

POR QUE DAMOS NOMES HUMANOS AOS ANIMAIS DE ESTIMAÇÃO? UM ESTUDO SOBRE O PROCESSO ANTROPOMORFISMO DOS ANIMAIS DE ESTIMAÇÃO

WHY DO WE GIVE HUMAN NAMES TO PETS? A STUDY ON THE ANTHROPOMORPHISM PROCESS OF PETS

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Comunicação:

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Objetivo do estudo

Este estudo tem como objetivo investigar as dimensões da relação humano-animal, a conexão entre nomes humanos dados aos animais de estimação e seu reflexo no comportamento do consumidor.

Relevância/originalidade

Uma das descobertas mais importantes deste estudo é a indicação de que as despesas com animais de estimação parecem ser subestimadas nos orçamentos dos donos, a ponto de causar estresse financeiro.

Metodologia/abordagem

Este estudo conduziu uma pesquisa com 690 donos de animais de estimação em todo o país para entender essas relações.

Principais resultados

Os resultados deste artigo avançam na literatura sobre animais de estimação e nomes, mostrando que a estratégia na escolha de nomes de animais de estimação imita a dinâmica do mundo humano, sugerindo uma característica adicional no processo de antropomorfização da relação humano-animal.

Contribuições teóricas/metodológicas

O estudo avança a literatura ao inferir que a estratégia de escolha de nomes de animais de estimação imita a dinâmica do mundo humano, sugerindo uma característica adicional no processo de antropomorfização da relação humano-animal.

Contribuições sociais/para a gestão

O estudo tem contribuições gerenciais importantes, demonstrando que grupos que dão nomes humanos aos animais de estimação tendem a gastar mais com seus animais e sugere que as despesas com animais de estimação são subestimadas nos orçamentos familiares.

Palavras-chave: Comportamento do Consumidor,, Relação humano-animal, Antropomorfismo, Pets, Nome

WHY DO WE GIVE HUMAN NAMES TO PETS? A STUDY ON THE ANTHROPOMORPHISM PROCESS OF PETS

Study purpose

This study aims to investigate the dimensions of the human-animal relationship, the connection between human names given to pets, and its reflection on consumer behavior.

Relevance / originality

One of the most important findings of this study is the indication that pet expenses appear to be underestimated in pet owners' budgets, to the extent that it leads to financial stress.

Methodology / approach

This study conducted a survey of 690 pet owners nationwide to understand these relationships.

Main results

The results of this article advance the literature on pets and names, showing that the strategy in choosing pet names mimics the dynamics of the human world, suggesting an additional characteristic in the anthropomorphizing process of the human-animal relationship.

Theoretical / methodological contributions

The study advances the literature by inferring that the strategy in choosing pet names mimics the dynamics of the human world, suggesting an additional characteristic in the anthropomorphizing process of the human-animal relationship.

Social / management contributions

The study has important managerial contributions, demonstrating that groups who give human names to pets tend to spend more on their animals and suggests that pet expenses are underestimated in family budgets, leading to financial stress for these owners.

Keywords: Consumer Behavior, Human-Animal Relationship, Anthropomorphism, Pets, Name

WHY DO WE GIVE HUMAN NAMES TO PETS? A STUDY ON THE ANTHROPOMORPHISM PROCESS OF PETS

1 INTRODUCTION

In 2018, it was estimated that there were approximately 844 million dogs and cats in the world (Statista, 2024). In the same year, according to UN data (2023), there were 138 million children under the age of one year, resulting in a ratio of more than 8 pets per child under one year old on the planet. By 2022, it was estimated that more than half of the world's population had at least one pet at home (Health for Animals, 2022). In the United States, approximately 70% of households are estimated to have at least one pet (American Pet Products Association, 2023), while in Brazil, approximately 72% of households have a companion animal (Quaest, 2024).

The 2023 pet census in Brazil, which included more than 2.5 million dogs and cats (PetLove, 2023), found that all the top 10 names cited by respondents were human names or human-like nicknames. Another study conducted with 1,009 Brazilian pet owners, showed that 7 out of the top 10 pet names, were human names (PREPLY, 2023). If names serve the purpose of identifying elements of the world, be they people, places, things, or concepts (RABINOVICH, ET AL, 1993), the notable number of pets with human names stands out. Despite this significant number of pets with human names, there is a scarcity of literature on this aspect of the human-animal relationship.

To fill this knowledge gap, this study applied a survey to 690 respondents across Brazil to understand the dimensions of the human-animal relationship, the connections between the names given to pets, and consumer behavior. The results of this article advance the literature on pets and names, showing that the strategy in choosing pet names mimics the dynamics of the human world, suggesting an additional characteristic in the anthropomorphizing process of the human-animal relationship. Simultaneously, the study has important managerial contributions, demonstrating that people who give human names to their pets tend to spend more than other groups. Additionally, the study indicates that pet expenses seem to be underestimated in family budgets, leading to financial stress for these owners.

This article is organized as follows: the first section presents a literature review on the following topics: Pets, the extended self, and the small other; Names; and the dimensions of the human-animal relationship. Next, we explore the methodology used. The penultimate section discusses the results, followed by the final conclusions of the authors.

2 LITERATURE REVIEW

For the theoretical foundation of this work, no literature was found that combined the topics of Pets, the Extended Self and the Small Other; Names; and the Dimensions of the Human-Animal Relationship in a single study. Therefore, these three themes were addressed separately, and their intersections were explored in the results sections.

2.1 Pets, the Self and the Other

According to Thomas (2010), the concept of pets began to develop at the start of the Renaissance, referring to animals that came to be known as pets. The primary requirement for the earliest pet dogs was that they were very small, allowing them to accompany their owners in various social situations (Thomas, 2010). Preferences for pets have varied over time, with demands oscillating based on pedigree, size, fur, exclusivity, and lineage (Ryder, 2019). This evolution reveals how the very concept of pets has been transformed into a component of their owners' lifestyles (Ryder, 2019; Warde, 2005; Bourdieu, 2008).

Warde (2005) posits that the meaning of pets extends beyond their sense as products/objects and their functionality, indicating an intricate system of meanings in the

relationship between the individual, social environment, and the pet itself. Expanding on the debate about this new human-animal relationship, Belk (1996) and Hirschman (1994) observed that pets represent an "extended self" of their owners. Belk (1996) notes that pet owners expect their animals to conform to their personality, family, and lifestyle. Consequently, a wide range of products and services has emerged for pets (Harris 1985; Belk 1989; Sussman 1985; Tuan 1984), mimicking human lifestyles and consumption patterns but transposed into the animal world.

