

A Psycholinguistics Study on Metaphor Comprehension in English as a Second Language

Aliyah A. Acobo

Abstract : *Metaphors often pose a problem for non-native speakers to comprehend in written texts (Aardal, 2014). This exploratory study examines the linguistic metaphor comprehension of the eight (8) Bachelor of Secondary Education students majoring in English. The study investigates their interpretation of ten novel linguistic metaphors with and without contextual cues of Ferreira (2008) based on online editions of English and American newspapers. Findings indicate the critical role of context in understanding linguistic metaphors. In the absence of context, participants interpreted metaphor literally or as basic comparisons. However, with the context, their interpretations ranged from more abstract to specific meanings depending on context which they mostly relate on exploitation, emotions, and social issues. These results further support the notion that situational and linguistic cues facilitate metaphor comprehension, consistent with previous studies emphasizing the role of context in metaphor processing.*

Keywords: *Linguistic metaphor comprehension, English as a Second Language, L2 learners,*

1. Introduction

According to Lakoff and Johnson (1980), metaphors are integral to language in providing essential means of explaining complex ideas in a simple word. However, the understanding of metaphors remains a complex area to the use of non-native speakers, especially students who study the English language as the Second Language (ESL). In fact, the study of Aardal (2014) highlighted that metaphorical expressions are more complex for users studying English as the Foreign Language (EFL). With this, the present study explored the psycholinguistic aspects of metaphor comprehension by ESL learners with the aim of showing underlying cognitive processes for metaphor interpretation in the second language context.

Metaphor understanding in the second language is hard for ESL learners since metaphorical language mostly inches aside from literal meanings and becomes hard to be comprehended. For example, Veliz' (2012) work identified metaphorical awareness as an essential factor in developing the metaphorical competence of learners. The explication of source-target relationships underlying metaphors has shown to have considerable effect on making metaphors comprehensible to ESL learners. However, there are still many gaps in our understanding of how ESL learners work with metaphorical expressions and the cognitive processes involved.

Chances are that communication is effective in understanding and specially producing metaphors to the ESL learner. Mastery of competent metaphor comprehension not only helps to enhance language proficiency but also engage in deeper interactions with the English-speaking communities (Ha Hoang, 2014). Though research has been conducted around many aspects of comprehension of metaphors, less attention has been paid to the ESL learners' unique challenges. Littlemore and Low (2006) concluded that the previous studies by those researchers, such as that of Cameron (2003), have underestimated the extent of variation in metaphor processing between native and non-native speakers. This, therefore, calls for further research into the cognitive mechanisms underlying metaphor comprehension in ESL learners.

This paper explored the difficulty of linguistic metaphor understanding in ESL learners through investigating how participants process linguistic metaphors and arrive to such varying understanding, with and without context. Thus, the present study hopes to contribute to add insights on how metaphor processing is done in the ESL context and aid better language learning.

2. Research Questions

This research used a qualitative approach to address the research question:

1. How did the participants interpret the novel linguistic metaphors with and without context?

3. Theoretical Framework

Lakoff and Johnson (1980) developed the Conceptual Metaphor Theory—the theoretical framework underlying the understanding of metaphor processing for ESL learners. It presents that metaphors are not just linguistic expressions but are very much basic conceptual tools that highlight the way people understand abstract concepts by transferring concretized domains onto these abstract concepts. Therefore, metaphorical mappings resting on our embodied experiences, cultural contexts, and linguistic practices constitute individuals' conceptual systems. In the case of ESL learners, understanding metaphorical expressions is related to the complex interplay of a variety of linguistic processes with conceptual mechanisms underlying the

metaphor interpretation process. The ESL learners who encounter metaphors in their second language rely on the conceptual knowledge of it transferred from their first language to make sense and understand the metaphorical expression. It involves the activation of conceptual metaphors stored in the long-term memory by mapping these metaphors onto the linguistic input they get.

This research looked at how ESL learners try to make these mappings in a second language and its effects on their prior metaphorical mappings from their native language on interpretations in English. Testing metaphorical competence with and without context also examined how well ESL learners may activate relevant conceptual metaphors in interpreting metaphorical expressions based on these mappings when context is not available. This study, in these analyses, also looked at the underlying cognitive processes ESL learners used in understanding the metaphors, either through the initial dependence on literal interpretations or by trying to create new mappings for those new metaphors. More broadly, CMT offered a theoretical basis for explaining the 'why' underlying the way ESL learners' minds process metaphor. Thus, the thought processes and the impact of context were analyzed to add significant inputs from this study into this complex process of processing metaphors in a second-language context.

