Fashion Clothing Involvement: Testing a Theoretical Model

AUTORES
VALTER AFONSO VIEIRA
PPGA/UnB
VALTER23@YAHOO.COM

ROGERIO GAVA
Universidade Federal do Rio Grando do Sul
r.gava@terra.com.br

LUIZ ANTONIO SLONGO
EA/PPGA/UFRGS
LASLONGO@EA.UFRGS.BR

CLAUDIO VAZ TORRES
PPGA/UNB
ClaudpsiUS@aol.com

Área: Marketing

Resumo: Por diversos anos o fenômeno de comportamento de consumo de moda tem chamado a atenção de especialistas, críticos acadêmicos e empreendedores. Assim, esse trabalho tem por objetivo testar um modelo incrementado de envolvimento com moda. O método utilizado foi uma survey, onde a amostra foi por conveniência do tipo bola de neve com 315 pessoas. Os resultados mostraram que os antecedentes da moda ainda carecem de explicações, pois dos três construtos eram supostos ser antecedentes do mesmo, apenas idade foi suportado. Além do mais, envolvimento com moda media duas relações, entre idade-comprometimento e idade-conhecimento subjetivo. Pesquisas futuras podem refinar o modelo sugerido e incrementar na evolução da teoria de moda.
Palavras-chaves: moda; envolvimento, modelos

Abstract: For centuries the phenomena of fashion behavior has been the varied subject of social analysts, cultural historians, moral critics, academic theorists, and business entrepreneurs. Based on this context, this study has as main goal to test an extended and adapted theoretical model of fashion clothing involvement. The method used was a survey where the sample was defined as non-probabilistic by convenience with 315 people. The results showed that the fashion involvement antecedents need to be more explored, because from the three constructs supposed to be antecedents, just one was supported (i.e. Age). In addition, support was found to the fact that fashion clothing involvement meditates two theoretical relations. The first one is between age and commitment, and the second one is between age and subjective knowledge. Other studies might refine the model suggested here and advance more in the fashion involvement comprehension, mainly in the antecedents' part.
Key-Word: Fashion, Involvement, Modeling

Fashion Clothing Involvement: Testing a Theoretical Model

Introduction

For centuries the phenomena of fashion behavior has been the varied subject of social analysts, cultural historians, moral critics, academic theorists, and business entrepreneurs (Sproles 1974). From the academic perspective, King, Ring and Tigert (1979) conceptualized the fashion change agent as a consumer who at least monitors the changing fashion environment on a regular basis, but who also keeps his/her wardrobe up-to-date with current fashions most of the time. In the last decades, the market is feeling that the consumers are monitoring more their fashion environment. In this context, fashion clothing appears to become so important that many people are now more involved with it, indicating, as a consequence, the concept of "fashion clothing involvement" as a recent consumer behavior construct.

According with Tigert, Ring and King (1976, p.46), the concept of fashion involvement is based essentially on three propositions: "(1) the population is distributed along a broad continuum in terms of fashion behavioral activities; (2) the population is also distributed on a unidimensional continuum for each of these fashion behavioral activities; and (3) for several specific fashion behavioral activities, these continuums have been and can be researched and identified for specific geographic submarkets". Based on these circumstances and from a conceptual point of view, fashion involvement is defined as the perceived personal relevance or interest from the consumer by fashion clothing (based on Engel et al., 2000).

In the fashion involvement situation, a lot of marketing models try to explain the antecedents and consequents of fashion involvement construct. In this context, O'Cass (2004) proposed a theoretical model as a tentative of explanation. His model includes some constructs considered important to elucidate the involvement concept. However, since the models continue to learn, to adapt, and to improve over time (Johnson, et al., 2001) and since the modernization of fashion market occurs day-by-day, some other constructs are identified as possible consequents of fashion clothing involvement. Therefore, these other variables could be suggested as complement of O'Cass (2004) model and as an extension of the fashion involvement theory. Thus, this paper specifically advances in the fashion literature associating new relations (i.e. commitment, patronage and time) with involvement construct. As a result, this study has as goal to test an extended and adapted theoretical model of fashion clothing involvement.

As justify, this investigation hopes that the adapted model may explain more the associations with fashion clothing involvement and may clarify the associations within these constructs. Hence, the paper is organized as follows, after that introduction. It initially proposes the hypotheses that structure the extended model. Next, it discusses the concepts, the scales and the methods used in the research field. Consequently, it analyzes the data using structural equation modeling. Then, the article ends with a conclusion about the topic.

Background

The process by which new clothing and apparel concepts, "style statements", and tastes continually cycle across the population has been the subject of popular commentary for centuries (Tigert, Ring and Kint 1986). Therefore, understanding how people interpret clothing and how different groups make different judgments about the same brand of clothing is critical to clothing manufacturers and their advertising agencies (Auty and Elliot 1998). In recent years, the increased consumer independence, the large number of accepted styles at any one point of time, and the decline of clothing as a status symbol has placed the individual consumer under less pressure to conform. Thus, the consumer is freer to determine how much he/she is willing to pay for fashion (Dardes, 1974).

Comprehending fashion construct is not easy, since some definitions appear in the literature. Thus, to a better description of the construct, Sproles (1974, p.463-467) suggested

three points that define basic constructs and structured concepts, which delineate a contemporary theory of fashion: "1. *The Generalized Concept of Fashion*. Fashion may be defined as a broadly based behavioral phenomenon evidenced in a variety of material and non-material contexts. A generalized definition of fashion is constructed to reflect the generalized concept of fashion represented in a wider realm of non-material as well as consumer behavioral phenomena. 2. *Fashion: an object and a process*. Fashion may be conceptualized both as an object and as a behavioral process. The critical characteristics of a fashion, both as an object and a process, are defined. 3. *The Mechanisms of the Fashion Process*. The fashion process may be mechanistically characterized as a process of social influence and diffusion. The conceptual basis of the fashion process mechanism is developed based on perspectives from the classical and contemporary literature."

King and Ring (1980, p.13), complementing the Sproles (1974) structure, commented that fashion may be thought of as two-dimensional and encompassing both the *Fashion Object* and the *Fashion Process*. For they the "fashion object refers to a specific object, such as a particular dress, an architectural style - notice the work style - or a particular style of child-rearing. Fashion process is the process by which a potential fashion moves from its point of origination to public acceptance. The fashion process is characterized by the introduction of a fashion innovation, by its early adoption by fashion leaders, by the diffusion of the fashion object throughout a particular socio-cultural network and by the eventual decline in acceptance of the fashion object". From these two dimensions, this study analyzes the fashion clothing as a process, because the investigation measures the behaviors, the opinions and the attitudes toward fashion movement.

