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War and liar: a semiotic account of metaphors in the reports on the discharge of Fukushima nuclear-contaminated water in Chinese media

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Abstract: The release of nuclear wastewater by Japan has generated strong opposition from Japanese citizens, governments of neighboring countries, and global environmental advocates. China, representing the concerns of neighboring countries, has underscored the illicit and detrimental nature of this action. This study explores the metaphors employed in Chinese media regarding the discharge of Fukushima nuclear-contaminated water. Based on the self-built corpus, we reveal the rhetorical motives underlying the metaphors, drawing on the framework of critical metaphor analysis. The study centers on two major metaphors – war and liar metaphors – in the discourse of two Chinese official media, *China Daily* and *People's Daily Online*. It is found that according to Chinese media, initiating and protesting the discharge of Fukushima nuclear-contaminated water is a war; and that the Japanese government and TEPCO are liars. The metaphor choices reflect China's stance of opposition and condemnation against the discharge and its intention of uncovering deceptive and misleading information.

Keywords: metaphor; Critical Metaphor Analysis; Fukushima nuclear water discharge; Chinese media

1 Introduction

On March, 11, 2011, a massive 9.0 magnitude earthquake struck the offshore of Fukushima Prefecture, Japan, triggering a tsunami that resulted in severe nuclear-contaminated water leaking from the nuclear power plant in Fukushima Daiichi. Ten years later, on April, 13, 2021, despite domestic opposition and objection from neighboring countries, the Japanese government decided to release more than one

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million tons of radioactive wastewater from the wrecked nuclear power plant in Fukushima into the sea in 2023 (CNN 2021), which is the least costly of five solutions to cope with the storage of contaminated water. On July, 4, 2023, Tokyo Electric Power Company (TEPCO) received the “endorsement” of the International Atomic Energy Agency, which assessed that “the discharge plan is in line with international safety standards” (Chen 2023, p. 61). To date, Japan has conducted four rounds of wastewater discharge, and the specific timeline of these events is provided in Table 1. The discharge of nuclear wastewater is expected to last up to more than three decades, which raises fears and concerns in the international community. The potential spread of radioactive contaminants through ocean currents poses serious risks to marine ecosystems, public health, the livelihoods of coastal communities, and the well-being of future generations.

Scholars of neighboring countries have pinpointed the illegality of Japan’s discharge plan. Chen and Xu (2022) hold that the plan violates several international conventions, customary international laws, and general principles of law. In a similar vein, Kim (2022) claims that it is against Article 1.4.1.1 of the London Protocol. Li and Zhang (2023, p. 16) highlight that “Japan’s discharge of nuclear-contaminated water into the sea is not a one-time event but rather an ongoing activity” and this discharge contravenes “obligations erga omnes” and constitutes a breach of international law. Japan’s international counter-propaganda activities are criticized as deceptive, hypocritical, and harmful (Liu 2023). In addition, Japan’s plan has also received strong opposition from the international community. The Director-General of the Department of Arms Control of the Foreign Ministry condemns that the disposal of nuclear-contaminated water is “by no means Japan’s private matter” and “driven by selfish interests” (Pan 2023, p. 2). However, as a global environmental risk and social crisis, the discharge incident has not attained due attention from Western scholars. It is necessary to scrutinize the discourse of states expressing dissent on this event and delve into the underlying reasons and motives for their opposing viewpoints.

Media discourse influences and even shapes the public’s cognition of a particular event. According to McNair (1998), news serves as a pivotal mediating force in the human experience at a macroscopic level, while at a microscopic level, it embodies a dual role as both a crafted narrative shaped by its authors and an influential

Table 1: The timeline of the 4 rounds of discharge.

	First round	Second round	Third round	Fourth round
Start date	August, 24, 2023	October, 5, 2023	November, 2, 2023	February, 28, 2024
End date	September, 11, 2023	October, 23, 2023	November, 20, 2023	March, 17, 2024
Time span	19 days	19 days	19 days	19 days

ideological agent. It operates not only as a conveyer of factual information but also as a medium for imparting specific modes of comprehension and interpretation regarding relevant information. Gans (1979, p. 40) states that “Journalism is, like sociology, an empirical discipline. Like other empirical disciplines, the news does not limit itself to reality judgments; it also contains values, or preference statements.” Jing (2004) holds that mainstream media are characterized by their substantial impact on public opinion in society. They are oriented toward the prevailing norms and values of the societal mainstream and are principally anchored in promoting public interests. Mainstream external publicity media can convey to the international audience the policies, national positions, and values of the country. They also focus on the common interests of the public and advocate for unity and cooperation. Therefore, the discourse of Chinese state-run publicity media is selected as the object to explore the use of metaphors and reveal the rhetorical motives implicit in them.

2 Literature review

Metaphor has been treated as a rhetorical device since ancient Greece when Aristotle categorized it as a figure of resemblance. In the twentieth century, the cognitive perspective took the stage in the studies of metaphor. The conceptual metaphor theory proposed by Lakoff and Johnson in 1980 was a major turning point, marking a new era in the cognitive study of metaphor. According to them, metaphors “form coherent systems in terms of which we conceptualize our experiences” (Lakoff and Johnson 1980, p. 34). In the following decades, the development of metaphors extended to the discipline of social science, deliberate use of metaphor, and metaphor in discourse and communication (Steen 2011), among them the analysis of discourse metaphors stands out as a tool to uncover people’s ideas, attitudes, and values (Cameron et al. 2009). Discourse provides a fertile ground for studying the political and ideological functions of metaphor. As for media discourse, metaphors can shape media language and account for seemingly incoherent media discourse (Kövecses 2018). It is worth noting that the ability to convey ideology empowers media discourse to influence the public’s understanding and evaluation of specific issues or events. In those media discourses dominated by textual expressions, scholars have analyzed the use of metaphors in media discourse to explore the ideology, national stance, and other issues behind metaphors. The discourse categories encapsulate the media discourse on politics (Jansen and Sabo 1994; Semino and Masci 1996), economy (Bickes et al. 2014; Charteris-Black and Ennis 2001; Koller 2005; Riad and Vaara 2011), migration and immigration (Ana 1999; McGuire and Canales 2010; Moullagaliev and Khismatullina 2017), military public relations (Solopova and Koshkarova 2021), communication (DeLuca and Peeples 2002), and

social issues (Marshall and Shapiro 2018). In the realm of semiotics, the study of metaphor encompasses an exploration of broader modes of media. For example, comics, hand-drawn pamphlets, and animated films employ visual elements, text, and narrative to convey information, serving as a medium to express stories, viewpoints, or messages. El-Falaky (2023) scrutinizes visual metaphors within representations of Islamic identity in hand-drawn sketches. Metaphorical manipulation and representation of visual elements are also explored in the cartoons regarding the Academic Staff Union of Universities strikes in selected Nigerian newspapers (Makinde 2023). Zhao and Wu (2023) study how political cartoons depict the energy crisis during the COVID-19 and the Ukraine war. They find that cartoons use visual and verbal tools like metonymy, metaphor, and narrative to help people understand and form opinions about the crisis. The studies of metaphor in media discourse have covered diverse discourse categories and a wide range of media forms, leading to fruitful outcomes on the whole.

