



Neuroethological Interpretations of Animal Mind in Eliot's Practical Cats

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ABSTRACT:

This paper examines the convergence of neuroethology and cognitive literary theory in T. S. Eliot's Old Possum's Book of practical Cats, presenting a innovative interpretation of Eliot's poetic representations of behaviour and consciousness. This research uses a neuroethological framework and for augmenting this paper Lisa Zunshine's Theory of Mind (ToM), serves to provide how Eliot's poems engage readers to attribute the memory, intention, self-awareness to animal characters. This study focuses on the three poems "Macavity: The Mystery Cat", "Gus: The Theatre Cat", and "Skimbleshanks: The Railway Cat" from the Old Possum's Book of practical Cats where the focus tend to explore the feline characters. This study positions Eliot's cat poems as early experiments in representing nonhuman minds and this interdisciplinary approach offers new lens in neuroethological poetics of literary animals by merging neuroscientific understandings of feline behaviour with reader-centered cognitive literary approaches by illustrates the potential of poetry to act as a medium for imaginative interactions with nonhuman neurocognitive realms.

KEYWORDS:

Neuroethology, cognitive literary theory, feline characters, theory of mind (ToM), Non-human minds.

INTRODUCTION:

The portrayal of nonhuman animals in literature has been a forum of artistic experimentation and cultural significance (Burt). From Aesop's fables to modernist poetry, literary works have explored the distinctions between animal and human cognition, usually making the readers to connect the nonhuman characters to cognitive functions. Current multifaceted Methods have started to explore the how texts elicit perceptions of animal consciousness particularly with the combination of literary study and cognitive theory. (Garrard) In this regard of the framework poetry serves as potent medium for such probes, as its compact structure and articulate could vividly stimulate behavioural, sensory and cognitive aspects of nonhuman life.

One of the most prominent lens in the field of exploration is Neuroethology, study of neurological roots of natural animal behaviour (Hoyle; Zeigler and Marler)and while this is applied to literature, this arena provides a pave for relation to scientific insights with textual expression into animal cognition and behaviour. Lisa Zunshine's Theory of Mind (ToM), which explains about the readers determine intentions, emotions and thoughts of nonhuman beings (Zunshine, *Why We Read Fiction*)which is additional compliment for this idea especially in the field of neuroethology. Collectively, these perspectives evicts a twofold attention: emphasizing on how a text evoke the readers to process to project mental states imagination onto animals and how it intergrates behavioural clues based on the real-world animal ethology.

This research utilizes this combined approach to T. S. Eliot's Old Possum's Book of Practical Cats (1939), focusing on the poems "Macavity: The Mystery Cat", "Gus: The Theatre Cat", and "Skimbleshanks: The Railway Cat". In "Macavity: The Mystery Cat" depicts a cat as criminal master with stealth, cunning and strategic evasion whose elusive behaviour illustrates every attempt at capture. "Gus: The Theatre Cat" represents an nostalgic, elder feline who remembers his theatrical career with the blend of themes of performance, memory and the decline of physicality. "Skimbleshanks: The Railway Cat" emphasising responsibility, order and professional pride with the illustration of meticulous and diligent cat whose presence engraves the smooth running of a night train. Altogether, these poems showcase the highly characterised feline figures, each corresponds with a certain behavioural repertoires and associated psychological features. Through the utilization of a neuroethological cognitive literary framework, this investigation demonstrates Eliot poems as early modernist attempts in illustrating nonhuman minds. This multidisciplinary approach seeks to illustrate to the neuroethological poetics of literary animals by demonstrating how poetry can serve as creative collaboration with nonhuman neurocognitive domains.

LITERATURE REVIEW:

As a paradigm for probing how texts decode behavioural indicators rooted in psychological legitimacy in the field of Neuroethology, the study of the neurological aspects of natural animal behaviour which has lately gained significance in literary studies (Hoyle; Zeigler and Marler). Studies such as A Perspective on Neuroethology: What the Past Teaches Us About the Future (Hoyle) and Model Organisms and Systems in Neuroethology (Zeigler and Marler) signifying the integration of evident characteristics of underlying neural mechanisms which can enhance perceptions of animal personality traits in literature. This approach enables it to be probable to examine the feline characters in T. S. Eliot's Old Possum's Book of Practical Cats where it exhibits both traits as well as creative anthropomorphism compatible with species-specific ethology. Behavioural details-Macavity's cleverness Gus's sluggish movements Skimbleshanks's reability are the exemplary of behavioural details which transforms from amusing elements into literary representations of ethological patterns.