The Brazilian fashion clothing segment produced 5,6 billions of units (i.e. garment and accessory) and consumed 1 million on of textile/fabric in 2004, where the investment from the 17500 companies was approximately US$ 103,6 millions (IEMI, 2005). From 1998 to nowadays, the fashion trade balance, which was US$ 124 millions in deficit in 1998, achieved a superavit of US$ 192 millions (IEMI, 2005). Moreover, according to Brazilian Textile Association (ABIT), Brazil is the second largest jeans fabric in the world, loosing just for China (Mirrione 2005). From the managerial perspective, these data show the importance of studying the fashion clothing segment and the consumer involvement with it, especially in the jeans wear market.

Hypothesis Proposition

In the market, it could be inferred that fashion clothing, as possession, may be seen for its role as a code (i.e. assists in portraying acceptable images). In fact, diverse theorists have demonstrated the use of clothing as a code and a language, which allows a message to be created and (selectively) understood. For instance, McCracken and Roth (1989) presented this idea inducing that clothing as "body talking". Noesjirwan and Crawford (1982) make that same convergence saying that clothing is primarily a means of communicating, not a personal identity, but a social identity to other. Thus, since fashion clothing creates the impression (Belk 1985; Richins 1992) and is a way of presenting the codes and signs, it could be an indicative that materialism is linked to fashion involvement, because materialism is also a way of cause impression to others. In practice, Browne and Kaldenberg (1997) presented a causal relation between materialism and involvement, indicating that the first is the antecedent of the second. Their main argument align in the fact that strong pleasure feelings related to the possessions (materialism) do people give more importance to the fashion, spending more time in the buying things. O'Cass (2004) also demonstrated that materialism leads to involvement. Thus, we hypothesized that: **H₁:** Materialism has a significant positive influence on Fashion Clothing Involvement.

Based on seven major fashion studies across four different cultures, Tigert, King and Ring (1980) stated that a much larger proportion of the female fashion buying public is now monitoring new women's fashions on a regular basis. Thus, it might indicate that women are more involved in fashion than men. In their seminal research on the interpretation of clothing "codes", McCracken and Roth (1989) found that females were significantly better than men in interpreting the syntax of clothing codes. That is, women recognized more readily a "look" and were more sensitive to fashion cues than men were (Auty and Elliott 1998). Moreover, research has shown that men and women differ in the way they pay attention to cues in advertising (Meyers-Levy and Maheswaran 1991) and similarly that they read fashion symbols with different criteria (Elliott, 1994; Meyers-Levy and Sternthal 1991). Thus, females have been found to be more sensitive to the informative details provided by ads than men generally are and they tend to focus more on their own external appearance, as reflected by the positive relationship between fashion consciousness and public self-consciousness (Auty and Elliott 1998). For that reason, females could be more sensitive to fashion clothing involvement than men, since females could place it in a more central position in their lives than males (O'Cass 2004). In fact, empirical research has been supporting that relation (Browne and Kaldenberg 1997). Thus, it is hypothesized that: **H₂:** Gender has a significant positive influence on Fashion Clothing Involvement.

Age has also been identified as an important dimension in fashion clothing (O'Cass 2004). Some studies indicated that differences in fashion clothing attachment and usage are said to exist (Auty and Elliott 1998; O'Cass 2000). The assumption is that younger people in general place more emphasis on their appearance than older people (O'Cass 2004), since they are starting to have a more active social live and need to show their look to other. In fact, younger people could place more weight on their appearance because teens need to be accepted in the reference group, to imitate aspiration group, or to gain some social approbation. Likewise, the next supposition is: **H₃:** Age has a significant negative influence on Fashion Clothing involvement (i.e. younger people place more emphasis on fashion clothing than elders).

O'Cass (2004) comments that knowledge has been referred as product familiarity or prior knowledge of the object or stimulus. In the context of fashion clothing, product knowledge is viewed as the knowledge of brands in the product class, product-use contexts, product attribute, frequency of use and experience with fashion clothing (Johnson and Russo 1981, 1984; Raju and Reilly 1979). According to O'Cass (2004), knowledge can come from product experiences, ad exposure, interactions with sales people, friends or the media, previous decision-making or previous consumption and usage experiences held in memory. Some studies indicated that fashion clothing involvement has a significant positive influence on consumers' perception of fashion knowledge (Gill et. al. 1988; Parameswaran and Spinelli 1984). However, these studies did **not** investigate fashion knowledge based on subjective fashion knowledge. In fact, *Subjective* fashion knowledge is operationalized in terms of how much a consumer thinks or perceives they know about the product (i.e. individual's subjective self report). *Objective* fashion knowledge is operationalized in terms of how much a consumer actually knows about the product (i.e. long-term memory). This study takes the subjective fashion knowledge perspective. Thus, the proposition is that since the consumer is more involved with the fashion clothing, it could affect its product knowledge, because he/she could have a more fashion clothing familiarity, awareness, experience and expertise with the product (Phelps and Thorson 1991; Zinkhan and Muderrisogly 1985). Based on that perspective, the next hypothesis is: **H₄:** Fashion Clothing Involvement has a significant positive influence on consumers' perception of Fashion Knowledge.

Consumers' perception of fashion knowledge is suggested to be linked to confidence. Depending on the circumstances, the degree of confidence could reflect either certainty or uncertainty as to which judgment is correct or the best in one situation, or ambiguity as to the meaning of an attitude object altogether (Zajonc and Morrisette, 1960). Confidence, is this context, represents a consumer's belief that his/her knowledge or ability is sufficient or correct regarding fashion clothing assessment (O'Cass 2004). Wendler (1983) defines confidence as the consumer's subjective certainty that he/she has made the decision that is best for him/her. In other words, it is the ability to make the right choice in the context of fashion clothing. It is expected that fashion clothing knowledge will have a positive effect on consumers' confidence, because fashion clothing subjective knowledge is linked to a degree of knowledge that a consumer has about the object, which could help the consumer in making a better judgment about fashion clothing (O'Cass 2004). Therefore: **H5:** Fashion Clothing Knowledge has a significant positive influence on consumers' Confidence in making the right decision about fashion clothing.

