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An empirical research of the factors determining customer behaviour in food retail stores

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Abstract

For years the **Institute of Marketing at Szent István University** has been conducting research in customer and consumer behaviour. This research project focuses on which food shops retail customers choose when it comes to traditional food⁴. This paper briefly summarizes qualitative findings and offers a preliminary analysis of the project's quantitative stage.

Using six focus groups, the **qualitative phase** tried to identify factors that impact on how food retail shops were chosen. The goal was to pinpoint individual steps in the decision-making process. Shops selected for study were: hypermarkets, supermarkets, discount stores, small shops, markets, specialised stores and cash & carry stores. Following this, using data from the qualitative results, a **national representative survey** was conducted. The survey used a standardised questionnaire with **1,019 subjects**. The survey concentrated on hypermarket customers, as well as identifying this customer group's segments, and analysing their decision-making traits.

Keywords

Kelly's repertory grid technique, Qualitative research, Quantitative research, Monroe & Gultinan's store choice model, Donovan & Rossiter's store atmosphere model, store characteristics, segments of hypermarket patrons.

1. Theoretical background

Previous studies conclude that food retail stores' market strategies are largely determined by suppliers, competitors, and consumer decisions. Marketing-oriented approaches emphasise the significance of consumer needs, i.e., their preferences and the factors behind their choices. Because of the current need to adapt to the market, and the emphasis on profits, customer choices are increasingly considered. Consumer and customer behaviour theories contend that choices are primarily made about products, and retail patronage entails only a minor factor in the consumer's choices. (Kotler, 1998).

Amstutz's (1967) customer decision flow diagram underlines the significance of decision-making in patronage, as this model regards the purchase process as a composite of product, brand, and channel of communication choices combined with price acceptance. Another model based on a close relationship between the purchase process and retail patronage choice was outlined by **Hawkins, Best & Coney** (1986). Hawkins, Best and Coney's model was based on the customer decision-making process established by **Engel, Kollat & Blackwell** (1978). The former model points out that the problem identification phase, plus the search for information and evaluation of alternatives, is followed by decision-

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making. However, this decision-making includes not only product choice, but also purchase point choice. Later comes a post-purchase comprehensive evaluation.

Heinemann's (1974) model retail store choice also describes five distinct steps, but differs by analysing the decision-making process through the retail patronage decision. The steps are the following: identifying purchase reasons, searching for alternatives, evaluating alternatives, selecting a given retailer, choice evaluation.

Based on the evaluation criteria and phase, **Engel, Blackwell & Miniard's** (1987) model differs when researching customers' decision-making processes. The two main aspects are general criteria (location, distance, choice of products, price, advertising and promotion, staff, services) and perceived store characteristics (image evaluated by customers and judged either acceptable or unacceptable as a composite of all the factors considered).

However, **Tietz** (1993) and **Arend-Fuchs** (1995) consider retail patronage choice as a three-dimensional decision-making process. The customer evaluates and selects products (brands) and retail unit types, and then finishes at the optimal purchase point. Here choice of product, store type, and of purchase point are related to the customer's qualitative and quantitative characteristics. Quantitative characteristics include demographic and social factors as well as reference group choices, whereas qualitative characteristics encompass attitudes, lifestyle, purchase habits and patterns.

According to **Olach** (1999), the criteria for decision-making can be modelled mathematically, using the following formula:

$$\frac{4T + 3S + 1R + 4V}{4}$$

T stands for distance from home, work or usual place for leaving public transport;

S stands for choice and quality of products;

R stands for a system of reference points;

V stands for staff behaviour and attitude.

Related research for the Hungarian context was done by **Kenesei** (2002) and focuses on customer loyalty in the decision-making process; **Töröcsik** (1995) also provides a theoretical taxonomy for retailers.

The current research project is based on the most comprehensive retail patronage theory, a model by **Monroe and Gultinan** (1975), which **Assael** (1984, 92) presented in a simplified form and which was later adapted to the Hungarian setting by **Hofmeister-Tóth and Töröcsik** (1996). The model considers several steps in the decision-making process. Initially, household characteristics (demographic data, location, role, lifestyle, personality, economic situation) determine purchase needs, and are placed beside purchase habits. During the decision-making process, the customer perceives information about retail store types and characteristics, of which a large proportion remains sub-conscious. Perceived store characteristics, complemented by perceived retail strategies, are filtered through attitudes, forming a comprehensive image for a particular store. A decision is made, further information is collected within the selected shop, and necessary products are purchased within the household budget. According to the model's circular nature, previous experience shapes the customer's purchase behaviour, habits and attitudes, and influence future decisions.

