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SUBJECT AREA: MARKETING

## Cars that Provide Pleasure: a study about the connection between attributes and personal values of buyers from São Paulo

*Automóveis que Geram Prazer: um estudo sobre a conexão entre atributos e valores pessoais de compradores paulistanos*

*Coches que generan placer: un estudio sobre la relación entre los valores y los atributos personales de los compradores de São Paulo*

**Éderson Luiz Piato<sup>1</sup>**  
**Márcio Lopes Pimenta<sup>2</sup>**  
**Fábio Roberto Fowler<sup>3</sup>**

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### ABSTRACT

The objective of this paper is to evidence the cognitive structure of the values of automobile consumers from São Paulo, considering two models (one compact and another sportive) of a car maker. Specifically, this paper aimed to identify elements through a hierarchical value map (HVM), the attributes, the consequences and the values that characterize the perceptions of the consumers and respective connections among these. Therefore, thirty in depth interviews were performed with buyers of the two models. The qualitative Laddering technique (REYNOLDS; GUTMAN, 1988), based on the Means-End Chain Theory (GUTMAN, 1982), guided the collection, analysis and interpretations of data.

The results point out that personal values are determinant aspects for the decision of buying such models and, consequently, should be considered for the elaboration of strategies of automobile design and communication. The analysis of the HVM highlighted that the main chains, for the two models, are started by the attributes: "internal trim" and "Design". These items generate the perception of the value "Hedonism" - the most expressive state for the interviewees. This highlights the importance of this value in deciding to buy those two analyzed models.

**Keywords:** Personal values. Laddering. Automobiles.

1. Doctor in Production Engineering from Federal University of São Carlos (UFSCar). [piato@ufscar.br]

2. Doctor in Production Engineering from Federal University of São Carlos (UFSCar). [pimenta@fagen.ufu.br]

3. Doctor in Management from University of São Paulo (USP). [ffowler10@gmail.com]

Authors' address: Rodovia João Leme dos Santos (SP-264), km 110, Bairro do Itinga – Sorocaba – SP – CEP: 18052-780 – Brazil

**RESUMO**

O objetivo deste artigo é evidenciar a estrutura cognitiva dos valores de consumidores de automóveis da cidade de São Paulo a respeito de dois modelos, um compacto e outro esportivo, de uma montadora. Especificamente, buscou-se identificar, por meio da elaboração de um mapa hierárquico de valor (MHV), os atributos observados nos modelos, as consequências e os valores que caracterizam as percepções dos consumidores, assim como as respectivas conexões entre esses elementos. Para tanto, foram realizadas trinta entrevistas em profundidade com compradores desses dois modelos. A técnica qualitativa *Laddering* (REYNOLDS, GUTMAN, 1988), baseada na perspectiva da Cadeia de Meios-Fim (GUTMAN, 1982), orientou a coleta, a análise e a interpretação dos dados da pesquisa. Os resultados sugerem que os valores pessoais são aspectos determinantes no processo de decisão de compra desses modelos de automóveis e, portanto, devem ser considerados na elaboração de estratégias que visem projetar produtos e ações de comunicação. A análise do mapa hierárquico de valor permite identificar que as cadeias dominantes para os dois modelos partem dos atributos “Acabamento Interno” e “Design”, que geraram nos entrevistados a percepção do valor “Hedonismo” – o estado mais expressivo para os consumidores –, denotando a importância desse valor no processo de decisão de compra dos modelos analisados.

**Palavras-chave:** Valores pessoais. *Laddering*. Automóveis.

**RESUMEN**

El objetivo de este trabajo es poner de relieve la estructura cognitiva de los valores de los consumidores de automóviles en la ciudad de São Paulo, basado en dos modelos de un fabricante de automóviles: pequeño y deportivo. En concreto, hemos tratado de identificar los atributos, las consecuencias y los valores que caracterizan la percepción de los consumidores y sus conexiones entre estos elementos a través de la elaboración de un mapa jerárquico de valor (MJV). Con este fin,

se realizaron treinta entrevistas en profundidad con los compradores de estos modelos. La técnica cualitativa *Laddering* (REYNOLDS; GUTMAN, 1988), basada en la perspectiva de la cadena de medios y fines (GUTMAN, 1982), articuló la reunión, el análisis e la interpretación de los datos de la investigación. Los resultados sugieren que los valores personales son factores determinantes en el proceso de decisión de compra de estos modelos de automóviles, y por lo tanto deben ser considerados en el diseño de estrategias encaminadas a diseñar productos y acciones de comunicación. El análisis del mapa jerárquico de valor indica que las cadenas dominantes para ambos modelos parten de los atributos “Acabado interno” y “Diseño” y genera la percepción del valor “hedonismo”, el estado más significativo a los consumidores encuestados, lo que denota la importancia de este valor en el proceso de decisión de compra de los modelos analizados.