The next hypothesis deals with fashion clothing involvement and confidence. The literature indicates that confidence-involvement has been investigated so much (see, for instance, Bloch 1982; Parameswaran and Spinelli 1984; Burton and Netemeyer 1992). However, these studies do not deal specifically with fashion clothing segment. Chebat and Picard (1985) showed that involvement had a direct effect on confidence in both product and message. In that way, the more involved the consumer is, the more confident he/she may be in making a better judgment. Based on the same causal relation, Park and Lessig (1981) raised a theoretical argument that consumers are likely to be more confident when they are more involved with a product, because high personal knowledge levels about the product increases people trust in making the right choice for they lives. In addition, O'Cass (2004) believes that one of the key outcomes of being involved in a product is perhaps that one would tend to be more confident in decisions or purchases related to that product or product class, because the previous knowledge got with involvement is the support to the right decisions. As a result, it is hypothesized that: **H6:** Fashion Clothing Involvement has a significant positive influence on Consumers' Confidence in making the right decision about fashion clothing.

Some research indicated that there is a relationship between involvement and commitment, indicating that the last one is a consequent (Beatty et al. 1988). Iwasaky and Havitz (1998) proposed a model that suggested the existence of a relationship between involvement, commitment and loyalty (in that sequence). However, they did not test the model. The logic behind this sequence is that the more involved the consumer is with the product (supposed using more cognitive aspects), more committed he/she will be with their decision, paying more attention to the choice. In other words, if the product has a high relevance to the consumer, he/she is supposed to be more committed with his/her future judgment as compared to products with less involvement. Freire and Nique (2005) tested this causal relation, using and putting continuity commitment as a mediator of involvement-loyalty relation. They found support to involvement-commitment link. As a conceptual definition, continuity commitment (or calculative) is based on cognitive evaluation of the brand and inferred that the consumer maintain its behavior consistent while perceive the benefits gained from the brand (Amine, 1998). In this study, continuity commitment will not be related to the brand, but to the store, i.e. based on the perceived costs in abandon the relation with the retail. Based on that perspective, it is hoped that when more involved with fashion clothing the consumer is, more commitment he/she will have with his/her store. Then,

the next premise is: **H₇:** Fashion Clothing Involvement has a significant positive influence on consumers' Continuity Commitment.

O'Cass (2004) suggested that the issue of antecedents of involvement with fashion could be extended to include personal values, personality traits and consequences, such as information search and time spent shopping. Consequently, the study hopes that the time spent in shopping be greater for people buying fashion clothing rather than for people buying conventional clothing. The same argument is safeguarded by Mckinney et al., (2004). Theoretically, Browne and Kaldengerg (1997) suggest that strong pleasure feelings related to the possessions (i.e. fashion clothing) do people spend more time buying things. It is because normal clothing could not demand some degree of expertise with brands and the cognitive effort. Thus, cognitive effort could be greater in buying fashion clothing involvement, leaving to a more time spending in buying clothing. Afterward, it is predictable that: **H₈:** Fashion Clothing Involvement has a significant positive influence on Time Spent in Shopping.

The last hypothesis comments about patronage. Store patronage is conceptually defined as the consumer's selection for a shopping outlet (Haynes et al., 1994). Patronage patterns are theorized as based on consumer characteristics including social factors (Engel, Blackwell and Miniard 2000; Haynes et al., 1994). Patronage behavior is influenced by a variety of shopper characteristics at each stage in the decision process (McKinney et al 2004). More specifically, research has shown that clothing store patronage is related to fashion involvement for some kind consumers (Kopp, Eng and Tigert, 1989; see also McKinney et al 2004). These consumers are those who could have different characteristics (such, as fashion clothing trend). Because of those special trends, higher levels of fashion involvement have been associated with consumers who patronize department stores rather than discount stores (Tatzel, 1982). Thus, McKinney et al. (2004) comment that consumers who use clothing to enhance self-esteem, lifestyle and special features tend to shop more in special and better department stores. Therefore, the next hypothesis is: **H₉:** Fashion Clothing involvement has a significant positive influence on Patronage.

The model is showed in Figure 1. It is initially based on O'Cass (2004, p.870). However, hypotheses H₇; H₉ and H₈ are new. Fashion Clothing Involvement is the central construct in the model and gender and age are observable variables.

==Figure 1 about here ==

Method

Measurement. The scale used for measuring fashion clothing involvement (three items), fashion clothing knowledge (two items) and fashion clothing confidence (three items) was based on O'Cass (2004). It was double-back translated by marketing students. Additionally, three items refereed to time spent in shopping were developed from the literature and used in the instrument (e.g. "buying fashion clothing demands much time"). For measuring patronage, we choose four items from the instrument used by D'Angelo et al. (2003). For measuring calculative commitment, we choose three items from the instrument used by Freire and Nique (2005). For measuring materialism, we choose five items from Monteiro (2005). All scales were operationalized using seven-point likert scale.

Questionnaire Pre-Test. A pre-test was used to verify the instrument with 53 business students, who were not part of the final sample. The results indicated that the materialism instrument was not psychometrically good. Initially it was based on Richins and Dawson (1992). The results also indicated that the patronage instrument was not psychometrically good. Initially it was based on Baker, Levy and Grewal (1992) and Baker et al (2002). The rest of the scales sounds good and because of these problems with materialism and patronage

scales, the study decided used other instruments, based on items from D'Angelo et. al., (2003) and Monteiro (2005), respectively.

Sample. The sample was defined as non-probabilistic by convenience. One of the goals was to collected data from a different demographic profile. This process could generate different kinds of opinion, increasing the wealth of data and trying to reduce the sample bias. Therefore, the overall sample included students from one academic-college, from two technical-colleges. Thus, the final sample was 315.

Data Analysis

Male were 54% of the sample. People who commented that they buy fashion clothing is around 54%. The familiar income values were R$ 0-1000 (29%); R$ 1001-2500 (45%); R$ 2501-4000 (14%); R$ 4001-4500 (3%) and R$ 4501-above (9%). The average age was 23 and the range was between 12 and 70.