Analyzing Lacan literature (2010), it is evident that pets occupy the psychic sphere of the "small other" concept. According to Lacan, the "small other" refers to other individuals similar to the subject, with whom the subject relates and sees themselves reflected (Lacan, 2010). Napoli (2022) suggests that the individual's relationship with the "small other" is marked by narcissism; when the "small other" acts according to the individual's expectations, it brings happiness and harmony, as the individual seeks a semblance. This quest for similarity can also be observed in the human-animal relationship.

The human-pet relationship suggests that pets are undergoing a pronounced process of de-animalization, followed by humanization (Osório, 2019), making them more suited to urban and residential environments. This elevates pets to the category of "small other," an egoic likeness of their owners. Pets are "trained to modulate their animal impulses until they become gentle companions sitting on home sofas in front of the television: not growling, not barking, smelling pleasant and docile" (Segata, 2012, p. 22).

Pets occupy an extremely ambiguous position between the human and animal spheres (Belk, 1988, 1996; Leach, 1983; Osório, 2019; Ingold, 1995). As Belk (1988) notes, they are both at the same time. "They are neither entirely animals nor fully humans; pets live in a separate category, sometimes anthropomorphized, sometimes (re/hyper) animalized (or zoomorphoses)" (Osório, 2019, p. 58). In a more psychoanalytic view, pet owners' perceptions of their pets operate in a three-dimensional emotional sphere where pets are the Extended Self (Belk, 1996; Hirschman, 1994) and the Small Other (Lacan, 2010; Napoli, 2022).

2.2 Names

The relationship between names and things has long been a significant philosophical debate (Plato, 2013; Aristotle, 1996; Augustine, 2015). However, there seems to be a consensus that names serve the purpose of identifying elements of the world, whether they are people, places, things, or concepts (Rabinovich et al., 1993). Analyzing the logic of people's names, Heller (2003) asserts that no culture or society exists in which individuals are not distinguished from one another by names. Baggio (2005) and Chevalier & Gheerbrant (1991) suggest that names invoke more than identification; they also reflect a dimension of the individual who names.

Historically, many cultures considered names as an inseparable part of their being, often acquiring a sacred character (Rodrigues, 2024; Sztutman, 2010). Currently, names follow a specific logic system in each place. Studying Western societies, Astoria (2008) found that human names follow three patterns: 1) Tribute to a family member; 2) Tribute to a historical figure or celebrity; and 3) Biblical names. In Brazilian society, Rabinovich et al. (1993) identified seven categories of names: 1) Aesthetic; 2) Fantasy; 3) Tribute; 4) Tradition; 5) Brotherhood; 6) Social; and 7) Chance.

A study conducted with 1,009 Brazilian pet owners (PREPLY, 2023) found that 17% chose their pet's name inspired by a movie character, 16% by cartoon characters, and 10% by soap opera characters or actors. According to the 2023 pet census in Brazil, which included more than 2.5 million dogs and cats (PetLove, 2023), the top 10 pet names were divided into: human names; human-like nicknames; fictional human names; and others.

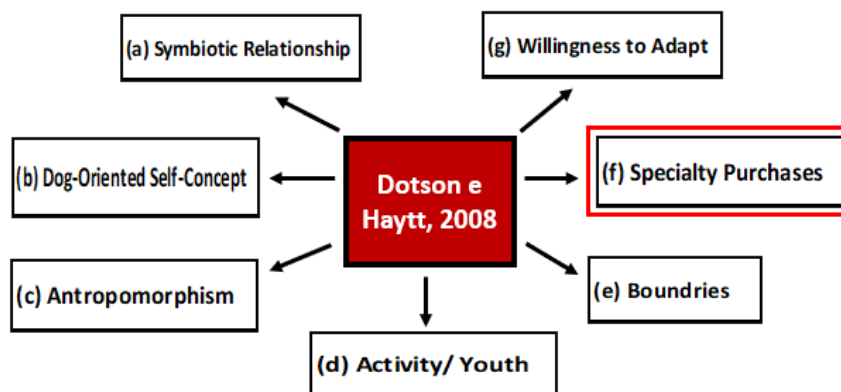
The first conclusion from these data is the notable number of pets with human names. Another observation is the near absence of pets named after objects; for example, no pets were named "chair," "cell phone," or "computer." These data suggest that the naming of pets seems to reproduce the logic of the human world.

If literature shows that names serve to classify elements such as people, places, and things (Rabinovich et al., 1993), the predominance of human names for pet's echoes anthropomorphism literature (Hirschman, 1994; Belk, 1988, 1996; Solomon, 2008; Leach, 1983; Osório, 2019; Ingold, 1995). This adds to a series of anthropomorphized behavior characteristics of pet owners towards their pets (Thomas, 2010; Ryder, 2019; Warde, 2005; Bourdieu, 2008), suggesting the human status these animals are being elevated to in contemporary societies.

2.3 Dimensions of the Human-Animal Relationship

In a pioneering quantitative study attempting to stipulate the main dimensions of the human-animal relationship, Dotson and Hyatt (2008) proposed seven key dimensions that best explain relationships between humans and animals. These are: (1) Symbiotic Relationship; (2) Dog-Oriented Extended Self; (3) Anthropomorphism; (4) Activity/Youthfulness; (5) Barriers; (6) Specialty Purchases; and (7) Willingness to Adapt. See Figure 1 for further details.

Figure 1 – The Seven Dimensions of the Human-Animal Relationship

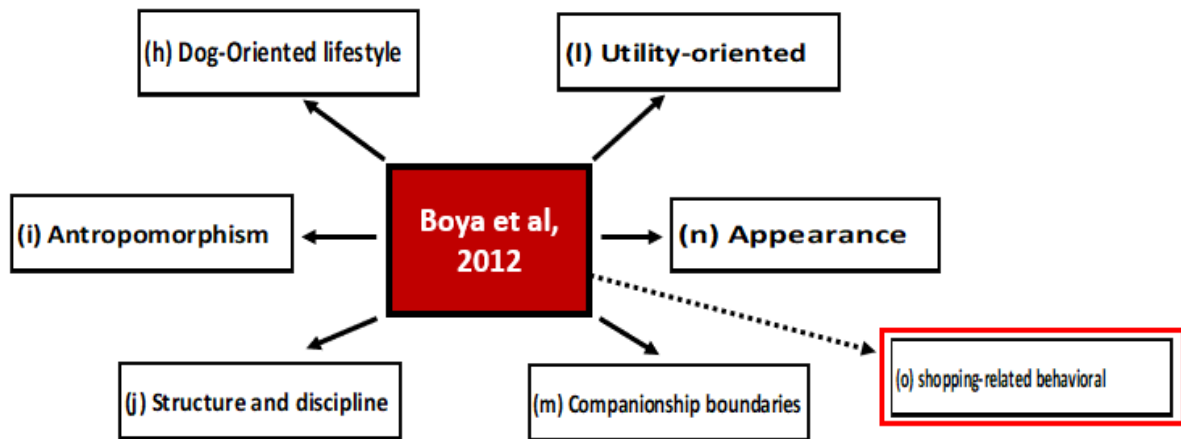


Source: Dotson and Hyatt (2008)