**Palabras clave:** Valores personales. *Laddering*. Coches. Automóviles.

**1 INTRODUCTION**

Values are situational objectives that guide behaviors in people’s lives. They represent beliefs or concepts that influence individuals’ evaluation and decision processes, with the aim of attaining desired behaviors or states (SCHWARTZ, BILSKI, 1990). In general, they represent behaviors acceptable in the social environment, being important to understand the behavior of consumers (BLACKWELL, MINIARD, ENGEL, 2009).

Actions, decisions and judgments might be influenced by the type of values regarded as dominant in the personality of individuals, and this varies amongst different cultures. Thus, the identification of specific values allows explaining the reasons that lead people to make certain decisions (SCHWARTZ, 1994), including the buying decision. Vinson, Scott, and Lamont (1977) state that the attributes of automobiles that call the attention of consumers when buying

might have cognitive connections with personal values. Mueller and Haan (2009) corroborate this statement when highlight that the process of deciding to buy vehicles is heterogeneous and complex, because there are concrete and abstract elements connected to personal values.

Torres and Allen (2009) stress that researches on the influence of values in the consumption of products are necessary to deepen the understanding of standards of product preference in different cultures. In this regard, the main objective of this paper is to evidence the cognitive structure of values of automobile consumers in the city of São Paulo concerning two models, a compact model and a sports model, of a car maker. Specifically, we intend to identify, by means of elaborating a hierarchical value map, the attributes observed in such models, the consequences and values that characterize the consumers' perceptions, as well as the respective connections amongst such elements. To that end, the Means-End Chain perspective (GUTMAN, 1982) was adopted, along with the *Laddering* technique (REYNOLDS, GUTMAN, 1988), which guided the collection, analysis, and interpretation of the research data.

The paper is organized as follows: at first, the theoretical referential addressing the influence of personal values in the consumption of automobiles is introduced. Then, the methodological procedures adopted in the study, and the *Laddering* technique characteristics are introduced. Subsequently, the research results are analyzed and discussed, including the interpretation of the hierarchical value map. At last, the final considerations and suggestions for future researches are presented.

## 2 THEORETICAL REFERENTIAL

### 2.1 Influence of values in the consumption of automobiles

Values represent the beliefs and concepts that influence the individuals' evaluation and decision processes, with the aim of attaining desired

behaviors or states; they reflect both individual and collective interests (ROKEACH, 1973; SCHWARTZ, BILSKY, 1987; SCHWARTZ, BILSKY, 1990; SCHWARTZ, 1994). Several authors have studied the influence of personal values in the behavior of the consumer (GUTMAN, 1982; GUTMAN, 1991; NASPETTI, ZANOLI, 2004; BAKER, THOMPSON, ENGELKEN, 2004; VILAS BOAS, 2005; KNY *et al.*, 2005; BLACKWELL, MINIARD, ENGEL, 2009; PIMENTA *et al.*, 2010), and have mentioned the Rokeach (1973) and Schwartz (1994) values scale models as fundamental.

According to Rokeach (1973), values are beliefs related to desired ways of behaving (instrumental values) to attain final existence states, goals and ideals of life also desirable (terminal values). Through the interviews, this author has summarized a broad number of values mentioned in the literature. Based on the empirical analyses of his research, he has concluded that "it is improbable that 36 values can be effectively reduced to a smaller number of factors" (ROKEACH, 1973, p. 44). Therefore, he has developed the RVS (*Rokeach Value Survey*), with the aim of identifying the priority of each value in people's lives. He has created a list with terminal values (representing desired life goals / final desirable states), and instrumental values (representing desired ways of life / ways of behaving).

Supplementary, Schwartz (1994) developed a scale characterizing a different contribution to Rokeach's approach (1973) – searching for separating actions' value states in the pursuit of attaining such states. Instead, Schwartz (1994) has identified ten universal categories of values:

- a) Power: Social status and prestige, power on the others, authority, wealth;
- b) Accomplishment: success, capacity, ambition, pleasure, fun;
- c) Hedonism: pleasure, fun, individual and instant values;
- d) Stimulation: life with no routine, exciting and challenging life;

- e) self-orientation: Creativity, curiosity, freedom;
- f) Universalism: open mind, social fairness, equality, environment protection;
- g) Benevolence: targeting the wellbeing of people, thoughtfulness, honesty, clemency;
- h) Tradition: commitment and acceptance of cultural issues in which one is immersed, humbleness, devotion, gratitude;
- i) Conformity: Courtesy, obedience, righteousness, moderation of actions that might harm third parties;
- j) Security: Social order, cleanliness, care, social and individual harmony.