For the hypothesis test, structural equation model was used. Therefore, for such propose, the data were pre-analyzed according to some criteria for better purification. These criteria are described as follow. The missing values found were below 5% and they were substituted by means (Kline 1998). The variable that got the maximum in missing value was "commitment_3" 3,7%. Outliers were verified according two criteria: one is based on score Z, where values above ±3 were identified (they were retained), and the second one was based on Mahalanobis distance D^2, where values under $p<0,001$ were deleted (none case). According to suggested Olsson et al. (2000) normality was checked in terms of Kurtosis (±5), Skweness (±2) and Kolmogorov Smirnoff test ($p<0,01$). In these three features, the non-normality was found, although within the moderator parameters. Multicolinearity was assessed using Pearson correlations, where values above $\pm0,90$ were excluded (none case) and additionally the scales were summated and the VIF (Variance Inflation Factor < 10) was assessed (none case) Hair et al (1998). Therefore, after purification, the final sample was 301 observations.

Thus, after these initial check procedures, multivariate data analysis was used. First of all, exploratory factor analysis (EFA) was used to evaluate the unidimensionality of the variables. The goal utilizing EFA was not only to define better variables that compose the factor (in terms of loads), but also to assess if the constructs are unidimensional or multidimensional. Thus, the criterion for excluding the variables in the matrix was load-values under $\lambda=0,35$ (cut-off). For extraction, Axis Principal was used and, for rotation, Oblimin method was utilized (eigenvalues over 1). Justifying, Garson (2000) comment that for structural equation modeling, confirmatory factor analysis (CFA) one uses principle axis factoring rather than principle components analysis as the type of factoring. Table 1 shows the results from that analysis.

According to the data, Materialism, Involvement and Time were the constructs which had values under $\alpha=0,70$ (Hair et al., 1998). Thus, for eliminating the reliability problems we excluded the items which had poor loads and recalculate the alpha. The final results, which are the ones used in the model, are described in the "end notes" of Table 1. The only observation is that even recalculate the alpha for Materialism scale it did not perform well ($\alpha=57$). Therefore, since it could compromise the final results we choose to exclude that from the model.

==**Table 1 about here** ==

In the sequence, convergent validity was performed using CFA for each construct of the model isolated. Thus, the *t*-values were evaluated. Convergent validity is supported when t-value is above 1,96 ($p<0,05$). As a result, the convergent validity was supported for all constructs evaluated. The next step was to analyze the constructs using discriminant validity, following the Fornell and Larcker (1981) suggestion. It uses as basis the correlation matrix. Discriminant validity examine the degree to which the operationalization is not similar to

(diverges from) other operationalizations that it theoretically should be not similar (Trochim 2002). The results from discriminant validity can be viewed in the upper triangle of Table 2. In addition, we calculate Average Variance Extracted (AVE) and Composite Reliability (CR) for the constructs. The results from AVE and CR also indicate Materialism with a poor reliability. The only unexpected result comes from a non-significant correlation between patronage and involvement (r=-0,004; n.s.), indicating a non association between these two constructs.

<div align="center">== **Table 2 about here** ==</div>

After discussing the validity and reliability of the scales and the construct used in the research, the global model was tested. Global fit indicates that the model needs to be adjusted for the data before testing the hypothesis. Without a good fits on the data, the path coefficients cannot be assessed. Thus, the values for the global model fits were: χ^2=381,073; d.f.=128; χ^2/d.f.=2,977, p<0,001; AGFI=0,824; GFI=0,87; NFI= 0,835; IFI= 0,884; CFI=0,883; TLI= 0,86 and RMSEA=0,081.

As a conclusion, the poor fits of the model were AGFI, GFI, NFI, IFI, CFI, and TLI, which were above the minimum value indicated by theory of 0,90 (Kline, 1998). Since some convergence of the data was found (RMSEA and χ^2/gl), the path model was estimated. The Maximum Likelihood estimative was the method used, considering the constructs as latent variables, except gender and age. Table 3 shows the final paths coefficients, beta adjusted weights, t-values and hypothesis status. Results from each hypothesis are discussed ahead.

<div align="center">== **Table 3 about here** ==</div>

Hypothesis Discussion

The first hypothesis could not be verified since it achieved poor values in alpha Cronbach (α = 0,57), AVE (0,33) and CR (0,59). Because of those low values, the model could be compromise. Consequently, this construct was retired from the model. In addition, theses bad results could indicate the need for suggesting a materialism instrument in Brazil, given that the two scales used for such propose had problems. The first scale used in the pre-test was based on Richins and Dawson (1992) and the second instrument was based on Monteiro (2005).

According to Tigert, King and Ring (1980), a much larger proportion of the female fashion buying community is now monitoring new women's fashions on a regular basis. Other studies also found the same results (McCracken and Roth 1989; O'Cass 2004), meaning that women are more fashion involved than men. On the contrary, the results indicated that the second hypothesis was not supported. A possible explanation for this result is that men may be changing their focus and orientation from conventional clothing to fashion clothing in the last years. In fact, Davila (2003) suggested that the masculine society is been more vanity in the last years, indicating the appearance of "metrosexual" figure (i.e. David Beckham; Brad Pitt). It appears that men are now spending more time in hairdresser, making more silicon implant in their legs, frequenting more the gyms and so forth. As a consequence, future research could presuppose to test this difference in fashion clothing orientation (male versus female).

The third hypothesis gives to understand that younger people place more emphasis on their appearance than older people (O'Cass 2004). This assumption could be explained because younger people could be associating in a reference group (i.e. social gathering and social environment) or could be trying to gain some approbation from their friends. Another explanation comes from Law, Zhang and Leung (1999), who comment that young consumers have the courage and interest to try on new innovations. The data indicated support to the third hypothesis. An additional test to H_3 was run, given that age was recoded in three groups (equal parts 33%). As a result, ANOVA indicated support to the hypothesis again, showing that younger more are involved with fashion than older groups (F=3,090; p<0,05;

<div align="right">8</div>

$M_{younger}$=3,44; M_{middle}=3,39; M_{old}=2,99). In this case, a Scheffé test indicated a significant difference between the first group and the third group.