Building on the model designed by Dotson and Hyatt (2008), Boya et al. (2012) proposed that there are six dimensions that best explain the human-animal relationship. These dimensions are: (1) Dog-Oriented Lifestyle; (2) Anthropomorphism; (3) Structure and Discipline; (4) Utility-Oriented; (5) Companionship Limits and Barriers; and (6) Appearance.

One of the major innovations of the model proposed by Boya et al. (2012) was the theoretical framework for what would become the first variables explaining the consumption behavior of pet owners. In Dotson and Hyatt's (2008) study, Special Purchases (Figure 1) was considered a construct or an additional dimension of the human-animal relationship. In Boya et al. (2012), this was referred to as Consumption Behavior. This variable was used to cluster the dimensions of the human-animal relationship in relation to consumption behavior (see Figure 2). For context, Boya et al.'s (2012) article was written in collaboration with Dotson and Hyatt.

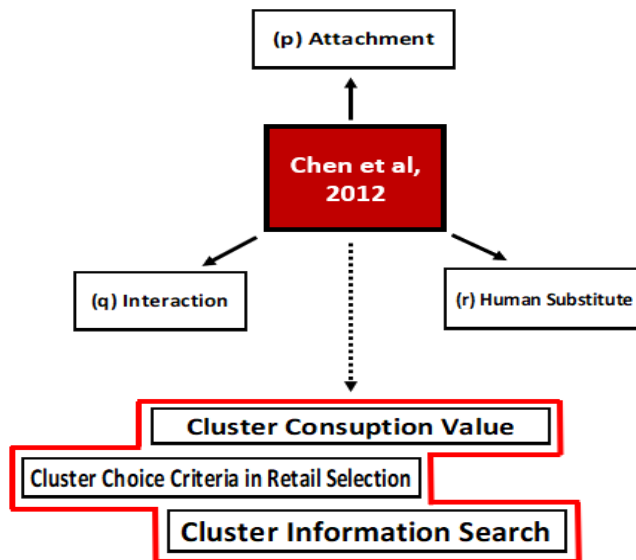
Figure 2 – The Six Dimensions of the Human-Animal Relationship



Source: Boya et al. (2012)

In the model proposed by Chen et al. (2012), there are three types of relationships between humans and pets: Attachment, Interaction, and Human Substitute. These three are closely aligned with what Dotson and Hyatt (2008) and Boya et al. (2012) had proposed. The significant contribution of this new model lies in the consumption behavior of pet owners. The authors segmented pet owners into three clusters: Consumption Value, Information Collection Method, and Retail Choice Criteria. In this sense, Chen et al. (2012) went beyond Dotson, Hyatt, and Boya by clustering pet owners' profiles into specific consumption patterns. See Figure 3 for details.

Figure 3 – The Three Dimensions of the Human-Animal Relationship



Source: Chen et al. (2012)

Given the similarity of some constructs, this work adapted the scales proposed by Dotson and Hyatt (2008), Boya et al. (2012), and Chen et al. (2012). In Frame 1, you can see the description of the main dimensions of the human-animal relationship addressed in the literature, which this work used as references, along with the main characteristics and authors that provided the theoretical framework.

Frame 1 - Description of the Main Dimensions of the Human-Animal Relationship

Dimension of the Human-Animal Relationship	Description	Characteristics	Author
Symbiotic Relationship	A mutually beneficial bond between humans and animals	In such a relationship, the human is happier, less stressed, less lonely, more secure, and calmer, while the dog is treated like a child/person	Dotson and Hyatt, 2008; Boya et al., 2012
Pet-Oriented Lifestyle	The pet is an extension of its owner and seen as the human's best friend	Individuals in this dimension tend to spend less time with other people in general due to their relationship with their pet. However, these individuals may have better relationships with other pet owners. The pet occupies a central role in their lives.	Dotson and Hyatt, 2008; Boya et al., 2012
Anthropomorphism	The pet is perceived as a substitute for a child or a family member and has the power to communicate with humans	Owners scoring high in this dimension are likely to talk to their pets	Dotson and Hyatt, 2008; Holbrook et al., 2001; Hirschman, 1994; Belk, 1996
Structure and Discipline - Utility-Oriented	Pets serve as an incentive to make their owners more physically active	This dimension corresponds to the "childlike and playful" theme of Holbrook et al. (2001). It captures how these owners may feel younger or like children.	Holbrook et al., 2001; Dotson and Hyatt, 2008; Boya et al., 2012; Chen et al., 2012
Companionship - Limits	Reflects the absence of limits imposed on pets by their owners in the home	The pet roams freely around the house, climbs on furniture, and may sleep in bed with its owners. Home configurations may also be adapted for pets.	Dotson and Hyatt, 2008; Boya et al., 2012
Special Purchases	Purchasing behavior	Reveals consumption habits, purchasing behavior, and special efforts to acquire products for pets	Dotson and Hyatt, 2008; Boya et al., 2012
Willingness to Adapt	Analyzes how willing pet owners are to change their lifestyle and consumption patterns to accommodate their pets	These changes can relate to home configuration, vehicle adjustments, and overall consumption changes	Dotson and Hyatt, 2008; Boya et al., 2012
Appearance & Social Value	Analyzes to what extent pet owners choose their pets based on appearance and social acceptance	The pet provides social approval and recognition, and the pet's physical characteristics are predominant	Boya et al., 2012; Chen et al., 2012

Source: The authors (2024)

3 METHOD

To address the central question of this article, which was to understand the main dimensions of the human-animal relationship, their association with the human name given to the pet, and consumer behavior, this article followed these steps: 1) Selection of psychographic scales, validation, and adaptation to the Brazilian market; 2) Conducting the survey with 690 pet owners in Brazil; 3) Data interpretation; 4) Literature review; 5) Interpretation of data; and 6) Writing the results and conclusions. Frame 2 outlines the phases, timeline, approach, and key activities of each stage of the study.