4. Methodology

a. Research Design

This study employed a qualitative research design. In this design, an exploration of the means through which ESL learners make sense of linguistic metaphors through thematic analysis was done. The research design was conducted in a way to suggest that a metaphor interpretation cognitive process is present with and without contextual information. According to Creswell (2014), this design is used in an attempt to explore a social or human problem in depth in order to comprehend it comprehensively. It captures the comprehensive and detailed information with regard to metaphor understanding by ESL learners, which is highly subjective to individualistic cognitive strategies, linguistic background, and exposures to metaphorical language.

b. Participants of the Study

The participants consisted of eight (8) Second Year Bachelor of Secondary Education Major in English students. Given the small and accessible population, a convenience sampling method was employed. Convenience sampling is a non-probability sampling technique where subjects are selected because of their convenient accessibility and proximity to the researcher (Etikan et al., 2016). This is to ensure that all the available students within this course and year level participated in order to comprehensively gather data in this particular group. The sample is small; nevertheless, the data found can be useful in the concerned study about ESL learners' metaphor comprehension skills.

c. Data Collection Tools

To investigate the metaphor comprehension of ESL learners, this study utilized the Metaphor Comprehension Test (MCT). This test is utilized to assess the participants' ability to comprehend novel linguistic metaphors. The MCT consisted of ten novel linguistic metaphors adopted from Ferreira (2008). Each of the metaphors was presented in a condition both with and without context to assess ESL learners' interpretations. Participants were asked to write down an interpretation for each metaphor once without any contextual information and once with a provided context. Their responses were analyzed by thematic analysis to get a richer understanding of how they interpreted the linguistic metaphors.

d. Data Analysis

Tabular presentations were done to show participants' comprehension on the ten novel linguistic metaphors, which were interpreted according to observed trends and patterns of how ESL learners comprehend linguistic metaphors with and without contextual information in their responses.

Firstly, the participants' responses were analyzed by placing their interpretation of each metaphor with and without context into a table format. The table provided an immediate visual of how the data compared across conditions for each response.

The analysis of the table first dealt with the change which the interpretation of the participants underwent when the context was added to the table. After the classification of the metaphor into columns of with and without context. Such a classification allowed the researcher to see a change in interpretation when context was provided.

Interpretation was derived from the table regarding context issues in metaphor understanding among ESL learners. It showed that while some participants could make metaphorical inferences independent of context, most needed

contextual assistance in interpreting the metaphors correctly. This finding corroborates the assertion that context indeed plays a vital role in guiding ESL learners from a literal interpretation to a more subtle one, metaphorical.

The analysis contained the explanation of the table showing how each participant had processed the metaphors, and that provided an overview of the cognitive strategies employed along with the ones that were difficult to use without the contextual information. The analysis, though qualitative in nature, could approach the data in a very structured and organized manner, which yielded a contribution that was considered important for the knowledge about psycholinguistic processes resorted to in metaphor comprehension within the context of a second language.

5. Results and Discussion

Table 1. Participants' Interpretation of the Linguistic Metaphor 1

Participant	Participants' Interpretation Without Context	Participants' Interpretation With Context
A	To get a gene from someone.	Businesses are all about capitalism that it seems like they are getting a part of the body (money) of the people.
B	To use someone to get what you want and get what you need.	Exploitation of skills and efforts of human beings.
C	Killing a person.	Business is all about profit where the seller must have something from the people. Nothing is free when it comes to business.
D	The irony of getting the actual flesh.	Taking a part of what is agreed upon as a part of business.
E	He took my heart with him.	Having profit from others.
F	It is like killing someone to get a fresh blood.	Getting all these resources and money.
G	Stealing something from someone for my own good.	Getting motivation from others.
H	Our boss demanded unreasonable amount of money as compensation for the small error made by my coworker.	Through the inequality of business to the people. People are pressured because of that they are all about their personal gains.

*** WOI. *To get a pound of flesh from human beings.*

*** WCI. *"It is all about getting a pound of flesh from human beings. Businesses are all about profit and people feel much more stressed because of that." Primary metaphor: HARM IS PHYSICAL INJURY*

Table 1 shows how the participants interpreted the metaphorical phrase 'get a pound of flesh,' both with and without context. The phrase, commonly understood to mean taking a harsh punishment, was provided contextually as referring to businesses prioritizing profit above all else. Participants A-H initially understood the metaphor literally, perceiving it as a physical action. When given the context, participants' interpretations reflect a more a different understanding of exploitation and profit-focused, with some classifications changing, such as Participant E's interpretation.

'He took my heart with him.' Participant E

Participants initially interpreted the metaphor as a physical act; with context, the focus shifted to businesses exploiting people; and interpretations varied, with Participant G viewing it as motivation and Participant H using a specific example of workplace pressure. These further support that the argument provided in context clarifies the intended criticism of profit-driven business practices at expense of people's well-being, further signifying that metaphors can be misleading if those are given without context.