The fourth hypothesis was supported, indicating that the fashion clothing involvement impacts on subjective fashion knowledge. This result is consistent with some literature about the topic described in the hypothesis elaboration. Furthermore, the results extend the literature in two points of view. First, it investigates fashion knowledge and confirming the relationship between involvement and knowledge (Gill et al. 1988; Parameswaran and Spinelli 1984; Phelps and Thorson 1991; Zinkhan and Muderrisogly 1985). Second, it extends O'Cass (2004) subjective point of view. Based on this context, future research could test new models creating the hypothesis that fashion clothing involvement leaves to both subjective and objective fashion knowledge.

The fifth hypothesis was supported and indicated that consumers' perception of fashion knowledge is linked to confidence, since the degree of confidence could reflect either certainty or uncertainty as to which judgment is correct, or ambiguity as to the meaning of an attitude object altogether (Zajonc and Morrisette, 1960). Taylor and Cosenza (2002) also confirmed this idea, founding that teen age group was more preoccupied with social acceptance, social affiliation and coolness attached to make the right clothing judgment. Consumers' perception of fashion knowledge on confidence was the major beta value (β=0,63; t=6,743; p<0,000), indicating a strongest impact in the model and a strong relation from subjective knowledge on ability to make the right decision.

The sixth hypothesis was rejected. It points out that consumers' perception of fashion knowledge is not suggested to be allied to confidence. It is also in agreement with O'Cass (2004) empirical results (i.e. bootstrap<1,96). The idea about involvement and confidence was initially based on Parameswaran and Spinelli (1984) and Burton and Netemeyer, (1992), who investigated that relation in the context of voting. O'Cass (2004) tried to test this relation in fashion clothing segment and did not get success. Therefore, the hypothesis appears to lack of theoretical consistence in its formation. O'Cass (2004) gives to understand that the stability of preference is the basis of confidence. This study believes that the stability of preference is not so well defined in fashion clothing segment because of shorter life cycle. As a result, it could jeopardize the basis of confidence, leaving it to the fact that fashion involvement does not is related to consumers' trust.

The seventh hypothesis tested the proposition of Iwasaky and Havitz (1998), who assume that there are a relationship between involvement, commitment and loyalty. Freire and Nique (2005) tested this causal relation using and putting continuity commitment as a mediator of involvement-loyalty relation and found support (β=0,32) to involvement-commitment relationship. The results indicated the same (β=0,23; p<0,01). A possible explanation to this find is that the higher the involvement with fashion clothing, the higher the continuity commitment that the consumer will have in maintaining its closet upgraded with trends. Then, the commitment could appear as a justification of the fact that the consumer needs to keep its appearance with the one prescribes by the market. Thus, the process could be viewed as a cognitive evaluation of the consumer garment and it could be inferred that the consumer tries to perceive the benefits gained from the "moment" garment (Amine, 1998).

The eighth hypothesis was also supported. It shows that fashion involvement and time spent shopping were significantly and positively related. These empirical results support the research by Flynn and Goldsmith (1993), Mckinney et al. (2004), and Tatzel (1982). In fact, these findings indicate that the consumer needs to keep his/her wardrobe up-to-date with current fashions most of the time. Thus, for such purpose spending more time deciding, trying and wearing fashion clothing in stores are important components by which the consumer needs to pass to try achieving the best current fashions.

As it was described before in the ninth hypothesis, store patronage is the consumer's selection for a shopping outlet (Haynes et al., 1994). Some research has shown that clothing store patronage is related to fashion involvement for some consumers (Kopp, Eng and Tigert, 1989; McKinney et. al. 2004). Higher levels of fashion involvement have been associated with consumers who patronize department stores rather than discount stores (Tatzel, 1982). Thus, consumers who use clothing to enhance self-esteem tend to shop more in special (indicating more quality) and better department stores (McKinney et al 2004). On the contrary to suggest by the literature, the results rejected H_9. A possible reason for that outcome is that higher levels of fashion involvement could not be related with consumers who patronize department stores, because fashion clothing does not necessarily is buying in special (top) stores. In fact, fashion clothing could also be bought in discount stores (for example, tear-old-jeans or flannel-shirt), since the point is the way and the look that consumer uses the clothing.

In summary, table 4 presents the R^2 of the endogenous constructs. First, the research outcomes indicate that the fashion involvement construct lack of predictor variables, since 2,4% of the variance was explained by age (8% adding materialism construct). Second, commitment requires more antecedents, because of its 5,2% of variance is due to fashion involvement. On the other hand, confidence reached a $R^2=0,37$.

== **Table 4 about here** ==

Fashion Clothing Involvement as Mediator Construct

O'Cass (2004) comments that a major challenge facing involvement research lies not only in understanding involvement itself, but also in understanding the role involvement plays together with other variables in guiding the formation of purchase and consumption patters and experience of consumers of fashion clothing.

Looking for analyzing the function involvement plays together with other variables, the study tested the mediator factor of fashion clothing involvement in the model. Baron and Kenny (1986) suggested that variable functions as a mediator when it meets the following conditions: (i) variations in levels of the independent variable significantly account for variations in the presumed mediator (i.e., Path *a*), (ii) variations in the mediator significantly account for variations in the dependent variable (i.e., Path *b*), and (iii) when Paths *a* and *b* are controlled, a previously significant relation between the independent and dependent variables is no longer significant, with the strongest demonstration of mediation occurring when Path *c* is zero. Therefore, this study uses Baron and Kenny (1986) scheme for testing the mediation factor.

As a result, fashion clothing involvement mediates the relation between age and commitment. It means that when fashion involvement is addicted in the relationship the significance between age and commitment weakens. Thus, fashion involvement is crucial for young people in their decision making process. In addition, fashion clothing involvement mediates the relation between age and subjective knowledge. Again, age, the only significant construct that predict fashion involvement, plays a fundamental role in indirectly influencing subjective knowledge. Table 5 confirms these results and presents the values.

== **Table 5 about here** ==

Rival Models

Some additional tests were done looking for extending the fashion theory, according to rival models. The existing literature is somewhat inconclusive and perhaps a little contradictory regarding the relationship between product involvement and product knowledge in general (O'Cass 2004). Thus, we created 3 rival models that can be viewed on table 6. There are some evidences that suggested that product knowledge should be viewed as predictor to involvement (Zinkhan and Muderrisoglu, 1985), instead of dependent of it. Consequently, the first test suggested that only fashion clothing involvement could be dependent of knowledge (contrary relation). The results indicated support to that proposition

($p<0,000$; $\beta = 0,474$). The second test suggested that fashion clothing involvement could be dependent of commitment (Freire and Nique 2005). The results also indicated support to that proposition ($p<0,001$; $\beta = 0,225$). The last rival model analyzed the both propositions inverted at same time. It was supposed that knowledge and commitment could impact on involvement. According to the Table 6, just the knowledge construct influences involvement.