The survey contained eight constructs, which explained the dimensions of the pet-human relationship, they were: Symbiotic Relationship, Pet-oriented, Anthropomorphism, Structure and Discipline - Utility-oriented, Companionship - Limits, Willingness to adapt and Appearance and Social Value. These eight constructs were measured across 69 statements, measured on a five-point scale (Likert Scale).

Frame 2. Study Phases, Timeline, Approach, and Key Activities

Phase	Timeline	Approach	Key Activities
Phase 1	Sep 2022 - Dec 2022	Selection of Psychographic Scales	<ul style="list-style-type: none"> Literature Review of Psychographic Scales Selection of Scales Validation and Adaptation of Psychographic Scales
Phase 2	Jan 2023 - Apr 2023	Conducting the Survey	<ul style="list-style-type: none"> Conducting the Survey across Brazil with 690 respondents
Phase 3	May 2023 - Jun 2023	Interpretation of Survey Data (I)	<ul style="list-style-type: none"> Confirmatory Factor Analysis Cronbach's Alpha Reliability Statistics Clustering of Human-Animal Dimensions
Phase 4	Jul 2023 - Oct 2023	Literature Review	<ul style="list-style-type: none"> Literature Review on Names Literature Review on Pet Names
Phase 5	Oct 2023 - Dec 2023	Interpretation of Survey Data (II)	<ul style="list-style-type: none"> Classification and Subdivision of Pet Names into Groups Relationship between Human-Animal Dimensions, Pet Name Groups, and Average Monthly Expenditure T-Test for Independent Samples
Phase 6	Jan 2024 - Mar 2024	Results and Conclusions	<ul style="list-style-type: none"> Writing the Results and Conclusions

Source: The authors (2024).

The survey also included 23 questions related to the sociodemographic characteristics of the pet owner, the pet, the home and its routine, the pet owner's behavior on social networks and their consumption behavior. There were 22 closed questions and only one open question, which referred to the pet's name. To prepare the layout of the questionnaire for this study, as well as the statements and the choice of scales, three reference studies were taken into consideration (Dotson; Hyatt, 2008; Boya et al., 2012; Chen et al., 2012), that quantitatively explains the dimensions of the animal-human relationship.

Regarding data processing, Jamovi software was used to tabulate and analyze the results. First, we sought to understand the sociodemographic characteristics of pet owners, then an analysis and classification of pet names was carried out. Subsequently, a confirmatory factor analysis and Cronbach's alpha were performed to evaluate the internal consistency of the items and their respective constructs, which measure the dimension of the human-animal relationship. Finally, we performed a T Test for independent samples, to determine the statistical evidence between the dimensions of the human-animal relationship, human names on pets and consumption behavior. The next session presents the results of the analyses.

4 RESULTS

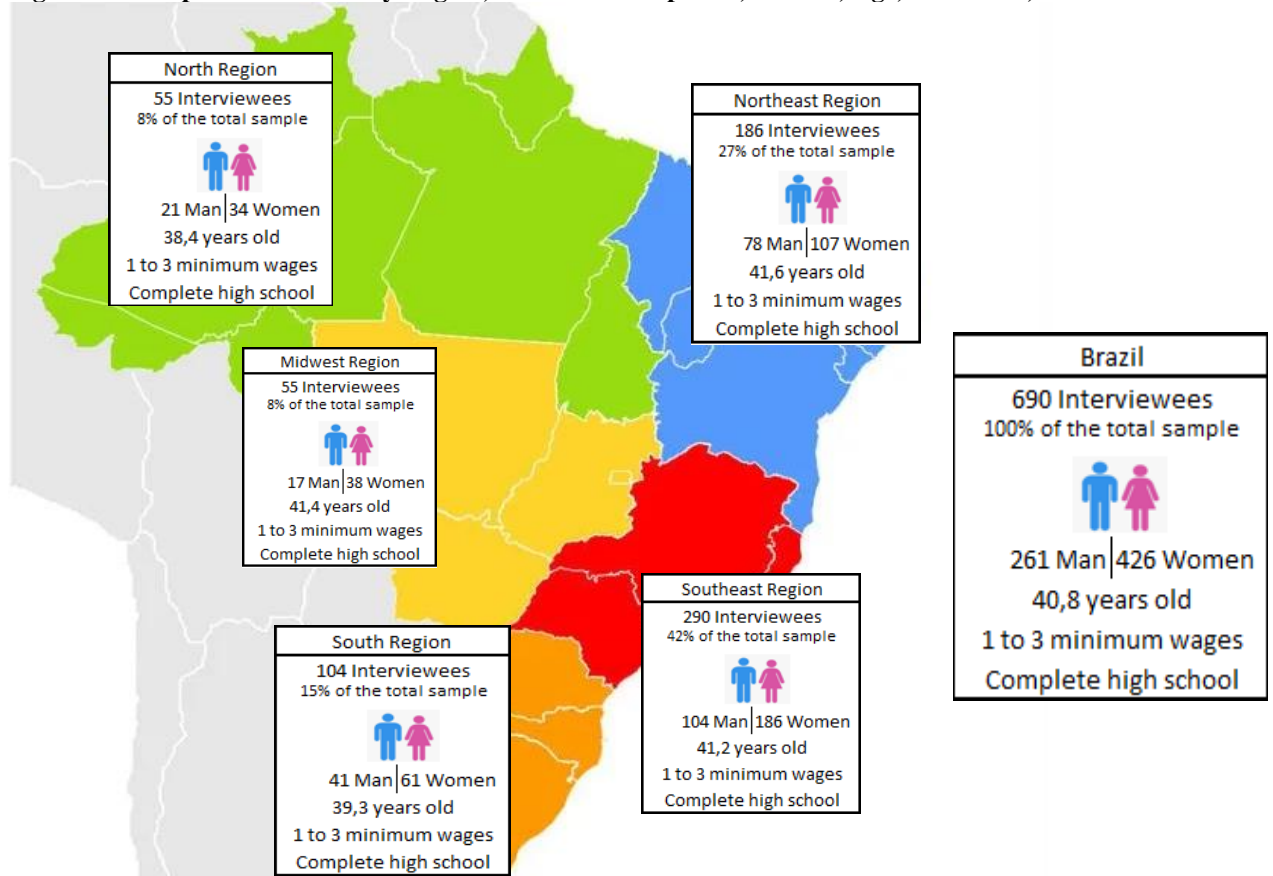
This session will present the results of the survey that was applied. To facilitate data interpretation, this chapter is organized as follows. First, an analysis of the general results of the socio-demographic data of the sample's interviewees was carried out, then the results were analyzed from the perspective of names, then the dimensions of the human-animal relationship were analyzed in a clustered manner and finally the T test crossing the dimensions of the human-animal relationship, names and consumption behavior.