'Getting motivation from others.' Participant G

'Through the inequality of business to the people. People are pressured because of that they are all about their personal gains.' Participant H

These further underline that metaphorical misunderstanding, in the absence of context, and the importance of background to arrive at an accurate comprehension are all but universal. This aligns to the findings of Ferreira (2008), with dependence on the linguistic context, where the foreign language learners understand metaphor, while they still experience difficulty with the principle of salience in the target language. Moreover, the study of Shen et al. (2022) on bilingual brain processing of scientific metaphor also share similar pattern which highlighted the importance of context in comprehension, adding a nuanced finding where participants showed different neural patterns in processing metaphors in their native language and in the second language. In the study of Alkhalaf (2023) with Saudi EFL learners, the role of the situational context as well as linguistic-conceptual nuances as a prompt for their interpretive motivations with the use of metaphors in gaining accurate comprehension is also pointed out.

Table 2. Participants' Interpretation of the Linguistic Metaphor 2

Participant	Participants' Interpretation Without Context	Participants' Interpretation With Context
A	It was too much.	Premium subscribers were given more privilege to experience other tools/features of Yahoo.
B	Having things that you cannot take.	Offering its premium subscribers up to a 'virtually unlimited' capacity.
C	Promoting and persuading the subscribers.	Giving those who purchase a premium account a chance to explore and use Yahoo according to their own will and ways, without limits.
D	Not everyone can have premium accounts to unlock certain features online.	To give a better deal to loyal customers.
E	His temper reached its maximum capacity.	Can use up until as much storage you can.
F	To deceive people.	Get the premium and enjoy the application.
G	To deceive people.	Getting premium accounts is much better.
H	The company introduced a new loyalty program with exclusive perks and personalized services to bump its premium subscribers to a virtually unlimited capacity.	Yahoo gave the email users dramatically raise of storage at the same time also giving the premium subscribers a virtually unlimited features and capacities.

*** WO2. *To bump its premium subscribers up to a virtually unlimited capacity.*

***WC2. *"Yahoo says that it plans to dramatically raise the storage limit given to its free e-mail users while at the same time bumping its premium subscribers up to a 'virtually unlimited' capacity."*

Conceptual metaphor: MORE IS UP

Table 2 displays how the participants understand the linguistic metaphor 'bump up to virtually unlimited capacity,' with and without context. Participants A-H have varying interpretations. Some participants initially focused on literally having reached a limit, while some found it as 'going beyond a boundary.' Meanwhile, in the linguistic metaphor with context, the participants' interpretation changed emphasizing the significant increase in storage for premium account holders compared to free users. Evidently, most of the participants interpret the metaphor literally at first as reaching physical limit. Apparently, all interpretations of the metaphor given by the participant involve the literal sense of getting to the limit physically first. Participant D, on the other hand, focused on exclusivity, and Participant H used specific example to illustrate the different storage tiers.

'To give a better deal to loyal customers.' Participant D

'Yahoo gave the email users dramatically raise of storage at the same time also giving the premium subscribers a virtually unlimited features and capacities.' Participant H

The findings above support the idea that metaphors with quantities or spaces could be initially misinterpreted, and the need for context becomes significant to accurately interpret the linguistic metaphor. This finding is similar to the study about understanding spatial metaphors of Boroditsky (2000). The study found that, metaphors presented without context were taken literally on the first contact. However, after such interpretation, with the presence of context, the participants' understanding shifted to the intended meaning. Another finding of Pitt & Casasanto (2022) on the embodied nature of spatial metaphors is related to how the physical experiences of participants influenced their interpretation of quantity metaphors. This gives reinforcement for the idea that space-related metaphors, like 'up' for 'more,' are initially misinterpreted. Such results are in agreement with the current study, where participants initially interpreted the metaphor literally but eventually grasped the intended meaning when given the linguistic metaphor in context.

Table 3. Participants' Interpretation of the Linguistic Metaphor 3

Participant	Participants' Interpretation Without Context	Participants' Interpretation With Context
A	To give up everything for something.	Exchanging something for a big information or important things.
B	You are just dreaming for the true kingdom.	She was giving away the assets (the funds/resources of the company) of the US Air Force.
C	Unconditional love.	The girl just gave her hard works to those who are seated in the position.
D	Being joined by enemies.	To give out information easily with the convenience of other while endangering the others as well.
E	Love requires sacrifices.	Used up all she had.
F	Adventuring in the realms of fantasy.	She exchange her career from her self gain and selfishness.
G	Trading the something for the position.	She was overpaid the company.
H	The politician was willing to trade the keys to the kingdom by compromising some of his core beliefs in order to secure support needed for his campaign.	She exchanged great opportunities to the company/government.

*** WO3. *To trade the keys to the kingdom.*

***WC3. *"The career of Druyun, once the most powerful woman in the U.S. Air Force, of course, is over. Last week, she was sentenced to nine months in prison for having steered billions of dollars in air force contracts for four critical weapons systems to Boeing and for having overpaid the company as well. [...] "This is just awful," said Richard Aboullafia, [...]. "She was trading the keys to the kingdom." PM: MEANS ARE PATHS*

Table 3 illustrates participants' interpretations of the metaphorical phrase 'trade the keys to the kingdom,' both with and without context provided. The metaphor implies giving up something valuable for ultimate power or control, and the context involves Druyun, a powerful Air Force official, steering contracts to Boeing and overpaying them. Participants A-H initially understood the metaphor literally, focusing on an exchange of keys, interpreting it as giving something concrete.