Studies on the metaphors in media discourse in China have pervaded areas of politics (Chen 2018; Huang 2006; Huang and Wu 2009), economy (Hu and Xu 2017, 2019), international initiatives (Shan 2017; Xin and Shan 2018), national image (Gan 2011; Wang and Xin 2019), public health emergency (Dong 2020; Li 2014; Sun 2012; Zhang et al. 2015; Zhou and Lin 2010), sports (Dong and Yang 2007; Zhang and Zheng 2007), climate change (Chen 2016; Lin 2016; Wei 2011), and education (Wu et al. 2023). For instance, by analyzing the metaphors of the South China Sea issue in Chinese and the U.S. media reports, Gan (2011) finds that different self and other national images are built in the media of the two countries, using roughly the same types of metaphors with different rhetorical intentions. Aiming at SARS and H7N9 avian influenza, Zhang et al. (2015) explore the metaphor frames of media coverage of public health emergencies and note that metaphor frames can influence social ideology and correlate discourse with deep values. Therefore, they suggest that the official media should choose a metaphor frame that could construct the audience's mental status and match the psychological needs of the society, to enhance its persuasiveness and impressiveness. Economic media discourse is another important target of metaphor studies in China, Hu and Xu (2017) compare the economic metaphors in Chinese and English economic magazines and point out that the core reason for the similarities in economic metaphors in the two language discourses is the common embodied constructivism of human cognition. Apart from the notable attention given to climate issues, research on metaphors embedded within media discourse about other types of natural disasters fails to generate significant scholarly interest. Scholars compare the use of metaphors in the media of China and the U.S. Among them, Wei (2011) focuses on elucidating the similarities and distinctions of metaphors used in the discourse surrounding climate negotiations and delve into the underlying ideologies that contribute to these divergences in metaphorical usage, and Lin (2016) attempts

to map out the respective environmental images of the two countries. Except for climate topics, Fu (2010) explores the conceptual metaphor applied in the reports of the Wenchuan earthquake in China.

Over the years, studies on natural disasters have become active in international contexts. The climate issue is also a hot topic in the field of metaphorical studies. Atanasova and Koteyko (2017), for instance, study different metaphors used in British online newspapers *Guardian Online* and *Mail Online* with the approach of critical metaphor analysis (CMA) (Charteris-Black 2004). Scholars have pointed out that British newspapers are critical of climate change in their coverage of 2003–2008, using religion as a metaphor to denigrate climate change (Woods et al. 2012). Luokkanen et al. (2014) reveal that metaphors can enhance a storyline related to policy, but the number of metaphors is limited in purely descriptive narratives. Researchers have exemplified a singular metaphor within the realm of climate discourse. For instance, the metaphor of “tipping point” is scrutinized to elucidate its significance, demonstrating how its versatile utility has been broadened and diversified through the interaction between scientific discourse and news media (van der Hel et al. 2018). In terms of earthquakes, Atsumi et al. (2019) discuss how researchers and survivors of the Niigata-Chuetsu earthquake in a small village collaborate to affect disaster recovery through the generative power of metaphor. Scholars also analyze the war and apocalypse metaphors used in the earthquake and pandemic media discourse (Lacković et al. 2021) and other discourses of natural disasters such as water pollution (Köseoğlu 2017), aquatic pharmaceutical pollution (Millarhouse et al. 2020), and the like.

All in all, in both Chinese and English studies on the metaphors in the discourse of natural disaster, climate issues and earthquakes lie in the heart of these studies. In comparison, in the English world, current studies encompass a wider range of topics with fruitful publications. However, there is still a lack of research on metaphors in the discourse concerning Japan’s nuclear wastewater discharge into the sea which may exert an impact on the marine environment. Therefore, this study attempts to explore the metaphors used in Chinese media discourse regarding this event, drawing on the approach of CMA.

CMA, put forward by Charteris-Black (2004), is closely related to critical discourse analysis (CDA), in which discourse is not only a sole container of ideologies but also a social action on its own (Van Dijk 2001). CMA considers metaphor to be a highly influential form of discourse. The metaphors are deliberately selected to influence ideologies among the audience. CMA is adopted to illustrate the ideological implications and underlying purposes of the author’s choice of metaphors. The application of CMA in academic studies has progressively broadened its scope from political discourse to various forms of discourse, encompassing areas such as economy, healthcare, and education, thereby indicating a diverse and burgeoning

research trajectory. Among them, media discourse emerges as an important corpus. For example, scholars (Liu and Li 2022; Xu 2023) investigate the COVID-19 metaphors in Chinese and English social media. Song and Wang (2024) analyze the ideology behind the metaphors in the U.S. economic coverage of China through a self-constructed diachronic corpus. With the CMA approach, Montagut (2020) explores how the Spanish media utilizes metaphors to construct a framework for the European refugee crisis. Using Brexit as a case study, Sun and Xiong (2022) examine the employment of metaphors in the political discourse. They argue that CMA offers a comprehensive framework for elucidating the underlying meanings within discourse and uncovering information that transcends language. In previous studies, CMA has demonstrated significant efficacy in the analysis of metaphors within media discourse, thus this study also employs this approach to ferret out the motives of the authors, communicative purposes, and the national stance by analyzing the usage of metaphors in the reports on nuclear-contaminated water discharge in Chinese media.

It is crucial to first analyze the context where the metaphor appears. Three steps are involved in CMA (Charteris-Black 2004): metaphor identification, metaphor interpretation, and metaphor explanation. Through these steps, the following questions will be addressed:

- i. What types of metaphors are used in the reports on the discharge of Fukushima nuclear-contaminated water in Chinese media? What are their proportions?
- ii. What are the semiotic features of the metaphors in these reports?
- iii. What motives exist behind the metaphors in these reports?

3 Data and methods

The data used for this study consists of the online reports published between July, 1, 2023 and November, 1, 2023 in two Chinese official media, *China Daily* (www.chinadaily.com.cn) and *People's Daily Online* (www.people.com.cn). These discourses serve as a fertile ground for studying metaphors because the media sorted are well-known in China and entail certain influential power internationally. In addition, the texts involve several genres such as news, reports, and commentaries. The time span of the research corpus is four months. In July, before Japan's discharge, a flurry of media started to report and resist this event. The most concentrated coverages were in August and September, and until the end of the fourth round of the discharge, the Chinese media continued to denounce the conduct.

Our corpus was obtained from the advanced search engines of these two media. We set as filter criteria that the full text should contain at least one of the following keywords: "Fukushima," "nuclear," "discharge," "nuke water," and "toxic water" within the 4-round discharge duration mentioned above. Then the selected reports

were manually examined and screened to ensure the persuasiveness of the corpus, with pure pictures and brief news about statistics eliminated. Finally, we compared the texts from the two websites and removed duplicates. Hundred seventy four most relevant texts with 91,008 words were collected as the data set.