4.1 Results by Socio-Demographic

The sample consisted of 690 respondents, of which 261 declared themselves male and 426 declared themselves female, which accounted for 38% and 62% of the sample, respectively. 3 people declared themselves non-binary or preferred not to declare their sexual orientation.

The overall average age of the sample was 40.8 years (Minimum= 18 years; Maximum= 76 years; SD= 12.6), with male respondents having an average age of 42.2 years (Minimum = 18 years; Maximum = 76 years; SD = 12.3) and female 40.0 years (Minimum = 18 years; Maximum = 72 years; SD = 12.7). In Figure 4, it is possible to see the geographic distribution of the sample.

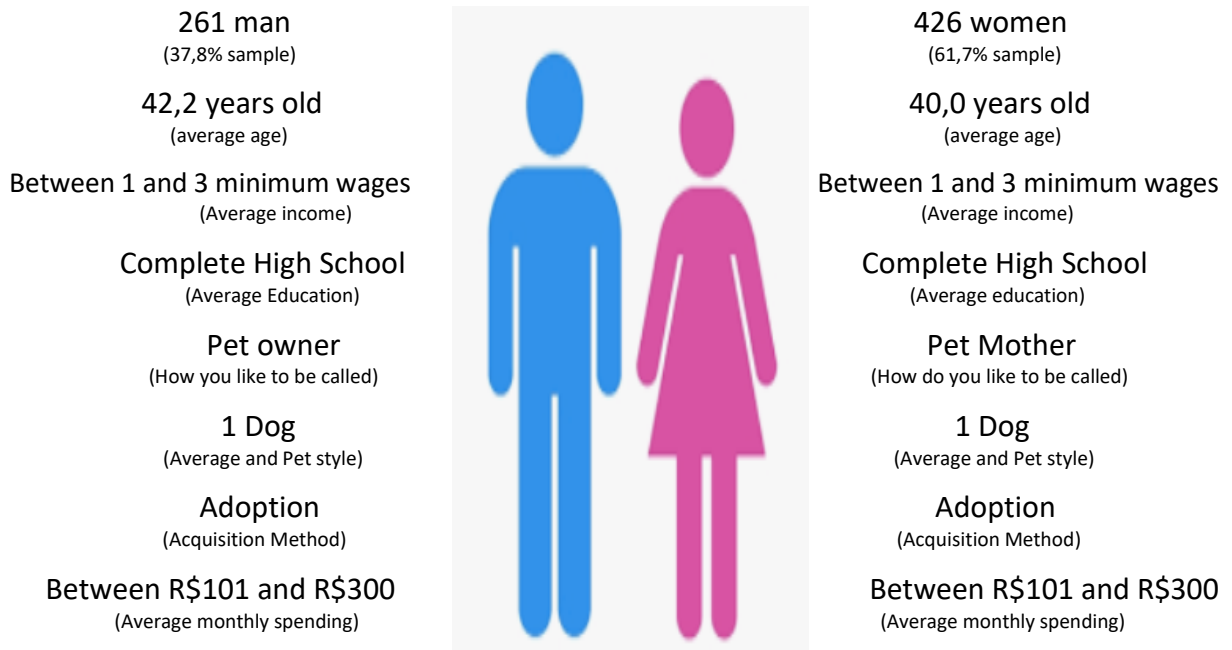
Figure 4 – Sample Distribution by Region, Percent Participation, Gender, Age, Education, and Income



Source: Authors (2024).

The income bracket of 1 to 3 minimum wages had the highest frequency in the sample, accounting for 42% of women and 40% of men interviewed. High school education was the level of schooling observed in 40% of both women and men in the sample. Regarding marital status, 56.2% of respondents declared themselves single, 25.2% married, 12.6% widowed, and 5.9% selected the option "other." Of the 690 respondents, 400 were dog owners, equivalent to 58% of the total sample, 25% were cat owners, and the remaining 18% consisted of respondents who declared themselves owners of both cats and dogs. In the total sample, 49% of respondents stated that they like to be called pet parents. Of these, 235 were female and 98 male, meaning 55% of those who preferred the term were female and 37% were male. 258 respondents, or 37% of the sample, preferred to be called owners, of which 128 were men and 130 women, representing 49% of male respondents and 30% of female respondents. The options of guardian and other were cited by 10% and 3% of the sample, respectively. Next, in Figure 5, you can see the sample distribution by gender, age, income, and education level.

Figure 5 – Sample Distribution by Gender, Average Age, Income, and Education Level



Source: Survey Data (2024).

4.2 Results by Names

Of the 690 names given by respondents to their pets, 52% were human names. These human names were divided into four categories: Human; Human - Fiction; Human - Religious; and Human - Mythological. The other 48% of non-human names were subdivided into ten categories: Nickname; Physical Characteristics; Fruit - Plant; Title; Precious Stones; Pet Product Brand; Soccer Team; Places; and Others. Frame 2 shows the categories of names, definitions, and respective examples. Frame 3 shows the distribution of name classifications, frequency of citation, and percentage.

Both men and women preferred to give human names to their pets. Human names were chosen by 50% of men and 53% of women in the sample. Analyzing the sample by marital status, nearly all groups preferred human names, except for the married group. Widowed, divorced, and single respondents were the groups that most frequently gave human names to pets, accounting for 61%, 55%, and 53% of their respective groups. On the other end, 47% of married respondents gave non-human names. Analyzing the sample by educational level, an interesting phenomenon emerged: respondents with high school and college education gave more human names, 52% and 53% respectively. However, those with elementary education and master's or doctoral degrees preferred non-human names, 52% and 57% respectively.

Analyzing the data by income and monthly expenditures, another interesting phenomenon was observed. Although not entirely linear, it was possible to infer that the lower the income, the higher the proportion of human names given to pets, while higher income correlated with more non-human names. A similar phenomenon was observed with the variable of monthly expenditures: the lower the monthly expenditure on the pet, the more human names were observed among respondents; conversely, the higher the expenditure, the fewer human names.