Schwartz (1994) has also categorized such ten universal classes of values into four motivational domains: Opening to change, self-enhancement – both grouping individual values –; self-transcendence and conservativeness – both grouping collective values. According to this author (1994), there is an incompatibility of values belonging to the opening to change and conservativeness domains, as well as between the self-enhancement and self-transcendence; he states that people that are based on collective values tend to be less influenced by individual values, and vice-versa.

According to Allen (2000), when consumers evaluate a product through concrete/tangible attributes, they tend to judge the product through rational and objective processes. On the other hand, when the product evaluation is done through abstract/intangible attributes, there is an emotional judgment. In this second situation, human values transpose tangible attributes in the buying decision, directly influencing or influencing through another tangible attribute the consumption preference (ALLEN, NG, 1999; ALLEN, 2000). To Torres and Allen (2009), values are fundamental elements to explain the buying behavior of Brazilians, especially the collective values.

Considering the influence of values in buying automobiles, Cardoso and Kistmann (2008) pointed out that consumers identify traits of their personality in the car model and brand,

and the vehicle design is the predominant factor for that. Similarly, Ramalho and Ayrosa (2009) point out that automobiles can represent certain personal values when regarded as object of desire, adornment and identification of groups. To these authors, when the individual is identified with the good, he immediately recognizes his own personal features in it or the features he desires, establishing his own extension in the object.

With the aim of investigation which personal values could be involved in the purchase of automobiles, Fernandes (2007) has pointed out the following in his research: social influence, inclination to economy, perception of value and conscious consumption. In addition, when measuring the activities, interests and opinions of interviewees (lifestyle), the author has found, in order of importance, the following: pursuit of status, intellectual development, family appreciation, leadership, optimism degree, conservativeness degree, immediateness degree, and professionalism degree.

In a study conducted with automobile consumers in the United States, Vinson, Scott, and Lamont (1977) have come to the conclusion that more liberal individuals have values such as own respect, forgiveness, quality and pursuit of an exciting life. Therefore, they search for durable, with little emission of pollutants, powerful and compact automobiles. On the other hand, more traditional consumers have values such as education, social recognition, national security and immediate service when there are complaints, searching for automobiles that provide them with prestige, and with a spacious and luxurious internal space.

In more specific analyses, other researchers have tried to relate the consumer's profile with the automobile selection. Escudero and Prado (2008) have carried out a research with sports/compact automobiles consumers, covering two segments: class A and class B people in Brazil. Class A was called the "Security and Wellbeing" group, with individuals that pursue self-respect, sense of realization, prosperity and wisdom. Class B was called the "Individualism and Hedonism" group, with members pursuing pleasure, excitement,

social recognition, individuality, joviality, beauty and modernity. In this example, an individual that aims to have a beautiful car has the higher aim of calling the attention of third parties, which makes us believe that he might value the social recognition or his individuality. Design would be the feature esteemed by this consumer in the buying process.

### 3 METHODOLOGICAL PROCEDURES

This paper exposes the partial results of a project financed by the Research Support Foundation of Minas Gerais (Fapemig), and involved the efforts of researchers located in Minas Gerais and São Paulo universities.

Thirty in-depth interviews were carried out with consumers in the city of São Paulo about two models (a compact model and a sports model) of an international brand of automobiles. Only people who have bought one of these two models of the brand less than one year before the interview were interviewed. Interviews were done over the phone with consumers of the city of São Paulo, between December 2011 and March 2012. Consumers were randomly contacted using a list of purchasers provided to the researchers by the car maker. All the interviews were done with the consent from interviewees, and submitted to a contents analysis to group synonyms and to attribute summary codes for each synonym. This procedure had the aim of determining which attributes would lead to certain scales of consequences and values.

The process of collecting, analyzing and interpreting data followed the assumptions of the *Laddering* (REYNOLDS, GUTMAN, 1988), a qualitative research technique used by various researchers to study the influence of values in the process of deciding to buy (REYNOLDS, GENGLER, HOWARD, 1995; LEÃO, MELLO, 2001; PADEL, FOSTER, 2005; VILAS BOAS, 2005; PIMENTA *et al.*, 2010; KRYSTALLIS, MAGLARAS, MAMALIS, 2008). As the methodological basis, *Laddering* follows the

Means-End Chain Theory (GUTMAN, 1982), which assumes that the consumer, from the observation of a product or brand attributes, has the perception of the consequences and values related to such product. Therefore, the interviewee has to naturally reveal the reasons for the consumption of a certain good or in a certain place. According to Reynolds and Gutman (1988), the phases of *Laddering* comprise the following:

- a) Survey of the consumer's perception through questions such as "Why is this important to you?" repeatedly, that is: as the interviewee reveals the observed attributes, he is asked about such importance until he reveals the personal values related to such attributes. Through these repeated questions, it is possible to highlight the reasons for the importance of an attribute to the consumer;
- b) contents analysis and standardization of the terms identified (codes) in the interview, and distinction amongst attributes, consequences and values, which were entered in the Mecalyst® software to build up the implication matrix and the hierarchical value map;
- c) construction of a table (implication matrix), representing the amount of connections between codes, that is, how many times each element leads to the attainment of each attribute, consequence or value. This table registers the direct and indirect relations between such elements, making up coordinates that will serve to build up the hierarchical value map;
- d) from this matrix, the Mecalyst® software generates the hierarchical value map (HVM), which corresponds to a tree-shaped diagram and graphically represents the connections or associations between attributes, consequences and values surveyed in the interviews.