Besides the above model, **Donovan and Rossiter's** (1982) store atmosphere model provides the theoretical bases for the current study. Store atmosphere is defined as a customer's sub-conscious emotional state formed while shopping and which impacts on future decision-making. The model is environmental/psychological and describes store atmosphere effect on purchasing behaviour and retail patronage. It details how the immediate environment's stimuli affect the customers' emotional state (pleasure, excitement, dominance) and thus patterns of acceptance or avoidance. Acceptance means moving closer to environmental stimuli, whereas avoidance leads to rejection of stimuli and thus of stores.

Monroe & Gultinan and Donovan & Rossiter's models will be connected at the following junction points: environmental stimuli and perceived characteristics of stores; and acceptance-avoidance reactions and decision toward a particular retail store.

2. Research questions for the qualitative study

1. Researching the retail patronage model's adaptability (Monroe & Gultinan, 1975) and the store atmosphere model (Donovan & Rossiter, 1982) to the Hungarian food retail market.
2. Exploring the segmentation of retail patronage choices.
3. Describing perceived store characteristics and store atmosphere elements. Characterising different store types' typical patrons.
4. Researching purchase strategies applied in the process of store selection. Exploring prices and promotions' role. Explaining the relationship between product choice and retail unit choice. Analysing the situational nature of shopping.

3. Research methodology

3.1. Sample

In the project's first part, **six focus groups** were formed to explore factors affecting the retail store type choice so to construct a complex picture all steps toward choosing a food retail store. This qualitative phase of the research was the starting point and basis of the subsequent quantitative phase. The sample focus groups' population had the following characteristics:

Table 1

Participants of the qualitative study

	18-24 ys of age	25-34 ys of ages	35-44 ys of age	45-54 ys of age
Female	5	11	6	10
Male	5	3	4	4

Source: Own data.

3.2. Method of data collection

3.2.1. Focus groups

The first part of the focus group interviews was conducted in a semi-structured format, lead by a moderator, with the basic goal of appraising the issues in decision-making regarding food retail stores. The topics discussed were the following:

- food purchase habits,
- different store types' description and comparison,
- the role of time,
- shopping and patronage strategies,
- the role of store characteristics and store atmosphere element in the decision-making process,
- the role of information,
- the role of products, prices and quality,
- the role of on-site services.

3.2.2. Kelly's repertory grid technique

In the second step, all participants filled in a **39-item checklist** for each of the store types: small shops, hypermarkets, supermarkets, cash & carry stores, discount stores, specialised shops and markets. Kelly's repertory grid technique was used for the compilation and evaluation of the questionnaire. The main question was the following: *To what extent are the following statements true for small shops, hypermarkets, supermarkets, cash & carry stores, discount stores, specialised shops and markets?* Opposites were placed at the endpoints, and participants had the choice of a 5-point scale between them.

When analysing the results statistically, it is essential to consider that due to the partly qualitative nature of the data and the low number of participants, the generalisability and the reliability of the results are low and unsuitable for drawing well-founded conclusions. The data could only be used as a starting point for further research and for drawing up the basic outline of the food store patronage issue, not to draw final conclusions.

4. Qualitative research results

4.1. Adaptability of models

In the first step of the analysis, it was important to discover the applicability of Monroe & Guiltinan's (1975) store patronage model and of Donovan & Rossiter's (1982) store atmosphere model. The exploratory, qualitative phase of the research seems to support these models' adaptability to the Hungarian food retail patronage situation.

4.1.1. Relationships between customer characteristics and retail patronage

Obviously, general characteristics such as age, gender, community, financial situation and marital status impact greatly on food retail patronage. Psychological factors (role in family, lifestyle, value judgements and personality) also play a role. Further quantitative research is needed to establish clear-cut customer segments based on these characteristics

and the exact interaction of various factors; however, clearly these are the general aspects that determine final decision-making.

The customer's **community** is of utmost importance, as location determines the available store types. In the capital city options range from hypermarkets to small shops and other large cities; however, villages usually only have one small shop and in a nearby town there is possibly a hypermarket. These possibilities are filtered through various consumer groups' mobility factor.

As for **gender**, previous research on consumer behaviour indicated, and the data available confirmed, that men tend to be more rational consumers. Regardless of marital status, their shopping is need driven, and this holds true for larger volume weekend shopping. For women shopping as a freetime activity is more prevalent.

Marital status and related lifestyle seem to emerge as a significant factor: singles' decision-making strategies, as well as those of couples and families differ significantly.

Income and the household financial situation are significant: lower income families are attracted to discount stores and hypermarkets with promotions and discounts; however, there are limited by the opportunities available in a given community.