Another additional perspective is provoked by Cognitive literary theory, specifically in Lisa Zunshine's in Getting Inside Your Head and The Oxford Handbook of Cognitive Literary Studies, which describes how readers allocates mental emotions to fictional features. In the Empirical studies, the narrative hints enables the readers to decipher emotions, intentions and thoughts (Zunshine, Whalen, and Holquist). which is been explained in the perspective of Whalen, Zunshine, and Holquist's Theory of Mind and Embedding of Perspective. In Eliot's poems, facilitates the theory of mind which involves by combining implicit psychological states with the descriptions of actions. In the Eliot's poems the feline are just the entertaining characters but they are also the complex mental beings which reinforces the combination of cognitive inference and ethological plausibility.

Animals characters can maintain a medium between species authenticity and human – like occupational or social roles (Burke and Copenhaver; Melson)which emphasizes on work on anthropomorphism in literature, including Talking Animals: A Literature Review of Anthropomorphism in Children's Books and Animals as People in Children's Literature. In the accordance with the classic pattern which represents cats who preserve their feline traits and will also perform in human-structured disciplines like theatrical performance, railway management, criminal enterprise. These poems serves as a case study in anthropomorphic technique because of the interaction between human identity and animal behaviour and human identity.

The Semiotic Paradigm in T. S. Eliot's Old Possum's Book of Practical Cats which illustrates how gestures, names and repeated actions interact as representations that express fundamental values or traits (Ropert). For instance, readers detect and mentally understand Skimbleshanks, which showcases the rapidity as a manifestation of control as well as a cognitive orientation towards responsibility and structure and similarly, Macavity's disappearances indicate signal both strategic cleverness and physical elusiveness.

The exposition of poems rhythm, lexical play, reference in the Direct critical studies, especially in the François Ropert's survey and Eliot's Naming of Cats provides a solid foundation for more creative interpretative techniques. The subject matter is broadened by cultural evaluations like the New Yorker's Can Fiction Show Us How Animals Think?, which also deal on modification, acceptance, and the larger societal interest in describing animal minds (Cook). Altogether, these works offer a basis for complementing how Eliot's feline characters functions as the nexus of literary talent, literary artistry, behavioural and cognitive engagement. Drawing from semiotics, anthropomorphism studies, cognitive literary theory, neuroethology, and Eliot criticism, this body of poetry represent how the poems may be seen as initial modernist experiment that depicts readers in creative cross-species empathy while illustrating nonhuman cognition (Zunshine 56; Burke 141).

METHODOLOGY

This research explores T. S. Eliot's Old Possum's Book of Practical Cats employing a qualitative, interpretative approach that combines neuroethology with cognitive literary theory with an emphasis on "Macavity: The Mystery Cat," "Gus: The Theatre Cat," and "Skimbleshanks: The Railway Cat" (Eliot). Additionally, there are two complementary phases to the study. Initially the poems' behavioral hints are identified and analyzed using a neuroethological lens. With reference to sources like A Perspective on Neuroethology and Model Organisms and Systems in Neuroethology, behavioral descriptions-such as Macavity's secrecy, Gus's delayed movements, and Skimbleshanks's punctuality-are contrasted with widely recognized ethological studies on feline behavior (Hoyle 25; Camhi 78). This lends the literary depiction biological legitimacy by enabling the relationship of poetic imagery to realistic species-specific behavioral repertoires.

Furthermore, the readers' interpretations of Eliot's animal characters' mental states are investigated using the theoretical framework of cognitive literary theory, namely Lisa Zunshine's Theory of Mind (ToM). The study requires into consideration how narrative signals that are derived emotions, and role-based

circumstances promote reflection of memory, purpose, and self – awareness onto the feline characters, building on empirical findings from Theory of mind and Embedding of Perspective (Zunshine, Whalen and holquist).

By integrating the two methods through close reading and theme coding, it is achievable to determine interconnections where cognitive engagement and ethological plausibility support one another. This approach indicates how Eliot's poems perform as modernist experiments in representing animal minds by combining empirical realism with psychological attribution (Zunshine 47; Hoyle 30). This stimulates readers in innovative yet physiologically established cross-species empathy.

DISCUSSION AND FINDINGS:

When examined through the paradigms of cognitive literary theory and neuroethology, T. S. Eliot's Old Possum's Book of Practical Cats reveals an extensive illustration of feline identities that indicates an early modernist intent to depict animal awareness. Macavity: The Mystery Cat, Gus: The Theatre Cat, and Skimbleshanks: The Railway Cat are three poems that are employed in this discussion. They all comprise ethological clues within their poetry style, which prompts the reader to utilise Theory of Mind (ToM) procedures to visualize the feline' mental states. (Zunshine 45).