Frame 2. Name Categories, Definitions, and Examples by Category

	Name Category	Definition	Examples
HUMAN	Human	Common human names	Arthur, Frida, Thomas
	Human - Fiction	Names of characters from books, movies, cartoons, games, and comics	Hulk, Thor, Simba
	Human - Religious	Names of biblical or religious figures	Adam, Samson, Noah
	Human - Mythological	Names derived from Greco-Roman mythology	Zeus, Aphrodite, Pandora
NO HUMAN	Nickname	Names derived from human nicknames	Zé, Mel, Lulu
	Comic - Playful	Names of foods, drinks, or everyday items	Jellybean, Popcorn, Star
	Physical Characteristics	Names derived from the animal's physical characteristics	Fluffy, Bushy-tail, Tiny
	Fruit - Plant	Names of fruits or plants	Flower, Blackberry, Blueberry
	Title	Names of titles	Princess, Duke, King
	Precious Stones	Names of precious stones	Sapphire, Ruby, Pearl
	Pet Product Brand	Names of pet product brands	Lupy, Spaix, Rufus
	Soccer Team	Names of soccer teams	Botafogo, Corinthians
	Places	Names of places	Arizona, Kenya, Lion
	Others	Names that did not fit into any classification	Drizzle, Soft, Sky

Source: Authors, 2024.

Frame 3. Name Classification, Citation Frequency, and Percentage

Name Classification	Citation Frequency	% Total
Human	257	37%
Human - Fiction	77	11%
Human - Religious	8	1%
Human - Mythological	16	2%
Nickname	103	15%
Comic - Playful	66	10%
Others	63	9%
Physical Characteristics	51	7%
Fruit - Plant	7	1%
Title	13	2%
Precious Stones	12	2%
Pet Product Brand	12	2%
Soccer Team	2	0%
Places	3	0%
Total	690	100%

Source: Author, 2024.

In terms of numbers, respondents with an income between 3 to 5 minimum wages chose human names in 55% of cases. When the income ranged between 5 to 7 minimum wages, 53% chose human names, and when the income was above 7 minimum wages, 62% of respondents gave non-human names to their pets. Regarding the variable of expenses, in all groups with monthly expenses up to R\$500, more than 51% of respondents gave human names to their pets. However, the group with monthly expenses above R\$501 showed an inverse logic, with 55% giving non-human names to pets.

Finally, people who give human names to pets showed a tendency towards more humanized behavior in how they like to be recognized in relation to their pet. 57% of respondents who preferred to be called pet parents gave human names to their pets. Conversely, 54% of respondents who preferred to be called owners gave non-human names to their pets.

4.3 Results by Dimension of the Human-Animal Relationship

Table 1 shows that all items presented consistency concerning the constructs they were supposed to estimate (all with p-value < 0.001), as well as reliability measures for the items in the constructs. This corroborates and evidences the robustness of the theoretical model being tested, given the high statistical significance, and demonstrates how well the proposed model fit the observed data.

Table 1 - Confirmatory Factor Analysis of the constructs and their respective items

Factor	Indicator	Estimates	Standard error	Z	p	Standard Estimates
Anthropomorphism	I treat my pet like a person	0.966	0.0439	22.02	< .001	0.728
	Having a pet is like having a child living at home	0.892	0.0411	21.73	< .001	0.722
	My pet is my best friend	0.853	0.0371	22.98	< .001	0.752
	My pet is an extension of myself	1,062	0.0426	24.90	< .001	0.794
	My Pet has a lot of my personality	0.966	0.0431	22.43	< .001	0.738
	I see pets more as people than wild animals	1,036	0.0454	22.84	< .001	0.748
	My pet is like a child to me	1,002	0.0401	24.99	< .001	0.795
	I learn a lot from my pets	0.945	0.0378	25.03	< .001	0.796
	I have the same responsibilities as a parent when it comes to caring for my pet	0.969	0.0373	25.97	< .001	0.816
	My pet is very similar to me	1,071	0.0439	24.40	< .001	0.783
	I like to spoil my pet	0.918	0.0387	23.75	< .001	0.768
	I like to celebrate my pet's birthday	1,006	0.0523	19.25	< .001	0.658
	When I talk to my pet, I speak with a child's voice	0.957	0.0515	18.60	< .001	0.640
	My Pet understands my main emotions, when I am sad, happy or angry	0.946	0.0412	22.97	< .001	0.750
	Pet-Oriented Lifestyle	When I'm stressed, being with my pet calms me down	0.914	0.0337	27.10	< .001
Pets make the world a better place for me		0.898	0.0333	26.98	< .001	0.837
I'm a happier person because of my pet		0.946	0.0335	28.22	< .001	0.860
I feel emotionally connected to my pet		0.954	0.0345	27.67	< .001	0.850
My pet keeps me from feeling alone		0.853	0.0360	23.65	< .001	0.766
My pet's psychological well-being is an important concern for me		0.847	0.0346	24.49	< .001	0.785
My Pet gives me a feeling of psychological well-being		0.896	0.0340	26.33	< .001	0.824
I would not be willing to establish a relationship with someone who was not willing to accept my pet		0.931	0.0430	21.63	< .001	0.719
I am willing to make sacrifices for my Pet		0.946	0.0411	23.04	< .001	0.753
My pet is part of my family		0.888	0.0338	26.30	< .001	0.823
I can't imagine a home without pets		0.948	0.0428	22.14	< .001	0.731
My pet keeps me young		0.925	0.0455	20.34	< .001	0.687
I often play with my pet		0.826	0.0361	22.87	< .001	0.748
I like going for walks with my pet		0.762	0.0464	16.42	< .001	0.579
I regularly give my pet treats		0.422	0.0580	7.28	< .001	0.277
Structure and Discipline - Utility Oriented	Having a pet makes me feel safer	0.796	0.0396	20.08	< .001	0.687