Based on the qualitative research data, the role of **age** cannot yet be ascertained, and in the subsequent quantitative phase it requires further attention.

Besides the above demographic factors, **psychological factors** are also important. Based on attitudes toward shopping as an activity, the following group characteristics form consumer clusters: shopping as a necessary task, shopping for pleasure, need for information and communication, innovation in shopping, price sensitivity, attraction to discounts and promotions, brand loyalty, demand for high quality, practicality, impulse shopping, and planned and scheduled shopping.

A **crucial factor** that has not so far been mentioned and has been neglected in some previous research is **time**. Its importance is on the rise, and nowadays impacts as greatly as age or gender, especially in the planning phase and at the level of forming purchase and shopping strategies. In the near future, as society and family patterns become more polarised and diverse, it is expected that time will become a key segmentation factor.

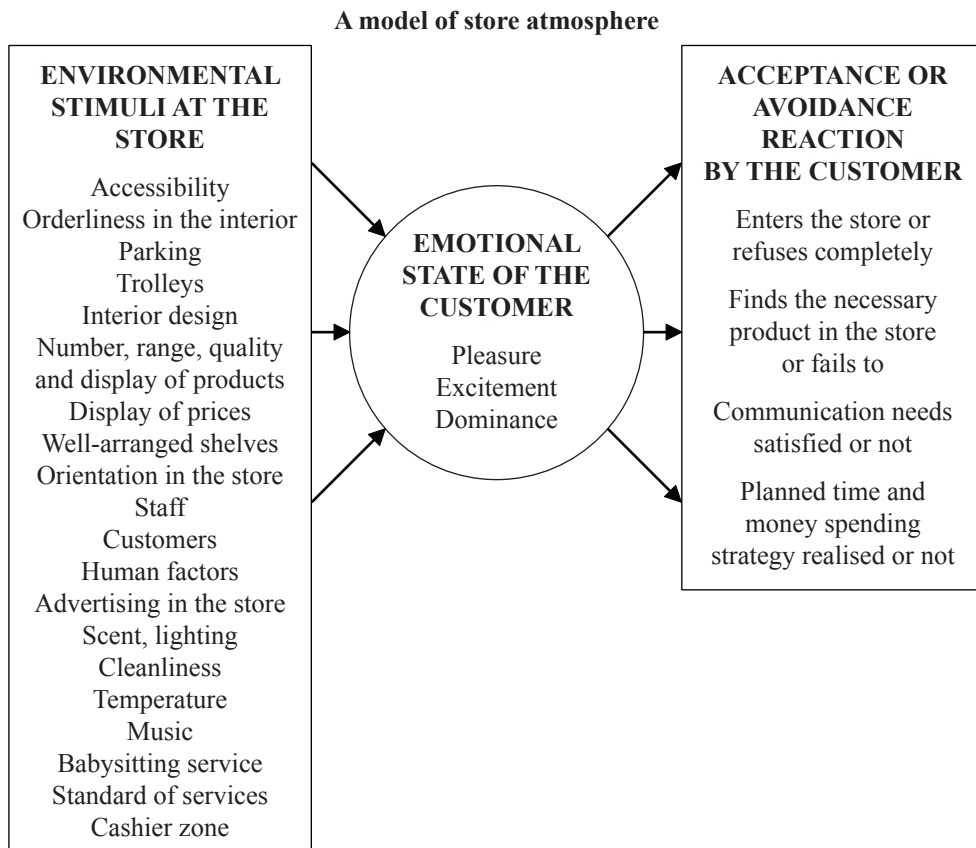
4.1.2. The importance of actual and perceived store characteristics

The above social and psychological factors determine which store characteristics are considered most important. The disjointed group of perceived characteristics filtered through selective attention, distortion and memory reflect the larger group of objective store characteristics. Based on the focus group research phase, the factors determining store patronage are the following: the store's general atmosphere, staff, other customers, payment options, prices, products' quality, product choice, discounts and promotions, opening hours, accessibility, parking, trolleys, services available, orientation within the store, brochures and in-store advertising. The customer considers these aspects, and maps them onto the list of characteristics deemed paramount; in the next step, as a result of the comparison, acceptance or avoidance reaction is formed.

In the current research, special emphasis is placed on store atmosphere elements; in Figure 1 results are summarised, using **Donovan & Rossiter's (1982) store atmosphere model** as a starting point. Store atmosphere is defined as *conscious planning of the shopping environment with the aim of eliciting certain emotional responses from customers that enhance the probability of purchase*. However, it is essential to clarify that all factors in the decision-making process can eventually be classified as atmosphere elements as they determine or at least influence the customers' habits at a conscious or sub-conscious level.