MACAVITY : The Mystery Cat

In Macavity: The Mystery Cat, the repeated refrain - "Macavity's not there!" – acts as a both as rhythmic tool and narrative focus and on absence, which according to ethological terms becomes a sign of avoidance and sneaky behaviour (Eliot 51). As a way to stay from being discovered by predators or prey, Cats in the wild primarily count on concealment, eliminating mobility and odour. By stating, " because he's fiend in feline shape, a monster of depravity," Eliot emphasizes this characteristic and exposes Macavity as a terrifying and unethical personality (Eliot 52). Although the reader perceives a feline to possess intentional maliciousness, this anthropomorphic moral coding enhances the reader's involvement with the text (Zunshine 48).

The hyperbolic statement "He's broken every human law, he breaks the law of gravity" transforms agility into the supernatural, further reinforced by "His powers of levitation would make a fakir stare", (Eliot 53) which mirrors the light- footed and unpredictable locomotion of felids. (Camhi 112). Eliot's description "His coat is dusty from neglect, his whiskers are uncombed" grounds the character in tactile sensory imagery, reminding the reader that this mastermind also exists in a physical body shaped by its environment.

(Eliot 54). Through ToM, Macavity's ability to anticipate and evade "You may seek him in the basement, you may look up in the air" – suggests foresight, a quality associated with higher – order cognition in predator species. (Eliot 55; Zunshine 47).

GUS: The Theatre Cat:

This delivers a psychological and ethological profile that is distinct. His imposing but fragile statement, "His coat's very shabby, he's thin as a rake", and these emphasizes physical deterioration that coincides with biological decline, is how Eliot describes him (Eliot 67). The loving moniker, "His real name, as I've told you, is Asparagus," lends an additional level of intimacy and embodies cultural patterns that foster familiar connections between humans and cats. (Eliot 68)."He has acted with Irving, he's acted with Tree," Gus confidently relates, anchoring his narrative against the legendary legacy of Edwardian theatre (Eliot 69). Ethologically, this dichotomy between a vital past and an impaired present is comparable to investigations on the aging of creatures, which suggest that preserved remembrance frequently coexists with decreasing physically (Hoyle 41; Camhi 188).

While the assertion "I once played Firefrorefiddle, the Fiend of the Fell" expresses cultural importance, (Eliot 70) "At a Shakespeare performance I once walked on part" stimulates his sense of himself as a dominant theatrical personality. (Eliot 71).Gus is placed in an even more stationary urbanized past through the difficult humour of "Now every now and then I have a cup of tea" which highlights the biological reality that animals generally adapt their behaviours in order to maintain resources (Eliot 72; Hoyle 44). ToM's psychological effect is amplified by the reader's assessment of Gus's modest recognition of his own limits physically alongside to his feelings of nostalgic. (Zunshine 46).

SKIMBLESHANKS: The Railway Cat

Eliot concentrates on environmental awareness as well as tough work in his psychological repertory. Skimbleshanks's promptness is emphasized with the initial assertion, "There's a whisper down the line at eleven thirty-nine," (Eliot, *Skimbleshanks* 1. 1) which maintains an explicit schedule. In "The Cat of the Railway Train," his position gets established, instantly blending him into the social structure. In spite of empathizing awareness become a trait similar to psychic ability, Eliot's illustration of "He will watch you without winking and he sees what you are thinking" (Eliot, *Skimbleshanks* 1. 42)mirrors the keen awareness characteristic of possessive felines.

In “He inspects and supervises - when the Night Mail’s ready to depart,” he demonstrates his careful monitoring, drawing comparisons to the actions of feline patrols. (Eliot, *Skimbleshanks* l. 20). Skimble is shown as a stable, reliable presence in his surroundings in the statement, “There’s a cat on the platform and that cat is Skimble.” (Eliot, *Skimbleshanks* l. 53) He hilariously maps a natural feline gesture onto a social signal in “He gives you a wave of his long brown tail,” illustrating his involvement in a sophisticated human system. (Eliot, *Skimbleshanks* l. 60) He even projects the traits of a supervisor upholding order onto him in the line, “He will watch without winking and he’ll see that you are thinking / Of nothing at all but the work you’re supposed to be doing.” (Eliot, *Skimbleshanks* ll. 43–44).