== **Table 6 about here** ==

As a complement, Table 7 exhibits fit indexes for the three alternative rival models. The model that receives both modifications at same time was the one that achieve the best fit indexes from the four models analyzed in this study, although it was not the model that more improves the R^2 of fashion involvement.

== **Table 7 about here** ==

Final Considerations

Responding to the purpose of this study, to test an extended theoretical model of fashion clothing involvement, it can be said that the fashion clothing involvement appears to be an important construct in the fashion segment, since some theoretical propositions were supported.

An important consideration is that the fashion involvement antecedents need to be more explored, because from the three constructs supposed to be antecedents, just one was supported. Moreover, the fashion involvement $R^2=0,02$ appears to be so low. In fact, more exogenous constructs need to be verified by future investigations to explain fashion involvement phenomenon. Second, the materialism construct might be lacking a psychometric instrument, given that the two scales used in this study failed. Therefore, future research could analyze the materialism construct with more details.

In addition, it is important to comment that even using the non reliability materialism construct, not only the $R^2=0,08$ had an frivolous increase, but also the first hypothesis was supported. The third latent conclusion is that fashion clothing involvement mediates two theoretical relations. The first one is between age and commitment, and the second one is between age and subjective knowledge. The fourth interesting result indicates that inverting both the relation between involvement-knowledge and involvement-commitment, the theoretical model achieve the best variance in the fashion involvement construct ($R^2=0,22$).

In summarize, the framework appears to be a valuable support in comprehending the dynamics of fashion consumption. Other studies might refine the model suggested here and advance more in the fashion involvement comprehension, mainly in the antecedents' part. Thus, consumers' behavior researchers might consider studying more the fashion clothing consumption with more fervor, since it has a significant importance to the clothing market.

References

Amine, A. (1998), "Consumers' true brand loyalty: the Central Role of Commitment", *Journal of Strategic Marketing*, vol.6, pp.305-319.

Auty, S., Elliott, R. (1998), "Fashion Involvement, Self-Monitoring and the meaning of brands", *Journal of Product and Brand Management*, vol.7, n.2, pp.109-123.

Baker, J., Levy, M., Grewal, D. (1992), "An experimental Approach to Making Retail Store Environment Decisions". *Journal of Retailing*, vol.68, n.4, pp.445-460.

Baker, J., Parasuraman, A., Grewal, D., Vloss, G.B. (2002), "The influence of multiple store environment cues on perceived merchandise value and patronage intentions. *Journal of Marketing*, vol.66, pp.120-141, April.

Baron, R.M., Kenny, D.A. (1986), "The Moderator-Mediator Variable Distinction in Social Psychological Research: Conceptual, Strategic and statistical considerations", *Journal of Personality and Social Psychology*, vol.51, n.6, pp.1173-1182.

Beatty, S.E., Kahle, L. R., Homer, P. (1988), "The Involvement-Commitment Model: theory and implications", *Journal of Business Research*, vol.16, n. 2, pp.149-167.

Belk, R. (1985), "Materialism: trait aspects of living in a Material World", *Journal of Consumer Research*, vol.12, December, pp.265-280.

Bloch, P. (1982), "Involvement Beyond the Purchase Process: Conceptual Issues and Empirical Investigation", *Advances in Consumer Research*, n.9, pp.413-417.

Browne, B., Kaldengerg, D. (1997), "Conceptualszing self-monitoring: links to materialism and product involvement", *Journal of Consumer Marketing*, vol.14, n.1, pp.31-44.

Burton, B., Netemeyer, R. (1992), "The effect of enduring, situational and response involvement on reference stability in the context of voting behavior", *Psychology & Marketing*, vol.9, n.2, pp.43-156.

Chebat, J. Picard, J. (1985), "The effects of price and message-sidedness on confidence in product and advertisements with personal involvement as mediator variable", *International Journal of Research in Marketing,* vol.2, pp.129-141.

D'Angelo, A., Espinoza, F.S., Neto, G.L. (2003), "A Influência da Atmosfera de Varejo sobre os Consumidores" *Proceedings of Anpad*, Atibaia-SP, pp.01-16.

Davila, Sergio. Mercado "descobre" homem vaidoso. Diponivel em http://www1.folha.uol.com.br/folha/equilibrio/noticias/ult263u2621.shtml acessado em 09/julho de 2006.

Elliott, R. (1994), "Exploring the symbolic meaning of brands", *British Journal of Management*, Vol. 5, pp. S13-S19.

Engel, J.F., Blackwell, R.D., Miniard, P.W. (2000), *Comportamento do Consumidor.* 8ªth. LTC Editora: São Paulo.

Flynn, L.R., Golsmith, R.E. (1993), "Application of the personal involvement inventory in marketing", *Psychology and Marketing*, vol.10, pp.357-366.

Fornell, C., Larcker, D.F. (1981), "Evaluating Structural Equations Models with Unobservable Variables and Measurement Error", *Journal of Marketing*, vol.18, n.1, pp.39-50.

Freire, K.M., Nique, W.M. (2005), "A influência do envolvimento com o produto e do comprometimento com a marca na lealdade à marca" *Proceedings of Anpad*, pp.01-16.

Freire, K.M., Nique, W.M., (2005) "O Papel do Envolvimento com o produto e do comprometimento com a marca em diferentes fases da lealdade de clientes", *Proceedings of Anpad*, Brasília-DF, pp.01-16.

Garson, David. Topics in Multivariate Analysis, Available in http://www2.chass.ncsu.edu/garson/pa765/factor.htm acessed in 13/02/2006.

Gill, J., Crossbart, S., Laczniack, R. (1988), "Influence of involvement, commitment and familiarity on brand beliefs and attitudes of viewers exposed to alternative ad claim strategies", *Journal of Advertising*, vol.17, n.1, pp.33-43.

Gutman, J., Mills, M. K. (1982), "Fashion life style, self-concept, shopping orientation, and store patronage: an integrative analysis", *Journal of Retailing*, vol.58, pp. 64–86.