'To give up everything for something.' Participant A

'Trading the something for the position.' Participant G

Most participants initially interpreted the metaphor literally as giving away actual keys, but with context, their interpretations centered on Druyun sacrificing her career and ethical principles for personal gain through steering contracts. Interpretations varied slightly, such as Participant C focusing on the notion of sacrifice, while Participant H used a politician to illustrate the metaphor's meaning.

Table 3 stresses the significance of context in comprehending metaphors, demonstrating that without context, participants may struggle with the figurative meaning, but with context, they can grasp the intended message, which here highlights ethical misconduct and abuse of power by Druyun.

These findings are in parallel with the study of Boroditsky & Ramscar (2002), which revealed that participants initially interpreted spatial metaphors like ‘time is money’ more literally when presented without context, but their understanding changed to the intended meaning when given with relevant contextual information. Similarly, Cardillo et al. (2012) demonstrated that the brain processes metaphors differently depending on the availability of contextual cues, with literal interpretations predominating in the absence of context. Specifically, regarding the metaphor ‘trade the keys to the kingdom,’ Gibbs (1994) noted that such idiomatic expressions are often misinterpreted literally by language learners until they gain sufficient familiarity and exposure to the intended figurative meaning. Furthermore, research by Kövecses (2010) has indicated the influence of cultural and conceptual knowledge in comprehending linguistic metaphors. Without the proper context about the Druyun scandal, participants may have struggled to connect the ‘keys to the kingdom’ metaphor to the intended meaning of unethical behavior and abuse of authority. This provided the contextual information that allowed them to map cultural and conceptual frames in reaching accurate interpretation of the metaphor. However, Glucksberg (2003) found that highly conventional metaphors are as quickly understood as literal statements even without any contextual help. This suggests that metaphor comprehension may depend on the degree of familiarity and conventionality of the expression, in addition to the availability of contextual cues. The findings further explicate the crucial role of context in interpreting linguistic metaphor accurately, as demonstrated by the shift in participants’ understanding when provided with context about the Druyun case.

Table 4. Participants’ Interpretation of the Linguistic Metaphor 4

Participant	Participants’ Interpretation Without Context	Participants’ Interpretation With Context
A	You are isolated alone and lonely.	You are in a dangerous situation.
B	You're in a difficult situation.	You are trapped in a nightmare.
C	Lost.	I am in the darkest days of my life, in which I don't see where I am heading.
D	You experiencing a dilemma in your life.	The feeling of weakness and not being able to see a ray of light as a sign of hope.
E	His heart and mind were lost in a dark forest.	Taking it as a challenge.
F	Being depressed and mentally unstable.	I'm in the lowest part of my life, scared, lonely, and don't know where this going.
G	A feeling of not being able to see light in a situation and you don't know the way out.	You are in the midst of a dark forest.
H	After the sudden change in leaderships, the employees felt like they were in the middle of a dark forest, unsure of the company's direction and their roles within the organization.	In a world full of negativities, judgment, imperfections, evil and I am facing it while surrounded by traitor people.

*** WO4. *You are in the middle of a dark forest.*

***WC4. *“You are in the middle of a dark forest, night closing in, with a pack of vicious, hungry wolves wandering back and forth in front of you, taking your measure.” PM: GOOD IS LIGHT/ BAD IS DARK*

Table 4 demonstrates how Participants A-H interpreted the fourth novel linguistic metaphor. It can be interpreted that participants generally associate ‘forest’ with negativity, such as ‘darkness’ and being ‘lost.’ However, the understanding of the participants is different and highly context-dependent, with individual interpretation. Emotionally, it conveys the feelings of solitude, fear, and depression. Spatially, it is a metaphor not knowing which direction to take, while in regard to knowledge and understanding, it portrays no clear understanding of situations. When the linguistic metaphor was given to the participants in the context, vivid interpretations came out focusing on danger especially the presence of wolves. These findings further elaborate on the fact that even a very simple phrase, like ‘dark forest’, may relate to strong emotions and complex ideas.

'Lost.' Participant C

'A feeling of not being able to see light in a situation and you don't know the way out.' Participant G

The results above are strengthened by the discussion of Zhang (2010) on how metaphorical expressions, including those related to natural settings like forests, can convey complex emotional states such as fear and loneliness, particularly when contextual cues are absent or ambiguous are discussed. Thus, interpretations depend on individual perspectives and situational context.

Further, Li and Alamgir (2012) have noted that metaphors provide powerful tools in which very difficult emotions may be expressed. Therefore, the metaphor 'dark forest' can represent not just the feeling of physical disorientation but also emotional turmoil and existential uncertainty. This suggests that spatial metaphors almost always imply a lack of direction or understanding. In this regard, metaphors are invested with much potent emotional impact, particularly that which constructs depression and fear.