	I feel like I can communicate with my pets	0.876	0.0380	23.09	< .001	0.762
	Having a pet force me to exercise more	0.837	0.0493	16.96	< .001	0.600
	I often spend time training my pet	0.741	0.0551	13.46	< .001	0.513
	I have many established rules that my Pets must follow	0.545	0.0537	10.16	< .001	0.388
Companionship – Limits	Spending time with my pet stops me from spending as much time with other humans	0.709	0.0552	12.84	< .001	0.474
	My pet helps me develop better relationships with other people	0.984	0.0425	23.14	< .001	0.753
	I prefer to spend time with my pet than with other humans	0.892	0.0435	20.49	< .001	0.691
	My Pet understands my main emotions. When I am sad, happy or angry	0.910	0.0371	24.49	< .001	0.785
	I let my pet sit on the furniture in the house	0.843	0.0565	14.94	< .001	0.544
	I like having my pet sleep in bed with me	0.867	0.0595	14.58	< .001	0.534
	My Pet is allowed to roam anywhere in the house/apartment	0.845	0.0456	18.52	< .001	0.641
	I travel with my pets	0.676	0.0610	11.08	< .001	0.413
Special Purchases	I buy items online for my pet	1,122	0.0533	21.05	< .001	0.707
	I am loyal to certain brands of pet food	0.746	0.0468	15.96	< .001	0.569
	I buy luxury items for my pet	1,085	0.0503	21.57	< .001	0.720
	I buy items for my pet on impulse	1,053	0.0534	19.74	< .001	0.674
	I'm willing to go out of my way to find special products for my pet	1,073	0.0494	21.72	< .001	0.723
	Price is not an issue when it comes to buying something my pet likes.	1,031	0.0495	20.83	< .001	0.701
	I always spend more than planned when I go to a store to buy my pet's basic items	1,147	0.0494	23.23	< .001	0.759
	I spend a lot of money on my pet	1,047	0.0480	21.81	< .001	0.725
	I look for special products for my pet	1,033	0.0451	22.92	< .001	0.752
	I like to buy gifts for my pet	1,062	0.0467	22.75	< .001	0.748
	I buy the healthiest food for my pet, regardless of the price	0.926	0.0452	20.51	< .001	0.694
	I take my pet to the vet regularly	0.856	0.0446	19.20	< .001	0.660
	I've already been financially strapped due to some treatment for my pet.	0.902	0.0569	15.85	< .001	0.565
	I have my pet's costs well planned	0.723	0.0488	14.80	< .001	0.534
	I buy items in physical stores for my pet	0.751	0.0471	15.93	< .001	0.568
	I buy items from online stores for my Pet	1,148	0.0537	21.38	< .001	0.716
	Having a pet affected the choice of the configuration of the space where I live	0.845	0.0581	14.54	< .001	0.526
	Having a pet has changed my grocery shopping habits	1,004	0.0531	18.93	< .001	0.652
	I regularly buy medical supplies for my pet	0.981	0.0485	20.24	< .001	0.686
	Owning a pet has affected the layout of my home	0.793	0.0590	13.44	< .001	0.491
Owning a pet has affected my property's outdoor setup	0.779	0.0577	13.50	< .001	0.493	

Appearance	I chose my Pet because he looks cool	1,057	0.0540	19.59	< .001	0.685
	What I value most about my Pet is because his appearance is beautiful.	1,061	0.0555	19.11	< .001	0.672
	My pet gives me social approval	1,273	0.0492	25.89	< .001	0.831
	My pet gives me a good impression on other people	1,122	0.0498	22.51	< .001	0.756
	My pet improves the way I am perceived	1,243	0.0488	25.47	< .001	0.822
Social media	I think it's cool that pets have profiles on social media	1,084	0.0542	20.01	< .001	0.696
	I've already posted a photo of my pet on social media	0,876	0.0528	16.61	< .001	0.606
	I have more photos with my pet than with my close friends and family	1,207	0.0533	22.66	< .001	0.763
	I use social media as a source of inspiration about PET care	1,147	0.0510	22.47	< .001	0.761

Source: the authors (2024).

Following the Confirmatory Factor Analysis, a scale reliability analysis was conducted as a methodological step, measuring Cronbach's α for all constructs. The results indicated that the constructs Anthropomorphism, Pet-Oriented Lifestyle, and Special Purchases had a Cronbach's α greater than 0.9. The constructs Appearance, Social Media, and Companionship - Limits had a Cronbach's α greater than 0.8. Only the construct Structure and Discipline - Utility-Oriented had a Cronbach's α of 0.752, below 0.8. These results reinforce the high consistency among the items comprising the constructs.

4.4 Human-Animal Relationship Dimensions, Names, and Consumption Behavior

Following the validation of the dimensions of the human-animal relationship, a Student's T-Test analysis was conducted where the dependent variables were monthly pet expenses and pet names. The independent variables for this study were the dimensions of the human-animal relationship.

The results of the Student's T-Test for independent samples showed that out of the seven human-animal dimensions, five had a p-value less than 10%, indicating statistically significant results with a 90% confidence level. These dimensions were: Anthropomorphism, Pet-Oriented Lifestyle, Companionship - Limits, Special Purchases, and Social Media. See Frame 4 for details.

Frame 4. Student's T-Test for Statistical Significance Between Human-Animal Relationship Dimensions, Pet Names, and Consumption Behavior

Variable	Statistic	df	p
How much do you spend per month on your pet(s)?	t	0.298	688
Mean Score Anthropomorphism	t	1.685	688
Mean Score Pet-Oriented Lifestyle	t	1.743	688
Mean Score Structure and Discipline - Utility-Oriented	t	1.461	688
Mean Score Companionship - Limits	t	2.092	688
Mean Score Special Purchases	t	1.652	688
Mean Score Appearance	t	1.223	688
Mean Score Social Media	t	2.608	688

Source: Authors, 2024.

From the descriptive analysis of the T-Test, shown in Frame 5, where group 0 pertains to pets with human names and group 1 pertains to pets without human names, it was observed

that in all dimensions of the human-animal relationship, the average monthly expenditure on pets was higher for pets with human names compared to those without human names.

Frame 5. Descriptive Analysis of the Student's T-Test for Statistical Significance Between Human-Animal Relationship Dimensions, Pet Names, and Consumption Behavior

Variable	Group	N	Mean	Median	Std Dev	Std Error
i - How much do you spend per month on your pet(s)?	0	358	1.96	2.00	0.705	0.0372
	1	332	1.94	2.00	0.661	0.0363
Mean Score Anthropomorphism	0	358	4.06	4.40	0.946	0.0500
	1	332	3.93	4.27	1.029	0.0565
Mean Score Pet-Oriented Lifestyle	0	358	4.21	4.53	0.864	0.0457
	1	332	4.09	4.47	0.912	0.0501
Mean Score Structure and Discipline - Utility-Oriented	0	358	3.72	3.80	0.901	0.0476
	1	332	3.62	3.60	0.967	0.0531
Mean Score Companionship - Limits	0	358	3.70	3.88	0.939	0.0496
	1	332	3.54	3.63	0.997	0.0547
Mean Score Special Purchases	0	358	3.39	3.33	0.978	0.0517
	1	332	3.26	3.24	1.002	0.0550
Mean Score Appearance	0	358	3.18	3.20	1.253	0.0662
	1	332	3.07	3.00	1.228	0.0674
Mean Score Social Media	0	358	3.53	3.50	1.167	0.0617
	1	332	3.29	3.25	1.238	0.0679

Source: Authors, 2024.

The confirmatory factor analysis and the scale reliability statistics, which measured Cronbach's α , were essential for validating the scale, the consistency of items, and the construct, demonstrating that international pet literature is applicable to the Brazilian context. However, the results of the Student's T-Test provide new insights.