This study employed manual procedures for data analysis for two reasons. First, the self-constructed data set was relatively small and tractable for researchers. Second, with the assistance of MIP, manual identification and annotation could ensure the precision of the study and reduce inaccuracies to the greatest extent. For metaphor identification, MIP, which aims to ascertain whether a particular lexical unit can be considered to express more fundamental contemporary meanings in contexts other than the one in which it originally appears (Pragglejaz Group 2007), was employed in this study. The authors categorized the varieties and types of metaphorical expressions according to the *Master Metaphor List* put forward by Lakoff and his colleagues (1991) and “common source and target domains” listed by Kövecses (2010). All derivations of a verb were put under the same type (e.g., deceive, deception, deceptively). Words under the same source domain were collected to count tokens for that source domain (e.g. tokens of “container metaphor” = tokens of “sewer” + tokens of “dumping ground” + tokens of “trash bin” = $5 + 3 + 1 = 9$). The resonance referred to the productivity of each source domain and was calculated by multiplying the type sum by the token sum (e.g. the resonance of “container metaphor” = $3 \times (5 + 3 + 1) = 27$). Second, to interpret the metaphors, the authors followed the approach outlined by Charteris-Black (2004), wherein they established the conceptual metaphor and identified the source domain. Subsequently, the two authors established and examined the coding of the metaphors, reconciling any contentious coding through deliberation. With the full agreement of both authors, the metaphors selected and analyzed were included in the data. Third, in terms of explanation, emphasis was placed on the contextual factors and pragmatic functions of the metaphors, particularly their role in persuasion and evaluation (Charteris-Black 2004). The metaphors were explained to illustrate China’s stance and attitude toward the discharge and the ideology that the Chinese media wanted to reveal.

4 Results and analysis

4.1 Results

The proportion of metaphor varieties is summarized in Table 2. As it shows, 276 metaphor types were sorted, and 2,309 tokens made up the data set for analysis. The mLFR is 25.34, indicating that there are nearly 25 metaphors on average in every one of 1,000 words and that the media selected are adept in metaphoric writing style.

Table 2: Distribution of metaphors in reports.

Metaphor varieties	Type	Token	Resonance
HUMAN	77	495	18,681
*LIAR	27.90 %	21.44 %	20.50 %
	40	122	4,880
	14.49 %	5.28 %	5.36 %
WAR	65	856	55,640
	23.55 %	37.07 %	61.06 %
DISASTER	23	299	6,877
	8.33 %	12.95 %	7.55 %
JOURNEY	20	220	4,400
	7.25 %	9.53 %	4.83 %
CRIME	14	163	2,282
	5.07 %	7.06 %	2.50 %
MACHINE	12	82	984
	4.35 %	3.55 %	1.08 %
BODY	9	26	234
	3.26 %	1.12 %	0.26 %
CONTAINER	8	15	120
	2.90 %	0.65 %	0.13 %
MONEY	7	20	140
	2.54 %	0.86 %	0.15 %
PLANT	6	8	48
	2.17 %	0.35 %	0.05 %
TRAFFIC	3	25	75
	1.09 %	1.08 %	0.08 %
COLOR	3	9	27
	1.09 %	0.39 %	0.03 %
FANTASY	3	3	9
	1.09 %	0.13 %	0.01 %
CLOTHES	2	2	4
	0.72 %	0.09 %	0.004 %
GOODS	1	17	17
	0.36 %	0.74 %	0.02 %
Other	23	69	1,587
	8.33 %	2.99 %	1.74 %
Total	276	2,309	91,125
mLFR		2,309/91,125 * 1,000 = 25.34	

Note: *As a component of the “human” variety, “liar” is shown separately under “human” because of its large total number and distinctive features which support the necessity to analyze it independently; the data of “human” encapsulate those of “liar.”

As presented in Table 2, the HUMAN metaphor ranks top 1 with 27.90 % (the LIAR metaphor with 14.49 %) of total types, followed by the WAR metaphor with 23.55 %, and DISASTER with 8.33 %. It is worth noting that the types of the LIAR metaphor are even more than the third variety, namely the DISASTER metaphor. In addition, the frequency of tokens affects the lexical strength of words and influences memory representations (Bybee 2006). Thus, in terms of token frequency, the top one variety is the WAR metaphor, followed by the HUMAN metaphor and the DISASTER METAPHOR. Taking these considerations into account, the authors endeavor to discuss the WAR metaphor and LIAR metaphor concerning the discharge of Fukushima nuclear-contaminated water in the Chinese media. The discussion sheds light on the underlying rhetorical motives and ideologies. Finally, we will arrive at a nuanced and balanced understanding of the issue.

4.2 Textual analysis

4.2.1 WAR metaphor

As shown in Table 2, the WAR metaphor is indisputably the most dominant variety, accounting for 30.66 % of types, 46.27 % of tokens, and 75.67 % of resonance. Behind the WAR metaphor, the main theme that the Chinese media wants to portray is that initiating and protesting the discharge of Fukushima nuclear-contaminated water is a war. Table 3 below illustrates the specifics of the WAR metaphor.

Table 3: Initiating and protesting the discharge of Fukushima nuclear-contaminated water is a war.

Source domain	Target domain	Tokens
Enemy	Japan government,	Ally,
	Tokyo Electric Power Company (TEPCO)	Attack,
Fighter	People and governments of neighboring countries of Japan,	Backlash,
	Residents of Japan,	Blow,
	Passionate environmentalists around the world	Breakdown,
Neutral	International Atomic Energy Agency (IAEA),	Defend,
	The Western in silence	Embolden,
Battleground	Areas where fighters live,	Fight,
	Cyberspace	Hit,
Weapon	Protest discourses and activities	Protest,
		Safeguard,
		Silence,
		Spark,
		Threat,
		Uphold,
		Violate,
		Weapon,
		etc.

In this war, the Japanese government and TEPCO that initiate the discharge are the enemy. The IAEA that endorses and tacitly approves the discharge and the West that adopts a silent attitude toward this event hold a neutral stance. People and governments of neighboring countries of Japan, residents of Japan, and passionate environmentalists worldwide constitute the fighters. The regions inhabited by the fighters and the digital realm are the main battlegrounds of the war. Fighters resist this conduct with protest discourses and activities as weapons. See the following example:

- (1) The two sides involved in this **struggle** are not China and Japan; instead, it is a **battle** between all individuals worldwide who value the environment and those entities such as the Japanese government, TEPCO, and others who pose significant environmental risks.¹

(People's Daily Online, August, 30, 2023)

The metaphors identified in this example are “STRUGGLE” and “BATTLE.” They refer to the conflict between two opposing sides in a war. The metaphorical interpretation of “struggle” and “battle” suggest a significant conflict and disagreement on the issue of sea discharge. However, the discourse goes beyond a literal interpretation by suggesting that the struggle is not merely between two countries (China and Japan) but rather between broader groups of individuals and entities. The mention of “all individuals worldwide who value the environment” implies a global community’s concern about environmental issues and indicates that they are the fighters in this war. On the other side of the struggle and the battle are specific entities such as the Japanese government and TEPCO, which play the role of enemy. When it comes to metaphor explanation, the interpretation of “STRUGGLE” or “BATTLE” should expand beyond its superficial level. While the discourse initially presents the struggle as a war between China and Japan, it reveals in the following sentences that the real battle transcends national boundaries. Instead, it portrays a broader ideological war between those who prioritize environmental protection and those whose actions pose great risks to the environment. By framing the metaphor in this way, the discourse invites readers to consider the global implications of the discharge of nuclear-contaminated water and the responsibility of both individuals and institutions in addressing them. This example demonstrates the confrontation between the opposing factions within the WAR metaphor, and the following example will undertake an analytical exploration centering on the attitude of neutral entities amidst the conflict.