At the stage of building up the HVM, the cutting point where connections below a certain

incidence are eliminated should be defined. Reynolds and Gutman (1988) recommend that the cutting point should cover between 75% and 80% of the relationships shown in the implication matrix. Thus, the low incidence, and consequently insignificant relationships are not highlighted. Besides this recommendation, it is suggested that the map is clear enough to facilitate the visualization of main chains (REYNOLDS, GUTMAN, 1988; VILAS BOAS, 2005; PIMENTA *et al.*, 2008). In view of such recommendations, the cutting point 3, covering approximately 70% of the relations, and provided a coherent HVM, composed of elements of incidence equal or higher than 3, was used. According to Reynolds and Gutman (1988), the last step of the analysis is to identify the dominant value orientations, i.e., which HVM chains are

more relevant, with the aim of observing those most contributing to the result.

#### 4 RESULTS ANALYSIS AND DISCUSSION

The analysis of contents allowed to identifying 13 attributes, 15 consequences, and 8 values. These 36 elements are a kind of grouping codes of the consumers' opinions on the attributes of the brand automobiles, and their relation with their personal values. Chart 1 shows these elements and their classification as attributes, consequences and values. The meaning of each element is defined in the topics of the hierarchical value map (Figure 1). For some elements, parts of some interviews were included.

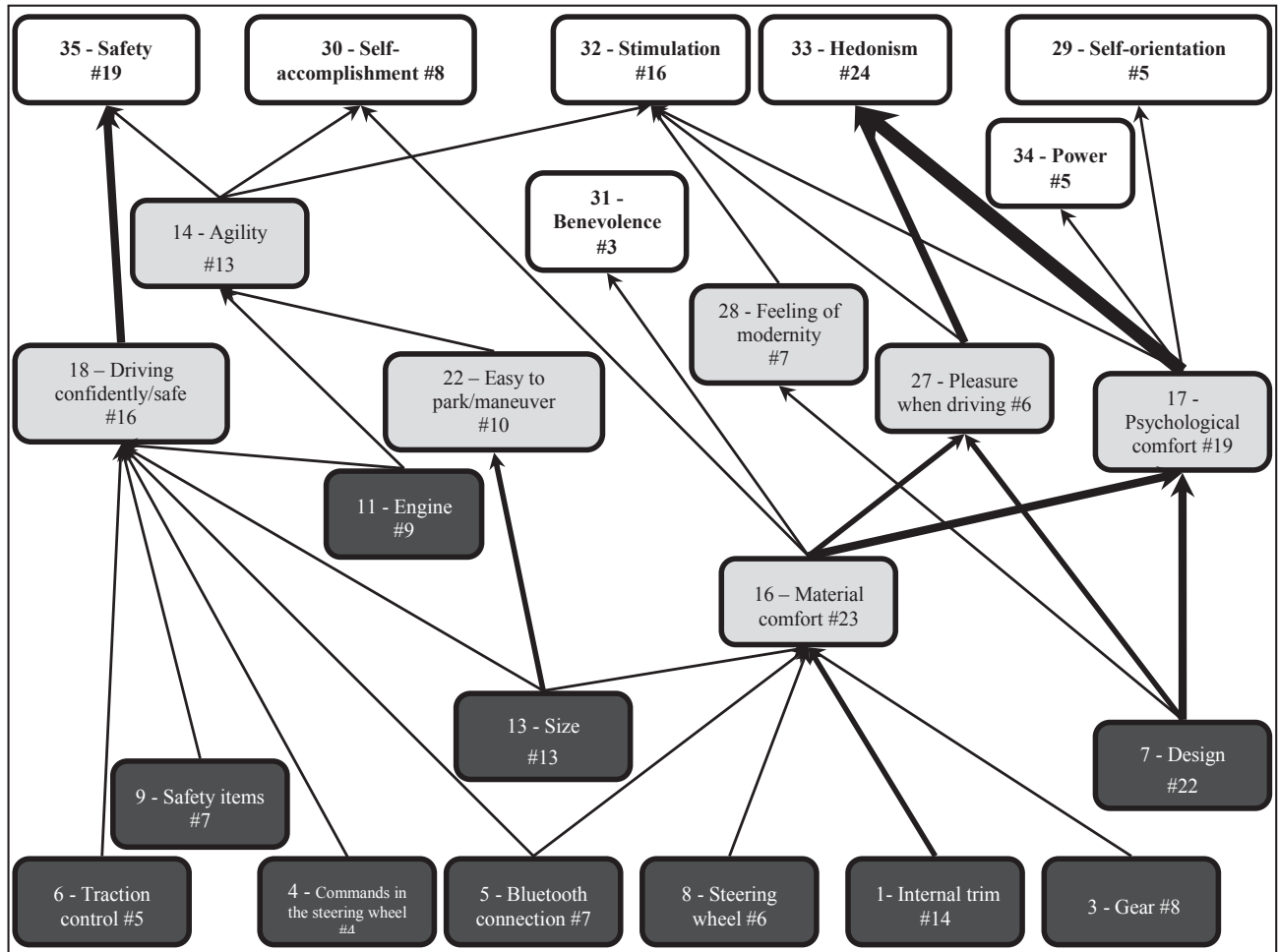
**CHART 1** – Codes and elements identified after the contents analysis