Table 5. Participants' Interpretations of the Linguistic Metaphor 5

Participant	Participants' Interpretation Without Context	Participants' Interpretation With Context
A	The manipulation has new victim. I got stranger.	Corruption is becoming relevant again.
B	Institutions experiences downfalls.	Threats are affecting the most recent season of corporate financial manipulations.
C	Under trials or challenges.	It is the time of corporate manipulations that caused a lot of issues to resurface or to arise.
D	Manipulative and liar people are everywhere.	Has a new challenge or is a new obstacle.
E	He was manipulated and got scammed.	Comparing the recent to the latest.
F	It is like a cheat day.	They manipulate the company's income and it sunk down or bankrupt.
G	Everyone is facing a difficult situation no one knows about.	The most recent season of corporate financial manipulations has its latest storms.
H	The media coverage highlighted the turmoil within the company as the most recent season of corporate financial manipulation has its latest storms.	The season of corporate financial manipulations.

*** WO5. ...the most recent season of corporate financial manipulations has as its latest storms.

***WC5. "Likewise, the most recent season of corporate financial manipulations, which by some measures blew in with Enron back in 2001, has as its latest storms the likes of Hollinger and Fannie Mae in North America and Hynix in South Korea." PM: CIRCUMSTANCES ARE WEATHER

Table 5 displays Participants A-H's interpretations on the linguistic metaphor 'the most recent season of corporate financial manipulations has as its latest storms' with and without context. Participants' interpretations of the linguistic metaphor without context centered on manipulation or negative events in general. When given with context, their interpretations became more specific, associating 'storms' to corporate scandals. The dominant classification for most participants (B, C, G, H) was event structure, interpreting the metaphor as describing a period of heightened corporate financial manipulation.

Participant A linked the metaphor to corruption, possibly due to their understanding of 'storms' representing negative economic events. Participant D interpreted 'storms' as manipulative people, highlighting a social aspect, while Participant E focused on comparing recent and latest manipulations. Participant F saw 'storms' as leading to a company's

downfall. The additional information mentioning specific companies significantly impacted interpretations, enabling participants to connect 'storms' to real-world financial scandals.

Overall, this table demonstrates how metaphors can be challenging to understand without context, but additional information can significantly enhance comprehension and reveal deeper connections to the intended meaning. The metaphor 'storms' effectively highlights the turbulence and negativity associated with recent corporate financial manipulations.

The dominant classification of 'event structure' among participants aligns with recent literature emphasizing the role of context in metaphor comprehension. Gibbs (2023) highlights that metaphor interpretation is often influenced by pragmatic context, suggesting that individuals may derive different meanings based on the situational cues available to them. This supports the idea that metaphors can be challenging to interpret without contextual information, as participants demonstrated varying interpretations based on their backgrounds and the information provided.

The interpretations linking 'storms' to corruption and manipulative individuals reflect the emotional and social dimensions of metaphor use. According to Musolff (2015), metaphors not only stand for abstract notions but also for cultural and social realities, and people coming from a different background may interpret them differently. Thus, it supports the findings of the current study, that when the metaphor would be presented, it would call forth negative economic events and personal experiences from the participants' lives specifically about how metaphors can trigger emotional and issue-bound reactions.

The impact of additional information about specific companies on participants' interpretations underscores the importance of contextual specificity in metaphor comprehension. Research by Deignan et al. (1997) indicates that the effectiveness of metaphors often hinges on their ability to connect abstract ideas to concrete experiences, which aligns with the present study that mentioning real-world financial scandals enhanced participants' understanding of the metaphor.

Table 6. Participants' Interpretations of the Linguistic Metaphor 6

Participant	Participants' Interpretation Without Context	Participants' Interpretation With Context
A	The passion burp out.	It seems that their relationship went from a lovely one to a complete strangers.
B	You are extremely happy then suddenly you become extremely sad.	The intensity of their relationship went down.
C	Love turns to cold, sweetness is gone.	Their relationship was romantic but due to some circumstances it ended that resulted for it to be cold.
D	Your happy relationship turns out to be cold and awkward.	From warm embraces of love to cold stares of dismay.
E	My anger suddenly vanished as my brother arrived.	Went ended up nothing.
F	In the edge of raging but found peace in between chaos.	Their misunderstanding is getting onto the peak of fight but they resolve it.
G	A young couple suddenly fell out of love.	The argument is settled and no angry feelings are left.
H	After the heated argument, their relationship went from boiling to subzero, with communication coming to a stand still and feelings of animosity replacing the previous passion.	The argument is settled and no angry feelings are left.