When interpreting the model, it is clear that acceptance or avoidance attitudes come from two groups of factors. Environmental store stimuli are essentially uniform for all customers; however, their differing needs and perceptions render them a unique personal combinations of factors. These depend on the customer's momentary emotional state, which is described as a mixture of pleasure, dominance and excitement. At the end of this process the potential customer accepts or refuses (avoids) the given store. In the step after acceptance, the shopping experience is evaluated against three criteria: whether the need for a certain product is satisfied, whether communication needs are satisfied, and whether the planned time and money spending goals are achieved. The final evaluation of these factors, information processing, and in-store decisions together determine whether to later return to the store, or avoid it altogether.

Figure 1



Source: Donovan & Rossiter (1982)

4.1.3. Decision-making Characteristics and strategies

Habits formed during repeated shopping trips have an important influence on subsequent choices and store patronage. Naturally, when interpreting the role of habits in decision-making, the limiting effect of the household budget has to be considered, as nowadays it is the key factor in choosing stores, products and brand. Habits and patterns are formed as a result of rational, objective and subjective factors, from which the cluster of objective factors was detailed during the qualitative research. Years of experience in shopping and the resulting shopping and purchase strategies are decisive depending on the nature of the shopping, whether it is purchase-oriented (task accomplishment) or shopping-oriented (seeking pleasure) (Hofmeister & Töröcsik, 1996). Basic shopping strategies include daily, weekly, weekend and monthly shopping. Irrespective of the above pattern, impulse shopping also appears. Also possible are a mixture of impulse and planned shopping. Other basic forms include shopping for discounts and shopping for special occasions. Day-to-day routine creates strategies of “it’s on the way”, “same product from same store”, “all from one store”, or “listening to advertisements”. A strategy characteristic of young single households is called “day-by-day”.

Both the established patterns of shopping habits and the decision-making behaviour can be modified by the company available for shopping (alone, with family, with friends), and by the person who usually makes the final decision about the purchase of a given type of product.

Therefore, one can conclude that the above factors form the three pillars of decision-making’s situational shopping character, meaning previous experience, time perspective, and task identification. The remaining two pillars, the physical and social surroundings, are atmospheric elements.

4.1.4. Decision on retail patronage

Characteristics considered important by individual customers are a reflection or perception of a retail strategy, some of which participants listed and negatively evaluated. Customers are aware of how significant discounts and sales are, but are generally critical toward the constant competition between stores. Furthermore, a common remark was that food retail stores use all possible “tricks” to gain customers. The word “trick” is hardly a flattering perception of commercial marketing; regrettably, for consumers, honesty and strategies are far apart.

Perceived characteristics, customer characteristics and habits, and experiences contribute to the formation of attitudes toward all store types, and have an immediate impact on the actual patronage decision-making.

After having selected the suitable store for current needs, the process is far from over, as the customer faces a wealth of information within the store prior to the actual purchase. The nature and amount of information varies with location and store type; however, one can outline some general pitfalls. A wide range of products could impair the decision-making process and purchase, especially early on, when the customer is not yet cognizant of the store layout. Oversupply of products, constant rearranging, irregular grouping of goods, unclear price tags, outdated promotion labels, an abundance of in-store advertisements, lack of information and helpful staff are all factors hindering speedy information processing and

swift, problem-free decision-making. A participant expressed the following attitude: “Ideally I could find everything with my eyes closed.”

At the end of the process, a product is selected. Following the previous logic, the customer first chooses a store, but a brand and product only within the store; however, with rare and special products, these steps can change order, which in turn influences store selection. Based on focus group data, the conclusion is hardly clear-cut. In some cases, the customer is satisfied with the products purchased and the store’s service, and decides to return, thus repeating the decision-making process. But after purchase the customer may find the product inadequate or to have expired, and then not only the producer is blamed, but also the retailer, and an avoidance strategy might result. In other words, adequate service accompanied by inadequate product service can have negative consequences. Choosing products and brands entails various elements and factors that the retailer must not neglect, irrespective of the retailer’s market size and position. When formulating product policy, quality and reliability are key issues, as these product attributes are likely to inspire loyalty. Selling specialized *niche* products could prove a useful retail strategy as research has shown that in the market there is room for more than „one-stop shopping” stores.

One cannot ignore retail stores’ own-brand products. Results so far reveal that customers consider them cheap low quality goods with poor packaging that might prove unhealthy, even though they know these products are also produced by recognised factories that have their own quality brands.