¹ Source: <http://en.people.cn/n3/2023/0830/c90000-20065339.html>. Accessed November 2, 2023.

- (2) Western politicians and media outlets like to lecture the world on how to protect oceans, human rights and human life, but when the largest environmental crime is being committed in front of the whole world, they have **turned a blind eye to the crime**. Their **silence is truly deafening**. People around the world can see their despicable hypocrisy and double standard.²

(*China Daily*, August, 24, 2023)

The first metaphor in this discourse is “TURNED A BLIND EYE.” This metaphorical expression refers to a deliberate act of ignoring or overlooking something, typically a problem or wrongdoing. In addition, the metaphorical reference to “DEAFENING SILENCE” emphasizes the conspicuous absence of response or action. The interpretation of “TURNED A BLIND EYE” implies that Western politicians and media outlets are ignoring or neglecting the plan of unclear-contaminated water discharge. This suggests a sense of moral failing and hypocrisy on the part of the West which acts as neutral in the war. They are portrayed as failing to uphold the values they espouse such as the protection of oceans, human rights, and human life. The metaphor “DEAFENING SILENCE” underscores the magnitude of their inaction and the contrast between their professed values and their behavior. In the explanation step, the metaphors are considered to highlight the perceived hypocrisy of Western politicians and media outlets regarding the discharge issue. Their neutral attitude toward this risky plan emphasizes the contrast between their words and actions, suggesting a betrayal of trust and integrity. Overall, by adopting these metaphors, the media implies that the West’s perceived silence and neglect on this issue undermines their credibility and moral authority on the global environment and human rights. After examining the conflictive implications of the WAR metaphor and the passive involvement of neutral parties, we will turn to the subsequent example which is concerned about the weapons wielded by the active participant in the war.

- (3) The government’s decision **sparked widespread protests** not only in Japan but also in other Asia-Pacific countries. Environmentalists, fishermen, consumer rights advocates and business leaders **warned against** the long-term environmental and public health impact of the release of the nuclear-contaminated water.³

(*China Daily*, October, 5, 2023)

The metaphorical expressions identified in this discourse are “PROTEST” and “WARN.” Weapons symbolize tools or strategies employed by individuals or groups to achieve a specific goal or address a challenge. In this context of the discharge, “protest” and

² Source: <https://www.chinadaily.com.cn/a/202308/24/WS64e6fa53a31035260b81e063.html>. Accessed November 5, 2023.

³ Source: <https://www.chinadaily.com.cn/a/202310/05/WS651e8339a310d2dce4bb9194.html>. Accessed November 5, 2023.

“warning” are framed metaphorically as weapons of those fighters who are opposed to the discharge. The metaphors portray “PROTEST” and “WARNING” as tools used by various stakeholders in the war against nuclear-contaminated water discharge as well as means of resistance and defense against perceived threats to public health and the environment. In the explanation procedure, “PROTEST” and “WARNING” are considered as essential tactics employed by environmentalists, fishermen, consumer rights advocates, and business leaders in response to the government’s decision regarding nuclear-contaminated water discharge. By framing these actions as “weapons of fighters,” the discourse emphasizes the active resistance and mobilization of various stakeholders against what they perceive as a threat to environmental and public health. The metaphorical portrayal of protest and warning as weapons suggests a strategic and coordinated effort to challenge the government’s decision and raise awareness about the long-term consequences of the release of contaminated water. Overall, the discourse highlights the agency and determination of those opposing the decision, positioning them as proactive agents in the ongoing battle against environmental degradation and public health risks.

The utilization of the WAR metaphor embodies China’s resolute stance in addressing the sea discharge. China perceives the instigators of this event and those who keep silent as irresponsible for global life and marine ecosystems. All stakeholders are expected to coalesce and adopt a principled position on the moral and just terrain, aiming not only to denounce but also to eradicate all manifestations of reprehensible conducts.

4.2.2 LIAR metaphor

As highlighted earlier, the types of the LIAR metaphor represent a significant portion of the broader HUMAN metaphor variety, exceeding even the third-ranking DISASTER metaphor in diversity. Given the prevalence of this particular subvariety of metaphors in Chinese media discourse, it is deemed essential to subject it to a comprehensive analysis separately to discern its metaphorical implications (see Table 4). The LIAR metaphor manifests in diverse semiotic forms and acts as a conduit for articulating these allegations. See the following example:

- (4) It (the Japanese government) even attempted to **mislead** the public and international opinion through intensive public relation campaigns both at home and abroad, in order to **create a false impression** that the discharge of nuclear-contaminated water into the sea is safe and harmless.⁴

(*People’s Daily Online*, September, 13, 2023)

⁴ Source: <http://en.people.cn/n3/2023/0913/c90000-20071188.html>. Accessed November 2, 2023.

Table 4: The Japanese government and TEPCO are liars.

Source domain	Target domain	Tokens
Liar	Japanese government	Whitewash, Mislead, Cover up, False, Lie, Disclose,
	TEPCO	Data manipulation, Concealment, Deceive, Hide, Fabricate, Tamper, Dishonesty, etc.

The metaphors identified in the given discourse are “MISLEAD” and “CREATE A FALSE IMPRESSION.” These two expressions contain the meaning of lying and hiding the truth. The metaphor “MISLEAD” suggests that the Japanese government is intentionally providing false or deceptive information to the public and international community regarding the discharge of nuclear-contaminated water. It implies an attempt to lead people away from the truth and toward a misconception. “CREATE A FALSE IMPRESSION” implies that the Japanese government is shaping perceptions to make the discharge of nuclear-contaminated water appear safe and harmless, despite potential risks and dangers. It indicates an intentional effort to influence beliefs and opinions by presenting a misleading description of the issue. It indicates that the metaphors highlight a critical view of the actions of the Japanese government on the discharge issue. By portraying their behavior as attempts to “mislead” and “create a false impression,” the discourse shows a distrust and skepticism toward Japanese official claims. It implies that the government’s communicative strategies are not transparent or truthful and that they are working to downplay the hazards associated with this sea discharge. Above all, these metaphors represent the “liar” image of the Japanese government. This text elucidates the deceptive conduct of the Japanese government, and the following example will delineate the portrayal of TEPCO’s liar image in the reports of the Chinese media.

- (5) In 2021, TEPCO was accused of concealing leaks caused by corroded storage tanks. In September that year, TEPCO was caught hiding damaged Advanced Liquid Processing System filters. In October 2022, TEPCO was revealed to have misled visitors by using faulty radiation detectors to prove the safety of “treated” water. ...The long list of data manipulation by TEPCO exposed to the public its shocking level of deception.⁵
(*China Daily*, October, 30, 2023)

The metaphors identified in this discourse are “CONCEAL,” “HIDE,” “MISLEAD,” “USE FAULTY RADIATION DETECTORS,” “DATA MANIPULATION,” and “DECEPTION.” These metaphors are all about dishonesty. “Concealing leaks” and “hiding damaged filters” suggest that TEPCO intentionally covers up the truth, reflecting a pattern of deception and negligence; “Misled visitors” implies that TEPCO uses inadequate equipment to misrepresent the level of radiation, leading to a false sense of security; “Data manipulation” indicates that TEPCO falsifies data to serve its own interests, further illustrating a pattern of dishonesty; and “Shocking level of deception” emphasizes the extent of TEPCO’s dishonesty. The discourse highlights a series of deceptive actions and practices by TEPCO, portraying the organization as untrustworthy and dishonest. These metaphors used by the media not only delineate specific incidents but also convey a broader narrative about TEPCO’s lack of transparency and integrity in handling nuclear-related issues. Overall, the use of these metaphors confirms the image of TEPCO as a liar. Therefore, given the history of fraud outlined in the discourse, this organization’s claim about the sea discharge is not advisable or trustworthy.