Attributes	Consequences	Values
1 Internal trim	14 Agility	29 Self-orientation
2 Air conditioning	15 Trust in the brand/Good service	30 Self-accomplishment
3 Gear	16 Material comfort	31 Benevolence
4 Commands in the steering wheel	17 Psychological comfort	32 Stimulation
5 Bluetooth connection	18 Driving confidently/safely	33 Hedonism
6 Traction control	19 Saving in maintenance	34 Power
7 Design	20 Saving in fuel	35 Security
8 Steering wheel	21 Absence of fines	36 Universalism
9 Safety items	22 Easy to park/maneuver	
Brand-related attributes	23 Investment in other items	
Engine	24 Higher durability	
Electrical system	25 Better experience at work and with the family	
Size	26 Absence of car problems	
	27 Pleasure in driving	
	28 Feeling of modernity	

**Source:** The authors

Figure 1 shows the hierarchical value map (HVM). Due to the application of the cutting point 3, covering 70% of total connections, the map has 59 chains started by ten attributes

(dark rectangles), with connections to seven consequences (in grey), and seven personal values (white rectangles).



**FIGURE 1** – Hierarchical values map

**Source:** The authors

In order to better understand the HVM, the following topics introduce the meanings of the chains formed by each of the ten attributes. “Chain” is understood as the sequence of connections between the attribute, its consequences and the attained value (all represented by codes).

**Attribute 1 – Internal trim:** The seat material and adjustments provide comfort and the proper height to improve the driver’s view of the traffic. The materials of the panel, door sides and ceiling are regarded as sophisticated, not dried up, smooth and pleasurable to the touch. Car joints are not loose; absence of noise.

This attributes creates material comfort, and is connected with the following values:

30 – Self-accomplishment (comfort allows to relax in the car during the trajectory, and to produce wellbeing at work). Chain 1-16-30.

31 – Benevolence (the user does not get tired, and improves the experience with people). Chain 1-16-31.

Material comfort creates pleasure when driving, which is connected to:

32 – Stimulation (fun, exciting life). Chain 1-16-27-32.

33 – Hedonism (feeling that the seats and other items with direct contact are worn by the person in an adjusted and comfortable way. Feeling of pleasure for the material comfort). Chain 1-16-27-33.

The material comfort created by the internal trim creates a psychological comfort connected to the following values:

29 – Self-orientation (the perfect fit of internal parts and the quality material create the feeling of self-valuation; hard work allows having this comfort, and person feels to be valued for that). Chain 1-16-17-29.

32 – Stimulation (power to travel for fun without getting tired, and consequently feeling calm). Chain 1-16-17-32.

33 – Hedonism (not getting tired because of material discomfort, and consequently not being stressed for spending too much time inside the car). Chain 1-16-17-33.

34 – Power (of having material comfort creates a feeling of self-esteem and expression of a high social level). Chain 1-16-17-34.

**Attribute 3 – Gear:** Automated gear results in less maintenance, it is more comfortable because of the absence of clutch, but causes some bumps when changing gear, creating discomfort.

The consumer that evaluates this attributes wishes material comfort in the pursuit of the following values:

30 - Self-accomplishment (comfort allows to relax in the car during the trajectory, and to produce wellbeing at work). Chain 3-16-30.

31 - Benevolence (the user does not get tired, and improves the experience with people). Chain 3-16-31.

Material comfort, for not causing bumps when changing gear, provides pleasure when driving, which is connected to:

32 - Stimulation (fun, exciting life). Chain 3-16-27-32.

33 – Hedonism (feeling comfortable because of a material good). Chain 3-16-27-33.