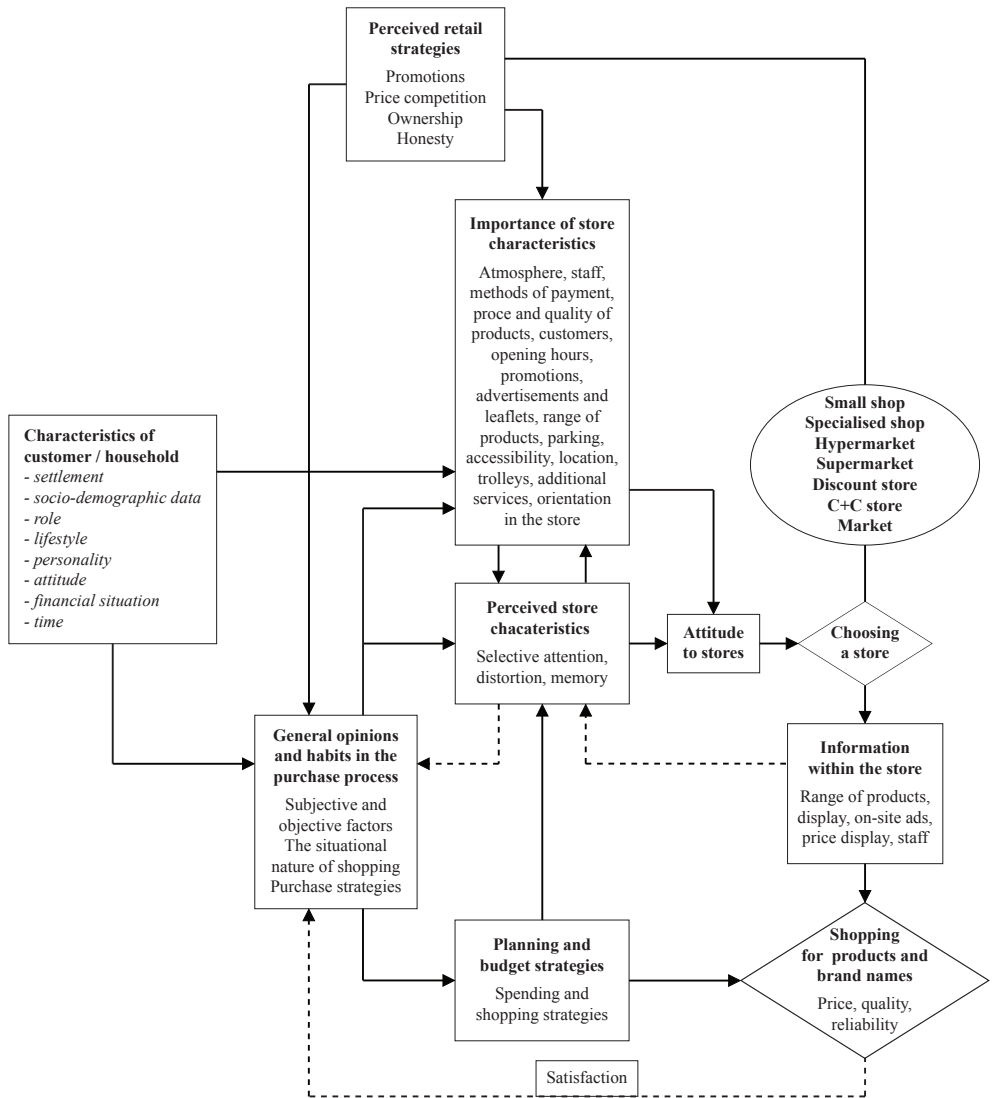
In Figure 2 is a summary of factors discussed so far.

To date the information and results show that store patronage and decision-making are multi-dimensional complex processes. Every step in the complete model is relevant for the first visit to a store. However, to describe day-to-day decision-making regarding food stores the separate dimensions can serve as sub-models. A clearly separate initial phase is when the customer collects information, evaluates it, and makes a decision, based on perceived store characteristics. In the process the store and the product have an equal weighting, regardless of the sequence for two separate decisions regarding store and product. The Monroe & Gultinan model and the Donovan & Rossiter models correspond with each other at the level of in-store decision-making.

A separate decision-making path is when the customer chooses a product based on habits and regular shopping and purchase strategies. Here, as a result of previous choice, the product/store relationship is fixed.

Figure 2

Sequence of effects on retail patronage decision-making



Source: Monroe & Guiltinan (1975)

4.2. Perceived characteristics of store types

In the second part of the paper, three methods are used to analyse the checklists completed by the participants.