Hair, Jr. J.F., Anderson, R.E., Tatham, R.L., Black, W.C. (1998), *Multivariate Data Analysis*. 5.ed. New Jersey: Prentice Hall.

Haynes, J.L., Pipkin, A.F., Black, W.C., Cloud, R.M. (1994), "Application of a choice sets model to assess patronage decision styles of high involvement consumers" , *Clothing and Textiles Research Journal*, vol.12, n.3, pp.22-31.

IEMI (2005), "Pesquisa traça perfil do bilionário mercado da moda", report from Instituto de Estudos e Marketing Industrial; available at http://www2.uol.com.br/canalexecutivo/notas/170620053.htm; accessed in 31/Dec.2005.

Iwasaki, Y., Havitz, M.E. (1998), "A path-analytical model of the relationships between involvement, psychological commitment and loyalty", *Journal of Leisure Research*, vol.30, n. 2.

Johnson, E., Russo, J. (1981), "Product familiarity and learning new information", *Advances in Consumer Research*, vol.8, n.1, pp.151-155.

Johnson, E., Russo, J. (1984), "Product familiarity and learning new information", *Journal of Consumer Research*, vol.11, June, pp.542-550.

King, C. W., Ring, L and Tigert, D., (1979), "Fashion Involvement and Retail Buying Behaviour," *Competition in Retail Markets: A Department Store Perspective* (Proceedings of the New York University/ American Marketing Association Retail Conference-April).

Kline, R.B. (1998) *Principles and Practice of Structural Equation Modeling*. New York: The Guilford Press.

Kopp, R. J., Eng, R. J., Tigert, D. J. (1989), "A competitive structure and segmentation analysis of the Chicago fashion market", *Journal of Retailing*, vol.65, pp. 496–515.

Law, L.M., Zhang, Z., Leung, C.S. (2004), "Fashion change and fashion consumption: the chaotic perspective", *Journal of Fashion Marketing and Management*, vol.8, n.4, pp.362-375.

McCracken, G., Roth V. (1989), "Does Clothing Have a Code? Empirical Findings and Theoretical Implications in the Study of Clothing as a Means of Communication" *International Journal of Research in Marketing*, vol. 6, pp.13-33.

McDonald, W.J. (1994), "Time use in shopping: the role of personal characteristics", *Journal of Retailing*, vol.70, n.4, pp.345-365.

Mckinney, L.N., Legette-Traylor, D., Kincade, D.H., Holloman, L.O. (2004), "Selected social factors and the clothing buying behavior patterns of black college consumers", *International Review of Retail, Distribution and Consumer Research*, vol.14, n.4, pp.389-406, October.

Meyers-Levy, J. Sternthal, B. (1991), "Gender difference in the use of message cues and judgements", *Journal of Marketing Research*, vol.28, n.1, Feb., pp.84-96.

Miranda, A.P.C., Garcia, M.C., Benício-de-Mello, S.C. (2001), "Fashion: object of desire", *Proceedings of Balas Conference*, pp.01-16.

Mirrione, H. (2005) "No meio da discussão quem ganha é o consumidor" available at http://www1.folha.uol.com.br/folha/especial/2005/moda16/mo1612200504.shtml; accessed in 31/Dec.2005.

Monteiro, P.R.R (2005), *Compra compulsive, inovação e hábitos de moda: teste de uma teoria fundamentada no modelo 3M de motivação e personalidade*, Máster Business Administration Thesis, Marketing Departament, Belo-Horizonte, CEPEAD-UFMG.

Noesjirwan, J., Crawford, J (1982) "Variations in Perception of Clothing as a Function of Dress Form and Viewers' Social Community", *Perceptual and Motor Skills,* vol.54, pp.155-163.

O'Cass, A. (2000), "An assessment of consumers' product, purchase decision, advertising and consumption involvement in fashion clothing", *Journal of Economic Psychology*, vol.21, pp.545-576.

O'Cass, A. (2004), "Fashion clothing consumption: antecedents and consequences of fashion clothing involvement", *European Journal of Marketing*, vol.38, n.7, pp.869-882.

Olsson, U., Foss, T., Troyne, S., Howell, R. (2000), "The Performance of ML, GLS and WLS Estimation in Structural Equation Modeling Under Conditions of Misspecification and Nonnormality", *Structural Equation Modeling*, vol. 7, n. 4,. pp. 557-595.

Pandjiarjian, P. (2004) A força do consumo adolescente. Availabe at : http://www.vendamais.com.br/php/verMateria.php?cod=39503. Acessed in 03 Jan 2005.

Parameswaran, R., Spinelli, T. (1984), "Involvement: a revisitation and confirmation", *American Marketing Association Educators Conference Proceedings*, AMA, Chicago, IL, pp.57-61.

Park, C., Lessig, V. (1981), "Familiarity and its impact on consumer decision biases and heuristics", *Journal of Consumer Research*, vol.8, n.2, September, pp.223-230.

Phelps, J., Thorson, E. (1991), "Brand familiarity and product involvement effects on the attitude toward an ad-brand attitude relationship", *Advances in Consumer Research*, vol.8, pp.202-209.

Raju, P., Reilly, M. (1979), "Product familiarity and information-processing strategies: an exploratory investigation", *Journal of Business Research*, vol.8, n.2, June, pp.187-212.

Richins, M., Dawson, S. (1992), "A consumer values orientation for materialism and its measurement: scale development and validation", *Journal of Consumer Research*, vol.19, n.2, p.303-316.

Sproles, G.B. (1974), "Fashion Theory: a Conceptual Framework", *Advances in Consumer Research*, vol.1, pp.463-472.

Tatzel, M. (1982), "Skill and Motivation in clothes shopping: fashion-conscious, independent, anxious, and apprehensive consumers", *Journal of Retailing*, vol.58, pp. 90–96.

Taylor, S.L., Cosenza, R.M. (2002), "Profiling later aged female teens: mall shopping behavior and clothing choice", *Journal of Consumer Marketing*, vol.19, n.4, pp.393-409.

Tigert, D., King, C., Ring, L. (1980), "Fashion Involvement: a cross-cultural analysis", *Advances in Consumer Research*, vol.17, pp.17-21.

Tigert, D.J., Ring, L.J., King, C.W. (1976), "Fashion Involvement and buying behavior: a methodological study", *Advances in Consumer Research*, vol.3, pp.46-52.