4.2.3 Other metaphor varieties

It is necessary to pay special attention to other representative metaphor varieties which also contribute to understanding the Chinese media’s attitude toward the issue. For example, the third-ranked DISASTER metaphor (type: 8.33 %; token: 12.95 %). The metaphors such as “DAMAGE,” “CATASTROPHE,” and “DEVASTATING” are deployed to depict the serious and far-reaching consequences of nuclear-contaminated water discharge. They highlight the environmental and social harm caused by the discharge as well as the urgency of addressing the issue. These metaphors serve to capture the attention of the audience, evoke emotional fear, and underscore the need for action to prevent or mitigate further harm. In addition, in the fourth-marked JOURNEY metaphor (type: 7.25 %; token: 9.53 %), the tokens like “LONG-TERM,” “LONG TIME-FRAME,” and “LONG RUN” suggest that the sea discharge is depicted as an enduring

5 Source: <https://www.chinadaily.com.cn/a/202310/30/WS653efd48a31090682a5eb59b.html>. Accessed November 5, 2023.

endeavor. They portray the Chinese media's discontent with the prolonged adverse effects anticipated from Japan's plan on both the marine ecosystem and human well-being. They also reflect the Chinese side's steadfast commitment to combating the discharge over an extended period. Finally, in the fifth-marked CRIME metaphor (type: 5.07 %; token: 7.06 %), tokens such as "CONDEMN," "DENUNCIATION," and "SUPERVISE" are employed to characterize the sea discharge as a criminal activity. The use of "condemn" and "denunciation" implies that the public and relevant stakeholders perceive this activity as being intentional and harmful, warranting criticism, and accountability. The call for "strict international supervision" regarding sea disposal suggests a lack of trust in Japanese authorities to manage this process adequately. The use of CRIME metaphors in media discourse serves to shape public perception and elicit emotional responses toward environmental issues. By framing sea discharge as a form of criminal activity, the media aims to evoke a sense of moral outrage and urgency among the audience and decision-makers. All in all, the metaphors examined herein have the potential to shape the audience's perception of the sea discharge, guiding them toward adopting a discerning stance in addressing this illicit and morally reprehensible conduct.

4.3 Semiotic features of WAR and LIAR metaphors in the reports on the discharge in the Chinese media

From Peirce's (2003) semiotic perspective, metaphor functions as a hypoicon, delineating a parallelism with something else. According to Wang and Zhou (2011), hypoicons encapsulate similarity through description, with such similarity comprehensible solely through the cognitive engagement of human beings. This cognitive engagement in metaphor comprehension denotes the interaction among symbols, objects, and interpretants within the contextualization of the source and target domains in metaphors. In the cognitive process of metaphor comprehension, symbols function as mediators involved in the formation of ideologies and cognitive frameworks underpinning metaphorical expressions.

The utilization of the war symbol within the Chinese media can be observed as a strategic tool to frame the discourse surrounding the contentious issue of nuclear-contaminated water discharge. It is notable that the characterization of key stakeholders as "war initiators" and "war antagonists" introduces a discernible bias, influencing readers' emotional engagement with the discourse. The former connotes malevolence, symbolizing a force disrupting environmental equilibrium and human welfare. Conversely, the latter epitomizes righteousness, symbolizing defenders of the environment and human interests against malign forces. Employed as a conduit,

the symbolism of war effectively encapsulates the confrontational dynamics inherent in the sea discharge, thereby augmenting the ideological underpinnings portrayed throughout the discourse.

In addition, the portrayal of the liar symbol has been deftly employed by the Chinese media. A liar is delineated as an individual who deliberately disseminates falsehoods or misleads others by knowingly espousing untruths. Fundamentally, it denotes an individual who veers from veracity in an attempt to beguile. Within the context of the discharge, the Japanese government and TEPCO are castigated as purveyors of deceit due to their obfuscation of nuclear effluent testing data and attendant risks. This symbol serves to imbue the broader readership with an awareness of their duplicitous conduct, thereby potentially engendering an identification with the image of the liar and subsequently influencing their perceptual frameworks.

In conclusion, symbols, as an important participant in the metaphorical cognitive process, play a crucial role in shaping metaphorical expressions. By serving as mediators between abstract concepts and concrete representations, symbols facilitate the understanding of metaphors. They not only convey meanings but also evoke emotions and associations, thereby influencing an individual's cognitive frameworks and ideological perspectives. Through the strategic utilization of symbols such as the war symbol and the liar symbol in media discourse, metaphorical expressions are imbued with depth and resonance, effectively framing complex issues and shaping public perceptions. Thus, symbols serve as powerful tools in the construction and dissemination of metaphors, ultimately shaping how individuals understand and engage with the world around them.

5 Discussion

As Kövecses (2018) emphasizes, conceptual metaphors not only shape media language but also construct virtual realities. Metaphor is deeply rooted in language, thought, and behavior. In the realm of language, metaphor emerges as an essential mechanism through which speakers and writers not only conceptualize the world but also actively construct reality. Within media discourse, metaphor serves as a potent tool to actualize rhetorical motives while deftly conveying intricate ideas and values. Therefore, it is imperative to discern the underlying rhetorical motives driving the deployment of metaphors because they exert considerable influence on shaping individuals' understanding and perception of pertinent issues. Through such critical analysis, the implicit messages and ideological underpinnings communicated to the public via metaphors can be brought to light, facilitating a better understanding of the discourse at hand. By exploring the metaphors used in

Chinese media reports on the Fukushima nuclear water discharge, one can gain insight into the stance and position of the media and the way they may influence the public's opinion on this important issue.

On the one hand, the Chinese media frequently use the *WAR* metaphor to describe Japan's plan for the following four motives. First, by framing the act of discharging nuclear sewage as an act of war, the Chinese media emphasizes the gravity and severity of the action. The metaphors suggest that such a plan is not only harmful but also immoral and illegal, invoking a sense of moral and legal condemnation. Second, the *WAR* metaphor conveys a sense of urgency and importance in opposing Japan's discharge plan. By describing the situation as a war, the media underscores the need for immediate action and highlights the significant implications for human rights, marine ecology, fisheries, and other relevant aspects. Third, the *WAR* metaphor also pays attention to the complexity and difficulty of countering Japan's plan. Just as in a war, there are allies supporting the enemy and neutrals who remain silent or inactive. This characterization underscores the challenges faced by the fighters and acknowledges the need for strategic and concerted efforts to overcome these obstacles. Fourth, depicting the agents behind the plan as "the enemy" implies collective opposition and unity among those who object to the nuclear sewage discharge. Previous research on metaphors about natural disaster has commonly depicted nature as the enemy within the context of *WAR* metaphor. However, the focal point of discourse in this study shifts to the Japanese government and TEPCO as the principal enemies, thus underscoring the anthropogenic dimension of the calamity. By portraying the issue as a battle against a common adversary, the media encourages solidarity and mobilization among various stakeholders to resist and counteract the plan. All in all, the *WAR* metaphor in the discourse of the Chinese media serves to emphasize the necessity and responsibility of opposing the discharge of nuclear-contaminated water into the sea, meanwhile emphasizing the urgency, complexity, and intensity of the current situation.