In the checklist’s first part, focus was on perceived store characteristics. The results indicate the participants’ opinion regarding different food retail stores’ general characteristics and attributes. It should be noted that customers evaluate the store types based on a composite of important characteristics rather than definitions provided in the pertinent literature. In the next phase individual factors’ effect on the various distinct steps of the decision-making process will be investigated in a quantitative research project.

Table 2 lists the most distinct characteristics of store types, based on statements from the checklist.

Table 2

Store type characteristics as perceived by customers

CHARACTERISTICS	PERCEIVED ASPECTS
Location of stores	Hypermarkets and C+C stores are located in the outskirts, other store types are closer to the centre
Reliability of products	Hypermarkets and supermarkets are the most reliable, small shops and markets are the least reliable
The traditional character of range of products	The range of products in hypermarkets, supermarkets and C+C stores is fundamentally different from more traditional retail points
The role of own brands	Hypermarkets, supermarkets and C+C stores have their own brands
Product package size	Large product sizes and buying in bulk are characteristic in hypermarkets and C+C stores
Promotions	Hypermarkets offer the largest number of promotions, followed by discount stores and supermarkets
Prices	Hypermarkets have the lowest prices, small stores and specialised shops have the highest prices
Opening hours	Hypermarkets have the longest opening hours, time is not a limiting factor
Accessibility	In the case of stores outside the centre, public transport, access roads and suitable parking places are of utmost importance
Waste of time in the store	The small number of cashiers is a problem at large stores, shopping is quickest in small shops and specialised shops
Clean, friendly environment	Small shops and specialised shops are perceived the best, hypermarkets the worst regarding cleanliness and atmosphere
Crowd	Hypermarkets have the most products and the most people
Staff	Difficult to contact in hypermarkets, most helpful in small shops and specialised shops
Related services	Pointed out as one of the most important advantages of hypermarkets
On-site advertisement	Hypermarkets and supermarkets are “information bombs”

Source: Own data

To group store types based on 39 items' average values store characteristics were submitted to factor analysis . Data were suitable for factor analysis (KMO: 0.721, Bartlett spherical test Approx.Chi Square = 203.742, Sig. = 0.000). The Maximum likelihood method was selected, Varimax rotation was applied. The resulting three factors account for 79.811% of variance. Factor loadings for the three factors are presented in Table 3 in the form of a rotated factor matrix.

Table 3

Rotated factor matrix: store types and their factor loadings

	Factor		
	1	2	3
HYPERMARKETS	0.965	-0.149	0.212
C+C STORES	0.824	-0.282	0.145
<i>SPECIALISED SHOPS</i>	-0.348	<i>0.897</i>	0.272
<i>SMALL SHOPS</i>	-0.310	<i>0.688</i>	0.412
<i>MARKETS</i>	-0.036	<i>0.521</i>	0.156
DISCOUNT STORES	0.181	0.351	0.901
SUPERMARKETS	0.401	0.354	0.721

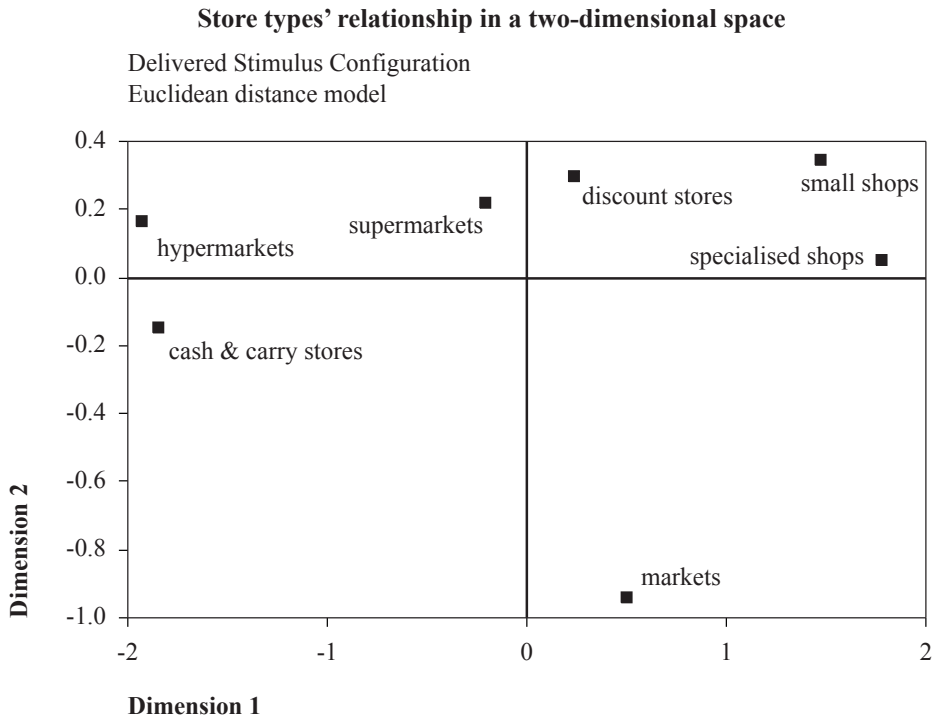
KMO = 0.721 Bartlett Approx.Chi-Square = 203.742 Sig = 0.000