Material comfort, for not causing bumps when changing gear, creates a psychological comfort related to the following values:

29 – Self-orientation (feeling of self-valuation, hard work allows to have comfort and to be different from other people). Chain 3-16-17-29.

32 - Stimulation (power to travel for fun without getting tired, and consequently feeling calm). Chain 3-16-17-32.

33 – Hedonism (bumps when changing gear create stress, turning driving unpleasant). Chain 3-16-17-33.

34 – Power (when there are bumps during gear changing, passengers might think the car is bad or the person doesn't drive well, prejudicing the self-esteem of the driver). Chain 3-16-17-34.

**Attribute 3 – Commands in the steering wheel:** Commands easy to set in motion without taking the hand off the steering wheel allows driving with confidence/safety, and help to attain the following value:

35 – Safety (with the meaning of preventing accidents, preventing life, and protecting the family). Chain 4-18-35.

**Attribute 5 – Bluetooth connection:** It allows using the mobile without taking the hands off the steering wheel. It is connected to the following values:

35 – Safety (through consequence 18 – Driving with confidence/safety). Chain 5-18-35.

30 – Self-accomplishment (the bigger influence of this attribute in the driver's behavior is the pursuit of consequence 16 – Material comfort. This comfort allows the performance of the father/mother role when taking good care of the family, when it is possible to answer phone calls from the children at any time). Chain 5-16-30.

31 – Benevolence (material comfort (16) also allows people to avoid fighting in the traffic because of distractions). Chain 5-16-31.

32 – Stimulation; 33 – Hedonism (material comfort provided by Bluetooth connection creates pleasure when driving, which leads people to get out of their routine and feel pleasure for not having to use the hands to talk on the phone). Chains 5-16-27-32 and 5-16-27-33.

32 – Stimulation (material comfort avoids stress, and stimulates to leave the routine behind). Chain 5-16-17-32.

33 – Hedonism (material comfort avoids stress, creates wellbeing and tranquility). Chain 5-16-17-33.

34 – Power (material comfort provides a psychological reward of status before the society). Chain 5-16-17-34.

29 – Self-orientation (material comfort provides the car owner with the feeling of being valued



for having closed a good business). Chain 5-16-17-29.

**Attribute 6 – Traction control:** Allows to making use of all the energy spent in accelerating to better impel the vehicle, improving the stability in poor roads. It allows driving with confidence/safety, because the car becomes more stable. It is related to the following value:

35 - Safety (with the meaning of preventing accidents, preventing life, and the family). Chain 6-18-35.

**Attribute 7 – Design:** General considerations about each model:

**Sports model (sports design):** bold, big and grandiose. The grandiosity is symbolized by the aggressive look of the headlights and of the frontal grid. It is considered beautiful because of the delicate rear shape, with rounded ends, both in the car body and in the headlights. In addition, it is a clean car, without lots of grooves in the car body or inside it. It can be a hatch car, which is regarded as cool, providing the feeling and the expression of joviality, which the sedan car cannot provide.

**Compact model (retro design):** perceived as “retro” for having design lines that reminds of an Italian model of the same brand produced back in the 1950s’, being “an reinterpretation of the old”. “I think it reminds me of a time when I was not yet born. It conveys tranquility to us, from a time when things were more... were more tasteful, more vivid, don’t you think?” (INTERVIEWEE). Some customers were already born at the time when it was launched in Italy, and remember having seen it in Brazil, creating the feeling of nostalgia. Multiple colors, both inside and outside.

Design concepts of each model:

**Sports model:** rounded shape rear, and large and rounded headlights at the ends are features that show the spirit of joviality, different from the squared shapes of headlights and rear of the sedan car.

**Compact model:** despite the visual being perceived as “retro”, it expresses modernity for being hatch, for the size and compact car concept, growing in interest abroad.

Both design concepts provide a feeling that the driver is up-to-date with modern times, has a young spirit, is capable of actively and intensely living (28 – Feeling of modernity). This feeling is related to the following value:

32 – Stimulation (represents that people preferring modern design cars are opened to changes, pursue happiness through an exciting lifestyle, and a cool and less serious behavior). Chain 7-28-32. The above defined design features creates pleasure when driving, and symbolizes the pursuit of the following values by consumers:

32 – Stimulation (feeling younger, cooler, with a happier and more exciting life). Chain 7-27-32.

33 – Hedonism (not being too serious/prudent provides a more calm and pleasurable life). Chain 7-27-33.

The aforementioned design features create psychological comfort, of various ways, and allow connections with different values:

29 – Self-orientation (only in the compact model): feeling of exclusiveness, because it is not a very popular car. In social circles, the car expresses a symbolic edge that the owner is a differentiated person. Chain 7-17-29.