*** WO6. *The temperature went from boiling to subzero.*

***WC6. *"When Mr. McAllister went to a casting call for a commercial for the left-leaning group MoveOn.org and got a part, his girlfriend was dismayed. "Having a spirited debate is one thing, but being part of a political machine that opposes her candidate is another," he said. She broke their next date, and soon the relationship ended. 'The temperature went from boiling to subzero after I did something to get people to support my candidate,' Mr. McAllister said." PM: CHANGE IS MOTION*

Table 6 illustrates how Participants A-H understood the metaphor ‘The temperature went from boiling to subzero.’ Here it is found that participants A, B, C, D, H, all grasped the meaning of the metaphor, including without context as relating boiling with extreme emotion and subzero as relating to the lack of emotion or something bad. Participants’ perceptions regarding linguistic metaphors with context became more specific; they linked the temperature change with how the relationship of the two became cold because one person disagreed with the other. The most dominant categorization was emotional which was emphasized by participants B, C, D, and H.

Participant E interpreted ‘subzero’ as ‘went ended up nothing,’ indicating a wider comprehension of coldness to be nothing good, while Participant F understood the change to have reached a point of peak conflict (‘raging’) followed by resolution (‘peace’). Participant G was concerned with the first passionate state (‘young couple fell out of love’). The extra information gave a clear scenario for participants to associate temperature change with the emotional shift of the couple. Stressing emotional meanings is very relevant to modern studies emphasizing the importance of emotions in conflict resolution and relationship interaction. For instance, according to Halperin et al. (2017), certain emotions such as anger or fear may powerfully affect responses to conflict and thus emotional sensitivity is an important determinant in effective conflict resolution.

This resonates with the interpretations of Participants B, C, D, and H, who centered on the emotional changes in the relationship, demonstrating how metaphors can capture complex emotional experiences. Participant E’s interpretation of the term ‘subzero’ as ‘went ended up nothing’ reflects a better understanding of coldness representing non-positivity. Such findings were echoed by Warren (2015), emphasizing that when there is a conflict, the negative emotion is always heavier than the positive one, hence giving the sense of ‘empty’ or even ‘lost’ emotions.

In this context, cold merely means the lack of something good; hence, unresolved emotional conflicts leave one feeling hollow. Participant F interprets the temperature change to have reached its peak of conflict then resolution. This resonates with insights from Gibbs (2023), which says that metaphors can easily communicate the course of emotional experiences in relationships. This understanding emphasizes that metaphors, such as ‘boiling to subzero’, may not only portray conflict but also a way to resolve it, emphasizing that emotional states in relationships can be dynamic. Participant G’s focus on the initial passionate state, interpreting the metaphor as indicative of a ‘young couple falling out of love,’ aligns with research by Bar-Tal et al. (2007), which discusses that arguing that emotional changes within a relationship can cause dramatic shifts in interpersonal interactions. This perhaps means that the metaphor practically takes on the notion of relationship breakdown, where that very same passion could develop into an emotional detachment.

Table 7. Participants’ Interpretations of the Linguistic Metaphor 7

Participant	Participants’ Interpretation Without Context	Participants’ Interpretation With Context
A	I had enough.	Enjoying a hundred megabytes that you can freely do anything; no limitations.
B	Time is precious.	I’m about to lose my patience.
C	It pertains to someone who’s about to give up.	I am happy since I was able to explore everything according to my desire and wish.
D	Time is gold.	Getting the best out of the thing or feature.
E	I am so done being a fool.	Ended up in so much happiness.
F	Being tired of everything.	There’s no limitations.
G	A person is physically or mentally drained.	I was bumping at the edge of my limit.
H	After working long hours for weeks without a break, she was at the edges of her limit, struggling to cope with the stress and pressure.	I am able to go through my limit because of the hundred megabytes.

*** W07. *I was at the edge of my limit.*

*** WC7. *"A hundred megabytes is absolutely fantastic because I was bumping at the edge of my limit".*

Table 7 shows that Participants B, C, F, and G comprehended the metaphor's meaning without context, linking 'edge of limit' with reaching a point of exhaustion or frustration. When given with linguistic metaphors with context, interpretations became more varied; Participant H connected it to stress relief, Participants A, C, and E focused on limitations being lifted. Participants B, E, and F expressed frustration or relief which denoted an emotional expression. Physically, participant G interpreted 'limit' as exhaustion.

The finding above aligns with research on metaphoric comprehension of Gibbs (2017) & Kövecses (2010) suggesting that individuals often intuitively understand metaphors related to physical and emotional states even in the absence of context. When given linguistic metaphors with context, interpretations became more varied. Participant H connected it to stress relief, while Participants A, C, and E focused on limitations being lifted, echoing Kövecses' (2017) assertion that context can significantly shape the interpretation of metaphors. In addition, participants' expression of frustration or relief indicated an emotional response consistent with Charteris-Black (2014) which revealed that metaphors can evoke strong emotional reactions.

Meanwhile, Participants A, C, D, and H viewed 'limit' as a capacity or resource that can be used up. Notably, participant A interpreted '100 megabytes' as unlimited freedom, suggesting a misunderstanding of the metaphor related to computer storage, while participant C saw reaching the limit as an opportunity for exploration. Participant H linked the metaphor to work stress and uses the additional information to suggest coping with stress by exceeding the limit.