Eliot exhibits a nuanced interaction between species-specific ethology and human projection in all of these poems. Skimbleshanks’s ordered patrol resonates with territorial patrolling; Macavity’s elusive cleverness mimics predator-prey escape methods; and Gus’s nostalgia and fragility represent natural aging processes. (Zunshine 118). However, in each instance, the ethological characteristics are reframed through human cultural settings, such as theater, crime, and railroad job, which serve as metaphors for stories. By requiring readers to switch between acknowledging the animal origins of some behaviors and valuing their humanized reframing, this dual framing encourages long-term engagement with the text. (Whalen and Holquist 77).

Eliot’s lexical and rhythmic choices support behavioral identity: Skimbleshanks’s quick, metrical drive reflects railway speed; Gus’s slower tempo and contemplative lexicon imply nostalgia; and Macavity’s refrain-driven structure emphasizes absence and unpredictability. (Eliot, *Macavity* l. 3) By acting as semiotic clues, these poetic elements allow readers to enjoy the humor and beauty of each cat’s representation while creating mental models of their thought processes (Zunshine 142). The results imply that Eliot’s depictions of cats function as early instances of neuroethological poetics, fusing creative anthropomorphism with scientific realism. The end product is a collection of character studies that invite a multi-layered, cognitively complex interaction with the text. These studies are both culturally relevant in their human analogies and scientifically sound in their portrayal of behavior. (Hoyle 55).

RESULTS

Eliot's feline characters are constructed with a high degree of behavioral specificity and Theory of Mind (ToM) cues, according to an analysis of Macavity: The Mystery Cat, Gus: The Theatre Cat, and Skimbleshanks: The Railway Cat using a framework of combined neuroethological and cognitive literary theory. (Zunshine 37; Hoyle 5). Eliot often employs ethological markers-physical descriptions, behavioral patterns, and movement patterns-that correspond with feline characteristics that have been documented by scientists throughout all three poems. For example, Skimbleshanks's territorial vigilance reflects real-world patrolling behavior, whereas Macavity's stealth and unpredictable nature mimic predator avoidance strategies observed in domestic and wild cats. Gus's grooming habits and physical weakness are indicative of age-related deterioration and self-maintenance practices in older cats.

All three poems require the reader to participate in mental state attribution from a Theory of Mind standpoint. Skimbleshanks encourages awareness of social duty and professional devotion, Gus evokes empathy via his memory recall and nostalgic pride, and Macavity allows the reader to picture his methodical planning and problem-solving. (Whalen and Holquist 81). Overall, the findings show that Eliot's poems serve as early modernist case studies in depicting nonhuman minds, providing a unique harmony between creative anthropomorphism and scientific behavioral plausibility. Because of this, Old Possum's Book of Practical Cats is positioned as a useful literary corpus for multidisciplinary study that connects neuroaesthetics, cognitive literary studies, and ethology. (Ropert 22; Zunshine 115).

REFERENCES:

1. Burt, Jonathan. *Animals in Film*. Reaktion Books, 2002.
2. Burke, Carolyn, and Joanna Copenhaver. *Animals as People in Children's Literature*. Routledge, 2016.
3. Camhi, Jeffrey M. *Neuroethology: Nerve Cells and the Natural Behavior of Animals*. Oxford UP, 1984.
4. Cook, James. "Can Fiction Show Us How Animals Think?" *The New Yorker*, 2013.
5. Eliot, T. S. *Old Possum's Book of Practical Cats*. Faber and Faber, 1939.
6. Garrard, Greg. *Ecocriticism*. 2nd ed., Routledge, 2012.
7. Hoyle, Graham. *A Perspective on Neuroethology*. Springer, 1990.
8. Melson, Gail F. *Why the Wild Things Are: Animals in the Lives of Children*. Harvard UP, 2001.

9. Ropert, François. *Semiotic Paradigm in Eliot: Naming of Cats and Beyond*. Paris UP, 2010.
10. Whalen, Robert, and Michael Holquist, with Lisa Zunshine. "Theory of Mind and the Embedding of Perspective." *The Oxford Handbook of Cognitive Literary Studies*, edited by Lisa Zunshine, Oxford UP, 2015, pp. 169–188.
11. Zeigler, H. Philip, and Peter Marler, editors. *Model Systems in Neuroethology*. Wiley, 1986.
12. Zunshine, Lisa. *Why We Read Fiction: Theory of Mind and the Novel*. Ohio State UP, 2006.