Rotation Sums of Squared Loadings (%) = 79.811 Maximum likelihood, Varimax

Source: Own data

The groups formed as a result of the factor analysis above are further justified by a two-dimensional MDS plot of scaled store characteristics. The only difference is regarding the classification of markets: in the factor analysis they were related to small shops and specialised shops, but appear in the MDS plot, presented below as Figure 3.

Figure 3



Source: Own data

The analyses show that hypermarkets and cash & carry stores form the first group; specialised shops, small shops and, to some extent, markets compose the second, whereas, discount stores and supermarkets are in the third. The results lend themselves to interpretation: the relationship between large-sized hypermarkets and cash & carry stores is not surprising as both provide a wideproduct selection and constant discounts, and are characterised as “information bombs”. However, small shops, specialised stores and markets with fewer products and a more intimate atmosphere offer a more traditional and familiar feel. Moreover, to some extent markets seem unique as they have a distinct character and choice of products. Customers perceive supermarkets and discount stores as almost identical and many find it difficult to distinguish between them.

In the next step, to analyse the checklist results, **Kelly’s repertory grid technique** was also applied. The version adapted by Grunert & Steenkamp (1989) for marketing research was used. This technique enabled the researchers not only to establish store type groups, but also to classify decision-making process factors. We were able to certify that the store types correspond to the MDS plot results. One can conclude that the following distinct groups are formed: hypermarkets and cash & carry stores ($r = 0.97$); discount stores and supermarkets ($r = 0.97$); specialised shops and small shops ($r = 0.95$); markets. On the horizontal (perception) part of the grid this classification is displayed. The vertical (mental) part of the grid displays the related store characteristics, detailing how the above listed store type groups were formed. An analysis of the mental map revealed that there are two distinct characteristic categories influencing decision-making.

Atmospheric elements compose the first group, such as the number of customers and products, cleanliness, order, orientation, helpful staff, cashiers, general atmosphere. The second cluster of factors is related to *efficient shopping*: elements include accessibility, parking, trolleys, amount of information, availability of staff, and services. It is important to note that *prices and discounts* are completely independent and unrelated to either group, supporting the supposition that prices are a part of the planning and budget strategy, and have an independent impact on the decision-making process at a different phase.

5. Research questions for the quantitative study

1. The frequency of visits to the different food retail store types. (Categories: daily, 4-5 times a week, 2-3 times a week, weekly, every two weeks, monthly, rarely, never.)
2. The time and money spent on an average shopping trip when shopping for essentials.
3. The time and money spent on a average shopping trip when shopping for supplies.
4. The usual place of purchase for basic food types.
5. Characterising the individual store types using the adjectives elicited in the qualitative phase (friendly, honest, familiar, modern, pleasant, huge, weird, nice, small, special, run-down, warm, reliable, out of date, practical, dishonest, orderly, cold, free, colourful, good quality, clean, attractive, quiet).
6. The perceived characteristics for different store types.
7. The customers' attitudes to different store types.
8. Characterising customer types based on their attitude to shopping and decision-making regarding patronage, shopping, and purchase habits.
9. The following store types were considered: discount stores (Penny, Plus, Profi), supermarkets (Match, Smatch, Spar, Billa, Kaiser's), hypermarkets (Tesco, Auchan, Cora, Interspar), cash & carry stores (Metro, Interfrucht), specialised stores (bakery, dairy shop, greengrocer's, butcher's, sweets shop), markets, small shops.

6. Research methods

6.1. Sample

Sampling was based on the strict random walking method with 110 starting points, structured sampling, and a matrix considering community and region. The resulting representative sample ($N = 1029$) was gathered using census data by the Central Statistical Office for the year 2001, the components being age, gender, level of education, region and community. In 2005 data were collected from personal home interviews, using a *standardised questionnaire* constructed with the help of data from previous research.