This view is echoed by Kövecses (2017), who emphasized the role of the body and other elements of the context in meaning-making processes. These varying responses from participants were substantiated by Littlemore & Low (2019), who worked on challenges in the interpretation of metaphors in specialized and educational settings. Their study showed how difficult people find it to interpret a metaphor combined with technical expressions and how transparent explanations and situational details are necessary for avoiding misunderstandings.

Participant H associated the metaphor with work stress and further used it to argue that one can cope with stress by exceeding the limit, which agrees with the studies of Feldman & Craske (2020) about stress and coping mechanisms. Their psychological studies and clinical observations found that metaphors help people to describe their experience of stress and coping and enhance their coping mechanisms.

Table 8. Participants' Interpretations of the Linguistic Metaphor 8

Participant	Participants' Interpretation Without Context	Participants' Interpretation With Context
A	It had an impact emotionally.	Café de Flore managed to be loved by the Paris fashion elites.
B	Someone who can be easily get, gets hurt easily.	Captured the fascination of...
C	This pertains to a moment of which someone or a person touches the hearts of the people.	The place is beautiful and comfortable that a lot of people likes it especially those who are the elite ones.
D	They can be easily fooled.	To gradually appreciate the beauty of the place.
E	Even if they pretend they are not hurt, the pain still manage to reach their hearts.	One of the known people's choice or like.
F	Pertains to a feeling of being overwhelmed and magical.	The elite people love and like the Café de Flore.
G	Faith fell in love with Airo after the latter's constant care and support.	Has been the most favorite.
H	The touching story of resilience and hope in the film has managed to sneak into their hearts.	The Café de Flore catch the warm desires and took the attention of the Paris Fashion elite.

*** WO8. *It has managed to sneak into their hearts.*

***WC8. *Café de Flore, is another example of a well-frequented location that has managed to sneak into the hearts of the Paris fashion elite and stay there*". PM: IMPORTANT IS CENTRAL

Table 8 shows how the respondents interpreted the metaphor 'It has managed to sneak into their hearts' without context and with context of a famous cafe of Paris, generally crowded with fashion elite. Without context, the metaphorical understandings differed greatly, where some related the metaphor to emotional impact (Participant A), some to vulnerability or pain (Participants B, C, and E), while others gave negative (Participant D) and imaginative (Participant F) interpretations. However, when context was provided, respondents' interpretation became more focused, for instance, because 'sneak into their heart' seemed to describe earning affection or favor with respect to the café's popularity for the fashion elite, most participants interpreted the metaphor as. Even with this sort of alignment, some still focused on different aspects, like the beauty of the cafe and gradual appreciation (Participant D), or a more intense affective connection (Participant H).

Metaphor understanding is, therefore, a complex behavior that incorporates a specific setting, an individual perception of the situation, and cultural influences. Lackoff & Johnson's (1980) Conceptual Metaphor Theory and Gibbs' (2006) embodied cognition emphasized that a context can elicit knowledge structures to facilitate metaphors as depicted by the way participants were steered around the Parisian café setting. However, metaphors are not interpreted consistently and can be subjective in meaning. This is brought out by Barthes (1977) in his semiotic and post-structuralist theories, and further supported by studies of individual differences in language comprehension done by Kintsch (2000). These theories underline that metaphors can carry multiple meanings depending on the context and cognitive processes of the individual. Moreover, cultural and social factors are found potent in influencing how metaphors are perceived. Geertz (1973) and Fiske & Taylor (1991) demonstrate how cultural knowledge of the social schemas impacts on metaphorical interpretations as would be witnessed in case of relating the cafe to the fashion elite. All these insights taken together demonstrate the type of complexity and diversity that characterizes metaphor interpretation.

Table 9. Participants' Interpretations of the Linguistic Metaphor 9

Participant	Participants' Interpretation Without Context	Participants' Interpretation With Context
A	The rumors were too much.	Hot new places in Paris often does not fit into the trend or be noticed by the people.
B	I am lost; I don't know where I am heading in this life.	Reach its peak.
C	It is too much too handle.	It is not relevant or famous in a sense that people forgotten it which leads it to close.
D	Someone burst out because it is too much.	Cannot easily be known.
E	Rumors were spread throughout the country.	Didn't get known by some.
F	An emotion that is kept for too long that eventually exploded.	A new place will never be known to everybody.
G	A ship got lost its direction.	Explode onto the place.
H	The emerging artist's unique style and powerful storytelling in their latest exhibition.	Hot new places in Paris don't disappear to the location even if it is two months.

*** WO9. *It exploded onto the radar.*

***WC9. *"Unlike cities like New York and London, hot new places in Paris don't often explode onto the radar and disappear two months later in quick rotation*". PM: EXISTENCE IS VISIBILITY

Table 9 illustrates how participants interpreted the metaphor 'It exploded onto the radar.' Without context, Participants A, C, D, F, and G predominantly associated the metaphor with sudden, intense, or overwhelming experiences, while Participant B associated it on themes of confusion or loss. However, when given the Parisian context, the focus shifted to the idea of sudden and significant public attention or popularity, with participants linking the metaphor to the rapid rise and potential decline of new trends or places in Paris. Still, variations persisted, like the interpretations of not fitting into the trend or enduring popularity (Participants A and H).

