

The meanings that emerge in language are not fixed, but constantly evolving and influenced by changing experiences and social contexts. This process of meaning-making occurs not only in the structure of words or sentences, but also in more complex ways, such as conceptual metaphors used to describe abstract ideas. For example, in an expression like "time is money," we are not only talking about time as a concept but also relating it to our more concrete experiences,

such as managing limited resources. This demonstrates how language can shape how we perceive the world and organize our knowledge about it.

The implications of this study's findings are broad, particularly in the context of education and technology development. In education, a deeper understanding of language as a component of cognition can help teachers design instruction that is more contextual and relevant to students' experiences. For example, in language teaching, the use of conceptual metaphors or visual schemas can help students grasp abstract concepts in a more accessible way. Furthermore, in technology development, particularly in the field of artificial intelligence (AI), this understanding can be applied to the development of more intelligent natural language processing systems capable of understanding meanings beyond the literal processing of words.

Compared to other linguistic theories, such as structuralism or generative theory, cognitive linguistics offers a more holistic and integrated view. While structuralist approaches view language as a system of signs separate from lived experience, cognitive linguistics assumes that language relies heavily on deeper mental processes, such as perception and reasoning, that shape meaning. This suggests that language functions not only as a structured system but also as a reflection of how we think and interact with the world.

As a follow-up, the findings of this study suggest several practical action plans. Developing a language education curriculum based on the principles of cognitive linguistics can help students understand language in a deeper context, introducing them to concepts such as conceptual metaphors and mental schemas. Furthermore, the application of technology in language teaching, such as the use of artificial intelligence-based applications for interactive simulations, can enhance students' understanding of abstract concepts and enrich their learning experience. In the world of translation, translators must be more sensitive to the differences in conceptual representations and cultural frameworks present in the source and target languages, to ensure that the meaning conveyed is more precise and appropriate to each cultural context. With these steps, the application of cognitive linguistics can be maximized in various fields to create more effective understanding and communication.

CONCLUSION

Based on the literature review conducted, it was found that cognitive linguistics provides a new perspective in understanding language as a cognitive phenomenon that is inseparable from human mental processes. One of the most important findings is that language is not merely a system of symbols or grammatical structures, but rather reflects the way humans think, organize knowledge, and interact with the world. Concepts such as conceptual metaphors, categories, prototypes, and embodiment are integral to language learning, showing how language is dynamically processed through experience, perception, and social interaction. In addition, the use of cognitive linguistic theories in language teaching also has a positive impact on improving student understanding, especially in the context of teaching vocabulary and language structures more contextually.

This research's contribution lies in the integration of cognitive linguistics into language learning, providing new insights into how language, thought, and the real world interact. This research broadens our understanding of how language is influenced by deep cognitive processes, and conversely, how language influences how we think and understand the world. With this approach, language teaching can be enriched by the use of metaphors, mental schemas, and cognitive analysis, enabling more holistic language instruction connected to students' lived experiences.

However, this study also has limitations, particularly in terms of the scope of the literature

used. Although the selected sources come from leading scientific journals, this review is limited to the available literature and may not cover all perspectives or recent developments in the field of cognitive linguistics and language learning. Furthermore, this literature review focuses more on the theory and application of cognitive linguistics in the context of language teaching, while practical applications in the field still require further research. Going forward, there are significant opportunities to further develop the application of cognitive linguistics in various fields, particularly in language education and technology development. The use of artificial intelligence (AI) in cognitive linguistics-based language learning offers enormous potential, as AI can be used to develop more intelligent and contextual language learning applications. The challenge lies in how to translate the abstract theories of cognitive linguistics into practical applications that are accessible and usable effectively by educators and students.

Suggestions for further research include expanding the literature review by adding more case studies and field experiments to test the effectiveness of applying cognitive linguistics to language teaching. Developing a cognitive linguistics-based curriculum, including elements of conceptual metaphors, mental categories, and visual schemas, as well as implementing AI-based learning technologies, can increase innovation and efficiency in language teaching at various levels of education.

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