32 – Stimulation (only in the compact model): it is different from what people see in the streets. Be inside such a differentiated design car make people leave their routine, and live through ways different from the others. Chain 7-17-32.

33 – Pleasure created by the pleasant feeling when seeing the car shape (both the “retro” as well as the sports design). Same feeling as when appreciating a picture or any other visual art work. Chain 7-17-33.

34 – Power (feeling of being in a luxurious car, which calls the attention and indicates status. Both the “retro” and the sports design create self-esteem for the feeling of being admired by third parties). Chain 7-17-34.

**Attribute 8 – Steering wheel:** Allows electric and progressive. Allows easy maneuvers and low speed curves, as well as steadiness in high speed.

It creates material comfort, and is connected with the following values:

30 – Self-accomplishment (coming to work not tired, and producing a good job). Chain 8-16-30.

31 – Benevolence (the user does not get tired, and improves the experience with people). Chain 8-16-31.

Material comfort creates pleasure when driving, which is connected to:

32 – Stimulation (fun, exciting life). Chain 8-16-27-32.

33 – Hedonism (feeling comfortable because of a material good). Chain 8-16-27-33.

The material comfort created by the hydraulic power steering creates a psychological comfort related to the following values:

29 – Self-orientation (feeling of self-valuation, hard work allows to have comfort and to be different from other people). Chain 8-16-17-29.

32 – Stimulation (power to travel for fun without getting tired, and consequently feeling peaceful). Chain 8-16-17-32.

33 – Hedonism (not getting tired because of material discomfort, and consequently not being stressed for spending too much time inside the car). Chain 8-16-17-33.

34 – Power (of having material comfort creates a feeling of self-esteem and indicates status, expression of a high social level). Chain 8-16-17-34.

**Attribute 9 – Safety Items:** Abs brakes, airbag, rear-view mirrors that provide a broad view. This allows to getting more safety, in view of a possible collision or of the need of a sudden braking. It is related to the following value:

35 – Safety (with the meaning of preventing accidents, preventing life, and protecting the family). Chain 9-18-35.

**Attribute 11 – Engine:** It is perceived as powerful enough to allow a safe overtaking, and ensuring a good performance inside the city. It is connected to the following values:

35 – Safety (allows preventing collisions in overtaking). Chain 11-18-35.

30 – Self-accomplishment (meaning that the engine, when providing agility, creates time gain, which will reflect in the improvement of the professional performance or of the accomplishment

of responsibilities regarding the family). Chain 11-14-30.

An engine creating agility can also lead to the following values:

32 – Stimulation (because people want an exciting life when driving a car, a fast engine response to run fast, overtaking people in the streets, and having fun while driving). Chain 11-14-32.

35 – Safety (for allowing fast overtaking). Chain 11-14-35.

#### **Attribute 13 – Size:**

**Sports model:** big size, bigger than hatch cars in the marketplace, and smaller than sedans. It inspires grandiosity because of the size, “and it is more respected by people in the traffic...”. It provides the value 35 – Safety. Chain 13-18-35.

**Compact model:** small size; prevents accidents when parking and when changing lanes for being small – that is why it is also related to value 35 – Safety. Chain 13-18-35.

**Compact model:** for being small, it is easy to park and to transit. For being lighter, it is agile because it doesn't demand so much effort from the engine. Agility allows the connection with the following values:

30 – Self-accomplishment (time gain to be productive at work). Chain 13-22-14-30.

32 – Stimulation (exciting life: zigzagging in the traffic through small spaces, same feeling of a motorcyclist). Chain 13-22-14-32.

35 – Safety (light car that does not slide in acclivity, preventing accidents). Chain 13-22-14-35.

**Sports model:** big size creates comfort to drive allowing:

30 – Self-accomplishment (better production at work). Chain 13-16-30.

31 – Benevolence (be more calm to prevent fights in the traffic, provide comfort for the passenger). Chain 13-16-31.

Big size provides pleasure when driving due to the material comfort, connecting to the following values:

32 – Stimulation (get out of the routine). Chain 13-16-27-32.

33 – Hedonism (feeling good when seating and staying inside the car). Chain 13-16-27-33.

The material comfort created by the big size also creates psychological comfort that results in the attainment of the following values:

29 – Self-orientation (feeling differentiated, privileged). Chain 13-16-17-29.

32 – Stimulation (with a bigger internal space, people do not feel suffocated, do not get stressed, and can make longer trips for fun). Chain 13-16-17-32.

33 – Hedonism (for accommodating big people and luggage well, it does not stress and provides wellbeing). Chain 13-16-17-33.

34 – Power (status/grandiosity; big car imposes respect and admiration). Chain 13-16-17-34.