The T-Test brought a new perspective on pet anthropomorphism, particularly from the viewpoint of names. Through this statistical analysis, it was possible to confirm that people in the human-animal relationship dimensions of Anthropomorphism, Pet-Oriented Lifestyle, Companionship - Limits, Special Purchases, and social media, who give human names to their pets, spend more than those who do not give human names to their pets.

According to the literature, for people in the Pet-Oriented Lifestyle dimension, the pet is an extension of its owner and is seen as the human's best friend (Dotson & Hyatt, 2008; Boya et al., 2012). In parallel, for people in the Anthropomorphism dimension, the pet is perceived as a substitute for a child or a family member (Dotson & Hyatt, 2008; Holbrook et al., 2001; Hirschman, 1994; Belk, 1996). The characteristics of these dimensions align with the concepts of the Extended Self (Hirschman, 1994; Belk, 1996), where the pet is an additional component of the owner's lifestyle, and the Small Other (Lacan, 2010; Napoli, 2022), referring to other individuals similar to the subject.

Another dimension that emerged in the T-Test analysis is social media, which examines the pet owner's behavior on social media. This dimension operates within a sphere of social acceptance, corroborating the literature by Ryder (2019), Warde (2005), and Bourdieu (2008), which suggests how pets have become an additional component in the construction of their owners' lifestyle, both online and offline.

Finally, the dimensions of Companionship - Limits, reflecting the absence of limits imposed on the pet at home (Dotson & Hyatt, 2008; Boya et al., 2012), and Special Purchases,

reflecting purchasing behavior (Dotson & Hyatt, 2008; Boya et al., 2012; Chen et al., 2012), also appeared. While the Social Media dimension shows pets in the construction of the pet owner's lifestyle on social media, these other two dimensions demonstrate how pets are also an essential component in their owners' lifestyle, from their routine, through home organization to purchasing behavior.

The relationship between human-animal relationship dimensions, the human name given to the pet, and higher monthly expenses suggest that pets are an essential component in their owners' lifestyle. Choosing human names for pets may occur precisely because of the ambiguous position pets occupy between human and animal (Belk, 1988, 1996; Leach, 1983; Osório, 2019; Ingold, 1995). However, the finding of this study is to demonstrate the implications this has on the pet owner's consumption behavior.

5. CONCLUSIONS

This study aimed to investigate the dimensions of the human-animal relationship, their connection to human names given to pets, and their impact on consumer behavior. A survey was conducted with 690 respondents across Brazil. The results showed that out of the seven dimensions of the human-animal relationship, five had a direct relationship with human names given to pets and higher monthly expenditures compared to other groups. The study suggests that human names for pets seem to be an additional feature in the anthropomorphism process of pets, with implications for pet owners' consumption behavior.

The study advances and contributes to the literature on pets and names, demonstrating that the strategy and logic behind choosing pet names are, in some way, an extension of the dynamics of the human world. Approximately 52% of respondents in the sample gave their pets human names, a characteristic that transcended regional, economic, and socio-cultural factors such as gender, income, education, and marital status. Choosing human names for pets adds another component to the anthropomorphism process in the human-animal relationship (Dotson & Hyatt, 2008; Boya et al., 2012; Chen et al., 2012; Holbrook et al., 2001; Hirschman, 1994; Belk, 1996; Leach, 1983; Osório, 2019; Ingold, 1995).

Similar to the logic of human names (Astoria, 2008; Rabinovich et al., 1993; Heller, 2003; Baggio, 2005), the names given to pets followed a similar categorization system to the human world. The human names given to pets varied among common human names (Astoria, 2008; Rabinovich et al., 1993), fictional human names, often from film characters (Astoria, 2008; Rabinovich et al., 1993), religious human names (Astoria, 2008), and mythological human names (Rabinovich et al., 1993).

While the trend of giving human names appears widespread across all sectors of Brazilian society, some sectors stood out. Women showed a higher frequency of giving human names to pets. As income and educational levels increased, the incidence of human names decreased. Lower-income individuals were more likely to give their pets human names and, interestingly, were also the ones who allocated a higher percentage of their income to their pets. Notably, the more human names given, the more humanized the relationship tended to be, evidenced by 57% of respondents who gave human names preferring to be called pet parents.

Another significant finding was the high frequency of statements such as: "I have faced financial difficulties due to my pet's treatment," "I buy items for my pet on impulse," and "I always spend more than planned when shopping for my pet's basic items." These are all items from the Special Purchases construct, one of the five constructs that showed a direct relationship between human names for pets and higher monthly expenditures. This, combined with the fact that 89% of respondents did not have health insurance for their pets, helps explain why respondents reported experiencing financial stress due to their pets.

One of the most important findings of this study is the indication that pet expenses appear to be underestimated in pet owners' budgets, to the extent that it leads to financial stress.

This opens up opportunities for the pet industry to develop better value propositions for their products and services, especially pet health insurance plans, loyalty programs that encourage point accumulation for purchases, marketplace apps, or apps for managing pet expenses, among others.

A key theoretical and empirical contribution of this study is demonstrating the relationship between individuals in the human-animal relationship dimensions of Anthropomorphism, Pet-Oriented Lifestyle, Companionship - Limits, Special Purchases, and social media, and higher monthly expenditures on pets with human names compared to other groups. The characteristics of these dimensions reflect the concepts of the Extended Self (Hirschman, 1994; Belk, 1996), where the pet is an additional component of the owner's lifestyle, and the Small Other (Lacan, 2010; Napoli, 2022), referring to other individuals similar to the subject.

Additionally, the ambiguity of pets, which occupy a space between human and animal (Belk, 1988, 1996; Leach, 1983; Osório, 2019; Ingold, 1995), suggests that human names are another feature in the anthropomorphized relationship. However, one of the findings of this study is to demonstrate the implications this has on the pet owner's consumption behavior.

This study also has significant theoretical contributions as it advances the discussion on the human-animal relationship, quantitatively demonstrating which dimensions best explain this relationship. Its most significant contribution is the method employed, which involved validating and adapting three psychographic scales measuring the dimensions of the human-animal relationship (Dotson & Hyatt, 2008; Boya et al., 2012; Chen et al., 2012) for the Brazilian market.

One limitation of this study is that the respondents were dog or cat owners. For future studies, it is recommended to test the behavior of other pet owners, such as bird, fish, or hamster owners. For future research agendas, it is suggested to include different actors in the pet industry, given that this study focused on the demand perspective.

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