On the other hand, the *LIAR* metaphor is employed by the Chinese media to depict the image of Japan in this event. This is a new dimension of metaphorical analysis because in the *HUMAN* variety in previous studies, the human behavior "deception" has not been singled out and reclassified as a subvariety, namely the *LIAR* metaphor here. As one of the member countries of the world, Japan has tried to deceive other members with false data and deliberately concealed the serious consequences of its discharge plan. Just as Zhang Yulai, vice-president of the Japan Institute of Nankai University, explained, "Information disclosure is a major challenge because the Japanese government and TEPCO share common interests" (China Daily 2023). The use of the *LIAR* metaphor serves the following three motives. First, by stating that the Japanese side has intentionally misled other countries and concealed the true consequences of its discharge plan, the Chinese media have made people recognize the

fact of Japan's betrayal of mankind. Second, the media's portrayal of the Japanese side as a liar advocates constant criticism and condemnation of Japan's decisions on the discharge issue. By exposing the lies and falsehoods, the Chinese media aims to reveal the truth and mobilize public opinion against this evil plan. Third, the *LIAR* metaphor is used to arouse public awareness and resonance and galvanize support for efforts to combat environmental pollution. Above all, the *LIAR* metaphor in Chinese media discourse serves to underline the deceptive and unethical nature of Japan's actions and also emphasizes the need for transparency, truthfulness, and collective action to address environmental challenges.

Aside from the two primary metaphor varieties, additional metaphors such as those of *DISASTER*, *JOURNEY*, and *CRIME* further enhance the portrayal of Japan's decision to the discharge. These metaphors reinforce the destructive consequences, the enduring impact, and the unethical as well as illegal nature of Japan's actions, amplifying the condemnation and critique of this controversial decision.

The reports in the Chinese media on the discharge of nuclear wastewater into the sea are characterized by an adept use of metaphorical language, serving to underscore the gravity of the situation and mobilize public sentiment against Japan's actions. Through the approach of CMA, we uncover a deliberate and strategic selection of metaphors aimed at amplifying the rhetorical motives driving the communication of this pressing environmental issue. These metaphors are not merely rhetorical devices but strategic tools employed by the Chinese media to shape the public's perception of this discharge and to encourage actions from the audience. Through metaphors, the media effectively communicates the urgency of addressing environmental pollution while exposing the deceptive tactics employed by Japan. By tapping into the emotive and symbolic power of metaphor, Chinese media discourse on the discharge resonates with audiences, trying to inspire collective resistance against ecological threats and to foster a sense of shared responsibility toward environmental stewardship.

6 Conclusions

Based on the analysis of the self-established corpus, this study discerned the pervasive use of various metaphors in Chinese media coverage surrounding the Fukushima nuclear-contaminated water discharge. Notably, the *WAR* metaphor and the *HUMAN* metaphor emerged as prominent thematic strands, collectively constituting a substantial portion of the discourse. Of particular significance within the realm of *HUMAN* metaphors is the metaphorical portrayal of deceit, exemplified by the invocation of the *LIAR* metaphor. We contend that these metaphorical expressions

exert considerable influence on the Chinese media landscape due to the contentious nature of the sea discharge decision and the perceived inconsistency and lack of accountability in the Japanese side's messaging on this matter.

Compared with the traditional and popular categories of metaphor in the media discourse of natural disasters, this study pays special attention to the use of the LIAR metaphor because of the artificiality and particularity of the event. And the war is no longer between man and nature but between two sides that hold different opinions on the discharge. In addition, this study encapsulates the semiotic features of these two metaphors and emphasizes the significance of symbols in the cognitive process of metaphors. Due to the limitation of corpus size and collection scope, this study is devoid of criticality and comprehensiveness. Thus, it calls for future research on the depiction of the metaphorical use of discourse in other aspects. First, an exploration of the metaphors reflected in comics depicting Japan's sea discharge issue from a semiotic perspective is needed. Second, a comparative analysis may be conducted between different types of metaphors used in various regions or cultures on the sea discharge. It could offer valuable insights into how perceptions and narratives differ based on cultural backgrounds and social norms. Third, a comparative study should be conducted to examine the propensity for metaphorical usage within discourse across various media platforms, which may discern the different impact of distinct stylistic and rhetorical characteristics inherent to each medium on their metaphorical representation of the discharge.

References

- Ana, O. Santa 1999. 'Like an animal I was treated': Anti-immigrant metaphor in US public discourse. *Discourse & Society* 10(2). 191–224.
- Atanasova, Dimitrinka & Nelya Kotevko. 2017. Metaphors in *Guardian* online and *Mail* online opinion-page content on climate change: War, religion, and politics. *Environmental Communication* 11(4). 452–469.
- Atsumi, Tomohide, Yoshihiro Seki & Hironori Yamaguchi. 2019. The generative power of metaphor: Long-term action research on disaster recovery in a small Japanese village. *Disasters* 43. 355–371.
- Bickes, Hans, Tina Otten & Laura Chelsea Weymann. 2014. The financial crisis in the German and English press: Metaphorical structures in the media coverage on Greece, Spain and Italy. *Discourse & Society* 25(4). 424–445.
- Bybee, Joan (ed.). 2006. *Frequency of use and the organization of language*. Oxford: Oxford University Press.
- Cameron, Lynne, Robert Maslen, Zazie Todd, John Maule, Peter Stratton & Neil Stanley. 2009. The discourse dynamics approach to metaphor and metaphor-led discourse analysis. *Metaphor & Symbol* 24(2). 63–89.
- Charteris-Black, Jonathan. 2004. *Corpus approaches to critical metaphor analysis*. Basingstoke & New York: Palgrave Macmillan.
- Charteris-Black, Jonathan & Timothy Ennis. 2001. A comparative study of metaphor in Spanish and English financial reporting. *English for Specific Purposes* 20(3). 249–266.