When analyzing the HVM, in Figure 1, we notice the existence of four dominant chains, with the thicker lines: 7-17-33, 7-27-33, 1-16-17-33 e 1-16-27-33. According to Reynolds and Gutman (1988), the dominant chains represent the connections that most appeared in the opinion of interviewees; they thus express the most significant connections to explain the cognitive structure of the consumer.

The identified dominant chains start with the attributes 1 (Internal trim) and 7 (Design). These attributes create in the interviewees the perception of value 33 (Hedonism), showing the important influence of this value in the process of deciding to buy these automobile models. Besides this observation, it is noticed in the HVM that the value Hedonism can be attained in different ways, from the viewpoint of four dominant perceptions:

- a) The consumer that sees design as an element providing pleasure when admiring the car shape (both the “retro” and the sports design), as if appreciating a picture or any other visual art work (7-17-33).
- b) Both the sports and the retro design allow expressing a not so serious attitude before life, which should be calm and pleasant (7-27-33).
- c) The good quality of internal trim materials (seats, panel and lining) provides the pleasant feeling of softness and coziness,

- as if “dressing” the person while he drives. The feeling of pleasure is created by the imminence of material comfort (1-16-27-33);
- d) The good quality of internal trim materials reduces the physical depletion, and consequently prevents the driver’s getting stressed for spending too much time inside the car, so that the trip or time in the traffic is pleasant. It is a feeling of material pleasure that creates psychological pleasure (1-16-17-33).

Such data though do not demerit the importance of the other chains identified in the HVM. Despite being less quoted by the interviewees, the other 55 identified chains also evidence the cognitive structure of the values of the buyer of the automobile models under study.

## 5 IMPLICATIONS OF THE HVM RESULTS AND FINAL CONSIDERATIONS

Through the analysis of the hierarchical value map (HVM), it was possible to identify connections between the attributes of the researched automobiles and the personal values of buyers. The attributes most valued by those buyers were: Internal trim, Gear, Commands in the steering wheel, Bluetooth connection, Traction control, Design, Steering wheel, Safety items, Engine, and Size. Buyers have realized that these attributes can provide consequences such as: Agility, Material comfort, Psychological comfort, Driving confidently/safe, Easy to park/maneuver, Pleasure in driving, and Feeling of modernity. As observed in the HVM, there is connection between these elements and the following personal values of buyers: Self-orientation, Self-accomplishment, Benevolence, Stimulation, Hedonism, Power and Safety.

Four dominant chains were identified in the HVM, which correspond to the thicker connection lines. Such chains allow defining that the value “Hedonism” is the state most perceived by the interviewed consumers. This value is strongly connected with the attributes Design and Internal trim. Thus, four significant behavior profiles were defined:

- a) The consumer that sees design as an element providing pleasure when admiring the car shape, as if appreciating a picture or any other visual art work (7-17-33).
- b) The consumer that sees design as an element that allows expressing a cool attitude before life, which should be calm and pleasant (Chain 7-27-33).
- c) The consumer that observes the good quality of internal trim materials that provides the pleasant feeling of softness and coziness, as if “dressing” the person while he drives. (Chain 1-16-27-33).
- d) The consumer that sees the quality of the internal trim as an element that reduces the physical depletion, and consequently prevents the driver to be stressed, turning the trip or the time in the traffic more pleasant. It is a feeling of material pleasure that creates psychological pleasure (Chain 1-16-17-33).

Therefore, it can be said that the behavior of such consumers is compatible with the orientations of individual values defined by Schwartz (1994), both in regard to these dominant chains and in regard to the general values identified in the map. This statement does not corroborate what Torres and Allen (2009) state about the collectivist trend of Brazilians' values. Unlikely, the little mentioned presence of the value Benevolence is observed, which, even though, does not correspond to an extreme collectivism value at the Schwartz scale (1994).

The results of this research suggest that personal values are determinant aspects in the process of deciding to buy such automobiles, and thus should be considered in the elaboration of strategies aiming to design products or communication actions. According to Gutman (1982), consumers make decisions aiming to attain desired states or to prevent undesired consequences. In this regard, a communication strategy focused on this could provide the consumer with the learning that the product has the attributes that create the desired state.

Therefore, marketing managers of car makers, as well as managers of concessionaires,

need to pay attention to the elements valued by the consumer in regard to the attributes, consequences and values. With that, they can enhance the product's marketing strategies, mainly communication, as well as the development of new models. The managerial implication of that falls on the increased capacity of making a more homogeneous offer in view of the perception of each target-market consumers. This capacity is fundamental to make the buying decision less complex to the customer and more assertive to the company.

*Laddering* is a qualitative technique, which for its nature works with relatively small samples, not allowing generalizations. Future researches could use quantitative methods, bigger samples, in order to test the correlations between the elements of the identified chains. Therefore, implications could be proposed for connections between attributes, consequences and values for larger groups of consumers, not being limited to the observations and perceptions of the researched individuals.

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