Trochim, William M. (2002), *Research Methods knowledge Base.* http://www.socialresearchmethods.net/kb/ [Accessed in June 2005].

Wendler, E.R. (1983), "Consumer Information and Confidence: moderating effects of perceived comprehension and risk", *Advances in Consumer Research*, vol.10, pp.364-369.

Zanjonc, R., Mirrisette, J. (1960), "Cognitive behavior under uncertainty and ambiguity", *Psychological Report*, vol.6, February, pp.31-36.

Zinkhan, G., Muderrisogly, A. (1985), "Involvement, Familiarity, Cognitive Differentiation and Advertising Recall: a test of convergent and discriminant validity", *Advances in Consumer Research*, vol.2, pp.356-361.

Figure 1: Fashion Clothing Involvement Theoretical Model
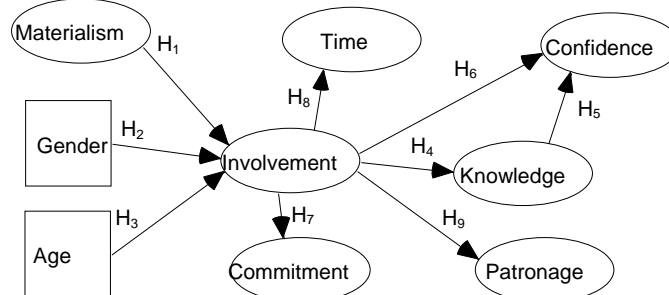
Table 1: Unidimensionality Test Using Exploratory Factor Analysis

Construct	Items	Dimensions after EFA	KMO	Bartlett (*p*<0,01)	Alpha (α)	VE%
Involvement	3	1	,55	,000	,66[a]	61%
Knowledge	2	1	,50	,000	,73	78%
Confidence	3	1	,69	,000	,81	73%
Materialism	5	2	,58	,000	,55[b]	36%
Time	3	1	,54	,000	,58[c]	55%
Patronage	4	1	,80	,000	,86	72%
Commitment	3	1	,72	,000	,85	77%

Note: KMO=Kaiser Test; VE=Variance Extracted; EFA using Principal Axis-Oblimin; [a] After excluding the "invol_1 it was VE with 84%" and α=0,82; [b] After excluding the "mat_5" it was one dimension (unidimensional) with 44% and α =0,57; [c] After excluding the "time_3" it was VE with 73% and α =0,71.

Table 2: Correlation Matrix and Discriminant Validity

Measure	Mean	s.d.	AVE	CR	Invol	Know	Confid	Mat	Time	Patr	Co.
Involvement	3,27	1,46	,71	,83	1	,11	,03	,02	0,2	,00	,02
Know	3,31	1,49	,66	,79	,33**	1	,23	,06	,16	,09	,13
Confidence	4,82	1,51	,61	,82	,18**	,484**	1	,02	,10	,13	,05
Material.	3,25	1,46	,33	,59	,142*	,253**	,157**	1	,08	,05	,04
Time	3,54	1,89	,70	,81	,132*	,397**	,314**	,279**	1	,09	,02
Patronage	4,88	1,42	,63	,87	-,004	,301**	,359**	,225**	,293**	1	,07
Commit	2,55	1,48	,66	,85	,141*	,360**	,224**	,203**	,136*	,259**	1

Note: The upper triangle means correlations squared (r^2); Correlations $p<0.05$ **, and at the $p<0.01$ *

Table 3: Final Path Coefficients and Hypothesis Test

Hypothesis	β standard.	t-value	*p* value	Hypothesis
Materialism → Involvement	*	*	*	H_1: no tested
Gender → Involvement	0,01	0,22	,822	H_2: rejected
Age → Involvement	-0,15	-2,39	,017	H_3: supported
Involvement → Knowledge	0,47	5,89	,000	H_4: supported
Knowledge → Confidence	0,63	6,74	,000	H_5: supported
Involvement → Confidence	-0,05	-0,68	,499	H_6: rejected
Involvement → Commitment	0,23	3,34	,001	H_7: supported
Involvement → Time	0,17	4,11	,000	H_8: supported
Involvement → Patronage	0,08	1,18	,239	H_9: rejected

Table 4: R-Squared of the Dependents Constructs

Significant Antecedents	Hypothesis	R²
Fashion Involvement	Time	0,03
Age	Fashion Involvement	0,02
Fashion Involvement	Commitment	0,05
Knowledge	Confidence	0,37

Table 5: Fashion Clothing Involvement as Mediator Factor

Path	Hypothesis	β standard.	*p* value
A	Age → Involvement	-0,15	0,017
B	Involvement → Commitment	0,23	0,001
C	Age → Involvement → Commitment	-0,02	0,688
A	Age → Involvement	-0,15	0,017
B	Involvement → Knowledge	0,47	0,000
C	Age → Involvement → Knowledge	-0,05	0,462

Table 6: Final Path Coefficients in the Rival Models

Hypothesis	Knowledge		Commitment		Both	
	β stan	*p*	β	*p*	β	*p*
Knowledge → Involvement	0,47	0,000	-	-	0,46	0,000
Commitment → Involvement	-	-	0,22	0,001	-0,00	0,964
Involvement → Knowledge	-	-	0,47	0,000	-	-
Involvement → Commitment	0,22	0,001	-	-	-	-
Gender → Involvement	0,11	0,071	0,01	0,809	0,11	0,056
Age → Involvement	-0,11	0,069	-0,15	0,019	-0,10	0,076
Knowledge → Confidence	0,63	0,000	0,62	0,000	0,62	0,000
Involvement → Confidence	-0,05	0,526	-0,05	0,499	-0,04	0,585
Involvement → Time	0,16	0,000	0,17	0,000	0,14	0,000
Involvement → Patronage	0,07	0,256	0,08	0,239	0,06	0,318

Table 7: Fit Indexes for the Rival Models

Model	χ²/d.f.	AGFI	GFI	TLI	IFI	CFI	RMSEA	Involvement R²
Original Model	2,97	,82	,87	,86	,88	,88	0,08	0,02
Knowledge → Involvement	2,96	82	,87	,86	,88	,88	0,08	0,24
Commitment → Involvement	3,02	,82	,87	,86	,88	,88	0,08	0,07
Both modifications	2,79	,84	,89	,87	,90	,90	0,07	0,22