- Chen, Hong. 2018. 俄罗斯主流媒体政治话语中政治隐喻的批评隐喻分析 (2000–2016) [Critical metaphor analysis of political metaphors in political discourse in Russian mainstream media (2000–2016)]. 东北亚外语研究 [*Foreign Language Research in Northeast Asia*] 6(3). 3–10.
- Chen, Jingjing. 2016. 新闻媒体中气候变化话语的批评隐喻分析 [A critical metaphorical analysis of climate change discourse in the news media]. 硕士学位论文, 浙江财经大学 [Zhejiang University of Finance & Economics MA thesis].
- Chen, Ke. 2023. 执意将核污水排海, 日本为何一意孤行? [Why is Japan bent on discharging nuclear-contaminated water into the Sea?]. 中国报道 [*Chian Report*] 9. 60–63.
- Chen, Xidi & Qi Xu. 2022. Reflections on international dispute settlement mechanisms for the Fukushima contaminated water discharge. *Ocean & Coastal Management* 226. 106278.
- China Daily. 2023. Mechanism for toxic water release sought. <https://www.chinadaily.com.cn/a/202310/24/WS65372116a31090682a5ea51d.html> (accessed 1 March 2024).
- CNN. 2021. Japan to start releasing treated Fukushima water into sea. <https://www.cnn.com/2021/04/12/asia/japan-fukushima-water-intl-hnk/index.html> (accessed 3 November 2023).
- DeLuca, Kevin Michael & Jennifer Peeples. 2002. From public sphere to public screen: Democracy, activism, and the “violence” of Seattle. *Critical Studies in Media Communication* 19(2). 125–151.
- Dong, Yan. 2020. “隐喻重新框定”视角下西方社交媒体公共讨论中的新冠肺炎疫情话语分析 [A discourse analysis of the new crown pneumonia epidemic in Western social media public discussions from a “metaphorical reframing” perspective]. 外语研究 [*Foreign Languages Research*] 37(6). 36–42.
- Dong, Fangfeng & Yang Yang. 2007. 中国媒体体育报道中的战争隐喻 [War metaphors in Chinese media sports coverage]. 桂林电子科技大学学报 [*Journal of Guilin University of Electronic Technology*] 4. 327–330.
- El-Falaky, May S. 2023. Recovering from cultural blindness: Multimodal positive discourse analysis of metaphors in hand-drawn sketches about Islam. *Language & Semiotic Studies* 9(3). 333–358.
- Fu, Ruifang. 2010. *Conceptual metaphors in disaster news report—a case study of wenchuan earthquake news report*. Wenchuan: ProQuest Dissertations Publishing.
- Gan, Lihao. 2011. 媒介话语分析的认知途径: 中美报道南海问题的隐喻建构 [Cognitive approaches to media discourse analysis: Metaphorical construction of US and Chinese coverage of the south China sea issue]. 国际新闻界 [*Chinese Journal of Journalism & Communication*] 33(8). 83–90.
- Gans, Herbert J. 1979. The messages behind the news. *Columbia Journalism Review* 17(5). 40.
- Hu, Chunyu & Yuting Xu. 2017. 基于汉英媒体语料库的“经济隐喻”对比研究 [A comparative study of “economic metaphors” based on a Chinese-English media corpus]. 外语教学 [*Foreign Language Education*] 38(5). 38–43.
- Hu, Chunyu & Yuting Xu. 2019. 基于汉英经济媒体语料库的植物隐喻研究 [A comparative study of plant metaphor based on the Chinese and English economic media corpus]. 外语教学 [*Foreign Language Education*] 40(6). 44–49.
- Huang, Min. 2006. 隐喻与政治: 《人民日报》元旦社论 (1979–2004) 隐喻框架之考察 [Metaphor and politics: An examination of the metaphorical framework of the New Year’s Day editorials of the *People’s Daily* (1979–2004)]. 修辞学习 [*Contemporary Rhetoric*] 1. 15–23.
- Huang, Qiulin & Benhu Wu. 2009. 政治隐喻的历时分析——基于《人民日报》(1978–2007) 两会社论的研究 [A chronological analysis of political metaphors—A study based on the editorials of the two sessions of *People’s Daily* (1978–2007)]. 语言教学与研究 [*Language Teaching & Linguistic Studies*] 5. 91–96.
- Jansen, Sue C. & Don Sabo. 1994. The sport/war metaphor: Hegemonic masculinity, the Persian Gulf war, and the new world order. *Sociology of Sport Journal* 11(1). 1–17.

- Jing, Gang. 2004. 论主流媒体在议程设置过程中的功能表达 [On the functional expression of mainstream media in the agenda-setting process]. 新闻界 [Journalism & Mass Communication] 3. 48–49.
- Kim, Young Sok. 2022. A review of the application of the London Protocol to the Japanese discharge of Fukushima radioactive contaminated water into the sea. *Law Review* 27(1). 167–187.
- Koller, Veronika. 2005. Critical discourse analysis and social cognition: Evidence from business media discourse. *Discourse & Society* 16(2). 199–224.
- Köseoğlu, Pinar. 2017. An analysis of university students' perceptions of the concepts of “water” and “water pollution” through metaphors. *Eurasia Journal of Mathematics, Science & Technology Education* 13(8). 4343–4350.
- Kövecses, Zoltan. 2010. *Metaphor: A practical introduction*, 2nd edn. New York: Oxford University Press.
- Kövecses, Zoltan. 2018. Metaphor in media language and cognition: A perspective from conceptual metaphor theory. *Lege Artis* 3(1). 124–141.
- Lacković, Stjepan, Mateja Šporčić & Marina Baralić. 2021. War and apocalypse metaphors in media discourse on the pandemic and earthquake in Croatia 2020/2021. *Medijska Istraživanja* 27(2). 37–58.
- Lakoff, George & Mark Johnson. 1980. *Metaphors we live by*. Chicago: The University of Chicago Press.
- Lakoff, George, Jane Espenson & Alan Schwartz. 1991. *Master metaphor list (Second draft copy)*. Berkeley: Cognitive Linguistics Group, University of California Berkeley.
- Li, Hongtao. 2014. 已结束的“战争”走不出的“迷宫”——“SARS十年”纪念报道中的隐喻运用与媒体记忆 [The “war” that has ended and the “Labyrinth” that cannot be escaped: The use of metaphors and media memory in the SARS decade commemorative reporting]. 新闻记者 [Shanghai Journalism Review] 4. 84–93.
- Li, Yuanyuan & Yan Zhang. 2023. 援引日本福岛核污水排海的国家责任——“对一切义务”的视角 [National responsibility for discharging Fukushima nuclear contaminated water into the sea from the perspective of “all obligations”]. 国际经济法学刊 [Journal of International Economic Law] 4. 1–16.
- Lin, Yun. 2016. 中美主流报纸中的隐喻和环境形象构建——以气候大会期间对“全球变暖”议题的报道为例 [Metaphors and environmental image construction in mainstream newspapers in China and the U.S.—The coverage of “global warming” during the climate conference as an example]. 中国报业 [China Newspaper Industry] 8. 42–45.
- Liu, Liu. 2023. 日本强化核污水排海国际反宣传的本质与应对 [The nature of Japan's enhanced international counterpropaganda on nuclear-contaminated water discharge to the sea and responses to it]. 公共外交季刊 [Public Diplomacy Quarterly] 3. 50–57+124–125.
- Liu, Yufeng & Dechao Li. 2022. The US-China battle over coronavirus in the news media: Metaphor transfer as a representation of stance mediation. *Discourse & Society* 33. 456–477.
- Luokkanen, Matti, Suvi Huttunen & Mikael Hildén. 2014. Geoengineering, news media and metaphors: Framing the controversial. *Public Understanding of Science* 23(8). 966–981.
- Makinde, Peter Oyewole. 2023. Visual representation of ASUU strikes in Nigeria: A semiotic analysis of cartoons in selected Nigerian newspapers. *Language & Semiotic Studies* 9(2). 242–262.
- Marshall, Shantal R. & Jenessa R. Shapiro. 2018. When “Scurry” vs. “Hurry” makes the difference: Vermin metaphors, disgust, and anti-immigrant attitudes. *Journal of Social Issues* 74. 774–789.
- McGuire, Sr. Sharon & Mary K. Canales. 2010. Of migrants and metaphors: Disrupting discourses to welcome the stranger. *Advances in Nursing Science* 33(2). 126–142.
- McNair, Brian. 1998. *The sociology of journalism*. London: Arnold.
- Millarhouse, Alexandra Z., Christine Vatovec, Meredith T. Niles & Adrian Ivakhiv. 2020. What's in your body of water? A pilot study using metaphoric framing to reduce the psychological distance in pharmaceutical pollution risk communication. *Environmental Management* 65(5). 630–641.