These results aligned with the studies of Boers & Littlemore (2000) and Gibbs (1994) which detailed that metaphorical understandings have been shown to be narrowed down by a context that takes a general meaning and makes it specific for a given situation. Littlemore (2001) and Ortony (1979) also revealed that without context, metaphors can produce a wide array of meanings, as has been shown in divergent responses in the condition absent of the Parisian setting.

Results also show how individual differences may influence metaphor interpretation even when the context is provided. Participants A and H focused on different aspects of popularity, as opposed to majority, suggesting that metaphorical understanding could be driven by personal experiences and cognitive styles which aligned to the results of the studies of Kövecses (2005) and Littlemore (2001).

Table 9 underline huge impact of context on metaphor understanding: it steers participants' understandings toward more specific and aligned findings, but still allows for individual differences.

Table 10. Participants' Interpretations of the Linguistic Metaphor 10

Participant	Participants' Interpretation Without Context	Participants' Interpretation With Context
A	It vanished in a blink of an eye.	Hot new places in Paris are being forgotten easily.
B	An issue spreads like a wildfire.	Ephemeral/fleeting.
C	It means letting go from a cycle.	It quickly vanished after two, in a sense that people forgotten it which leads it to close.
D	Everything will be taken against you in a snap if you will abuse it.	Easily be bored at the place or just be the fruit of the month.
E	The feeling of fear suddenly vanished.	Went gone in 2 months, real quick like 2 weeks.
F	A feeling of infatuation.	A new place is not famous and it will not be known to everyone; the place is closing.
G	My feelings for him faded instantly the moment I learned he cheated on me.	Vanished quickly after two months.
H	Airo was deeply shocked as the PT is positive; it's like all her dreams popped like bubbles in the sky.	Hot new places were not removed or relocated even after two months.

*** WO10. *It disappeared later in quick rotation.*

*** WC10. *"Unlike cities like New York and London, hot new places in Paris don't often explode onto the radar and disappear two months later in quick rotation" PM: MOMENTS IN TIME ARE OBJECTS IN MOTION ALONG A PATH ("Moving time")*

Table 10 displays how participants interpreted the metaphor 'It disappeared later in quick rotation.' In the absence of context, Participants A, B, C, E and G associated the metaphor to rapid disappearance or fading while Participants D and H associated it with loss of control or intense emotion. When provided with context, association shifted to the transience of fashion and popularity, and this related the metaphor to the short-lived life of new places in Paris. Although this has been the general trend of responses, ideas have ranged from rapid decline at one end to enduring presence at the other as shown in Participants C, E, G and H's responses.

Results from Table 10 demonstrate how metaphor interpretation is very complex in nature, entailing a number of key implications which are borne out by the literature. In particular, the strong role that context plays in shaping meaning jibes with research by Gernsbacher & Kaschak (2003), which underlined how context helps construct meaning and understand language. The fact that the participants' answers differed even when a unique context was provided supports Gibbs 1994, who showed that metaphors in themselves are open to multiple readings and may provoke different responses due to the unique perspective of every person. However, these interpretations were also filtered through some cultural and social influences, as in this case of the Parisian setting, which confirms the idea by Kövecses 2005, who proved that different cultural backgrounds may shape metaphor understanding differently. Although generally applicable, the metaphor cannot express the full nuance of rapid change. This is supported by Lakoff and Johnson, who said in 1980 that metaphors can

express general concepts but might not embrace all specific details about a phenomenon. These studies collectively underline the importance of context, individual differences, and cultural impacts in the analysis of metaphorical language.

6. Conclusions

This study shows that metaphors are much more context-dependent in usage. Most participants, when the context was absent, treated metaphors literally and lost their metaphorical meanings. When contextual information were added, participants showed deepened understanding and revealed more abstract and culturally nuanced interpretations. This shift in comprehension reveals that it is through context that one comes to clarify the intended message and map complex emotional, social, and conceptual frames onto the metaphorical language. These results are in line with the conclusions of the earlier studies on psycholinguistic processing of metaphors, thus standing firmly for the idea that metaphor comprehension depends on the availability of contextual clues.

7. Recommendations

Based on the findings, it is recommended that more importance should be laid on teaching the need for using context in understanding metaphors, especially for a second language learner. In such a case, it might make a huge difference when a metaphor is introduced to comprehension and lowers the likelihood of misunderstanding. Future studies might concentrate on cognitive shifts while making a change from literal to figurative meaning in diverse cultures. Finally, it would be highly beneficial to have preparatory educational material with more contextual metaphor exercises to empower learners with the task of deciphering metaphors in live communication.

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