- Montagut, Marta. 2020. The European refugee crisis discourse in the Spanish press: Mapping humanization and dehumanization frames through metaphors. *International Journal of Communication* 14. 69–91.
- Moullagaliev, Narkiz K. & Lyutsiya G. Khismatullina. 2017. Metaphors in media discourse on migration. *Tarih Kültür ve Sanat Araştırmaları Dergisi* 6(5). 131–138.
- Pan, Xiaolin. 2023. The application of compulsory conciliation in the settlement of disputes over Fukushima contaminated water discharge. *Science Progress* 106(4). 1–22.
- Peirce, Charles Sanders. 2003. *The collected papers of Charles Sanders Peirce*. Cambridge: Harvard University Press.
- Pragglejaz Group. 2007. MIP: A method for identifying metaphorically used words in discourse. *Metaphor & Symbol* 22(1). 1–39.
- Riad, Sally & Eero Vaara. 2011. Varieties of national metonymy in media accounts of international mergers and acquisitions. *Journal of Management Studies* 48. 737–771.
- Semino, Elena & Michela Masci. 1996. Politics is football: Metaphor in the discourse of Silvio Berlusconi in Italy. *Discourse & Society* 7(2). 243–269.
- Shan, Liyang. 2017. 媒体话语的隐喻叙事研究——以美国主流报刊对“一带一路”倡议的隐喻塑造为例 [A study of metaphorical narratives in media discourse—Taking the metaphorical shaping of the Belt and Road Initiative in American mainstream newspapers as an example]. *山东外语教学 [Shandong Foreign Language Teaching]* 38(4). 17–26.
- Solopova, Olga A. & Natalia N. Koshkarova. 2021. Religion as source domain of metaphors in World War II media discourse. *Nauchnyi Dialog* 4. 148–167.
- Song, Yiming & Deliang Wang. 2024. 美国对华经济报道的历时批评隐喻分析 [Diachronic critical metaphor analysis of U.S. economic coverage of China]. *外语研究 [Foreign Languages Research]* 41(2). 14–21+43.
- Steen, Gerard. 2011. The contemporary theory of metaphor—Now new and improved. *Review of Cognitive Linguistics* 1. 26–64.
- Sun, Ya. 2012. 基于语料库方法的隐喻使用研究——以中美媒体甲流新闻为例 [A study on the use of metaphors based on corpus methods—The case of A-Flu news in Chinese and American media]. *外语学刊 [Foreign Language Research]* 1. 51–54.
- Sun, Yi & Jiateng Xiong. 2022. 英国脱欧话语的批评隐喻分析 [Critical metaphor analysis of discourse on Brexit]. *解放军外国语学院学报 [Journal of PLA University of Foreign Languages]* 45(2). 1–9+137+160.
- van der Hel, Sandra, Iina Hellsten & Gerard Steen. 2018. Tipping points and climate change: Metaphor between science and the media. *Environmental Communication* 12(5). 605–620.
- Van Dijk, Tuna. 2001. Critical discourse analysis. In Deborah Schiffrin, Deborah Tannen & Heidi E. Hamilton (eds.), *The Handbook of discourse analysis*, 353–371. London: Blackwell.
- Wang, Hui & Bin Xin. 2019. 美国媒体对中国形象的隐喻建构研究——以“美国退出TPP”相关报道为例 [A study on the metaphorical construction of China's image in the U.S. media—Taking the report on “U.S. withdrawal from the TPP” as an example]. *外语教学 [Foreign Language Education]* 40(3). 32–38.
- Wang, Renhua & Changle Zhou. 2011. 皮尔斯符号学视角下的隐喻及其意义 [Metaphor and its significance under the semiotic perspective of Peirce]. *北京林业大学学报 (社会科学版) [Journal of Beijing Forestry University]* 10(4). 76–81.
- Wei, Kaiwei. 2011. 中美气候谈判报道中隐喻的批评分析 [Metaphors in Chinese and American reports on climate negotiations: A critical analysis]. 汶川 [Wenchuan]: 硕士学位论文, 浙江大学 [Zhejiang University, MA thesis].
- Woods, Ruth, Ana Fernández & Sharon Coen. 2012. The use of religious metaphors by UK newspapers to describe and denigrate climate change. *Public Understanding of Science* 21(3). 323–339.

- Wu, Jia-ni, Yiling Huang & Zhiyong Bai. 2023. “他者凝视”与“自我塑像”——PISA媒体报道中“中国教育形象”的话语生产机制研究 [The other gaze and self-image: A study of the discourse production mechanism of China's education image in PISA media coverage]. 全球教育展望 [Global Education] 7. 35–53.
- Xin, Jing & Bo Shan. 2018. 海外英文媒体对“一带一路”倡议的隐喻建构——基于语料库的跨文化比较研究 [Overseas English media's metaphorical construction of the belt and road initiative: A cross-cultural comparative study based on a corpus]. 现代传播 (中国传媒大学学报) [Modern Communication (Journal of Communication University of China)] 40(6). 36–42.
- Xu, Qingshu. 2023. Comparing COVID-19 metaphors in Chinese and English social media with critical metaphor analysis. *Frontiers in Psychology* 14. 1198265.
- Zhang, Bin & Zhenyou Zhang. 2007. 体育新闻语言中战争隐喻的理据分析 [A rationale analysis of war metaphors in the language of sports news]. 体育文化导刊 [Sports Culture Guide] 1. 25–27.
- Zhang, Wei, Haoran Mao & Shaohua Wang. 2015. 突发公共卫生事件官方媒体报道的隐喻架构分析——基于 SARS 和 H7N9 疫情报道语料 [Analysis of the metaphorical architecture of official media coverage of public health emergencies — Based on the corpus of SARS and H7N9 outbreak coverage]. 福建师范大学学报 (哲学社会科学版) [Journal of Fujian Normal University (Philosophy and Social Sciences Edition)] 2. 100–108+169–170.
- Zhao, Xiufeng & Yuxin Wu. 2023. Oil as narcotic or as medicine: The DISEASE metaphor in political cartoons on energy crisis. *Language & Semiotic Studies* 9(1). 79–103.
- Zhou, Min & Danyan Lin. 2010. 公共卫生危机报道中隐喻的使用与反思——以甲型 H1N1 流感的媒体阐释现象为例 [The use of metaphors and reflection in public health crisis reporting—The phenomenon of media interpretation of influenza A (H1N1) as an example]. 中国健康教育 [Chinese Journal of Health Education] 26(1). 39–42+54.

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