6.2. Characteristics of the sample

Table 4

Sample's demographic characteristics (N = 1029)

Gender	Female 53%	Male 47%			
Qualification	Primary school or lower 45%	Vocational school 19%	Secondary school degree 25%	College or university degree 11%	
Age group	15-24 years of age 17%	25-34 years of age 18%	35-49 years of age 25%	50-64 years of age 22%	over 65 years of age 18%
Marital status	Single, staying with parents 19%	Single, living alone 6%	Married 50%	Divorced 10%	Widowed 14%
Income	Low 20%	Lower-middle 17%	Upper-middle 15%	High 15%	
Place of residence	Budapest (capital city) 18%	Village 35%	Small town (less than 50,000 inhabitants) 28%	Town (more than 50,000 inhabitants) 19%	

Source: Own data

7. Quantitative study's results and analysis

7.1. Frequency of patronage spanning store types, average patronage

Table 5

Frequency of patronage across retail store types in the entire sample, in %, N = 1029

	Daily	4-5 times a week	3-4 times a week	Once a week	Once every two weeks	Once a month	Less frequently	Never
Hypermarket	1	1	5	11	11	22	21	26
Supermarket	5	4	6	10	7	8	17	40
Discount store	9	4	6	14	6	12	21	26
Cash and Carry	0	0	0	2	2	8	24	60
Specialised shop	11	4	9	17	7	4	16	29
Small shop	36	9	13	10	4	3	12	13
Market	2	2	6	19	6	8	28	27

Source: Own data

It is essential to point out the statistically significant relationship between patronage and demographic data. Listed below are the majors ones. In all cases Pearson Chi Square is lower than 0.05.

- Regarding gender, the lack of significant differences is the typical trend. Men tend to visit cash & carry stores frequently, and shop at small shops every two weeks or monthly. Daily visitors to markets tend to be women.
- Regarding community types, those living in villages and small towns visit hypermarkets the least frequently. Those living near the capital visit weekly or monthly. Customers in villages visit small shops for daily shopping, whereas those in cities frequent them on a monthly or biweekly basis.
- Regarding occupation, retired customers do not visit any store types very frequently.
- Regarding income, it is noteworthy that generalisability and conclusions are limited by distortions from participants. Nevertheless, it can be concluded that frequent specialised shop visitors tend to have a high income. Furthermore, those who visit small shops daily tend to have a low income, whereas weekly visitors to small shops classify themselves as middle or high income.

In the current phase of the research, a further area to investigate was the typical place of purchase for certain product categories. Table 6 summarises the results.

Table 6

**The relative frequency of retail store patronage broken down for food types
(in %, for the entire sample of N = 1029)**

	Discount store	Super-market	Hyper-market	Cash and Carry	Specialised shop	Market	Small shop	Does not buy product	No answer
Bakery	12.2	9.5	6.5	0.3	17.0	1.6	46.6	4.9	1
Dairy	16.1	11.9	9.5	0.8	5.5	2.4	44.7	6.7	2
Frozen	16.5	10.9	22.4	1.9	1.5	0.4	14.9	29.9	1
Instant	14.8	10.0	20.7	2.1	1.0	0.4	12.5	36.6	1
Sweets	18.8	11.6	15.6	1.2	2.5	1.1	34.7	12.4	2
Soft Drink	19.6	11.2	16.9	2.4	1.5	0.3	33.2	13.6	1
Alcohol	11.1	6.2	15.7	2.5	0.8	0.3	18.6	43.5	1
Alternative food	4.2	3.6	6.4	0.4	3.1	1.6	4.6	74.5	1
Bio food	3.0	2.4	4.1	0.1	3.5	2.5	3.7	78.9	1
Vegetables and fruits	7.0	4.8	7.0	0.6	18.6	28.0	13.7	18.1	2
Canned	21.1	9.1	21.4	3.3	1.1	0.4	20.5	20.9	2
Sauce, dressing	15.4	9.4	17.5	2.1	0.6	0.1	10.5	42.3	2
Cold cut	16.9	11.1	12.2	1.4	7.7	2.2	36.3	9.6	2
Meat	8.9	7.1	15.4	1.8	25.7	9.9	11.9	16.8	2
Mineral water	20.1	9.3	19.9	3.2	1.2	0.6	23.0	20.5	2
Spices	22.5	11.9	23.6	2.7	1.3	0.5	27.9	7.8	1
Coffee, tea	22.8	11.8	22.7	3.3	1.5	0.7	26.7	8.6	1
Flour	23.2	11.7	23.5	3.2	1.5	0.4	26.3	8.5	1
Egg	9.7	6.4	7.4	0.7	7.8	19.9	17.9	28.3	1

under 5%
(very rarely)

5% - 10%
(rarely)

10% - 20%
(sometimes)

20% - 30%
(often)

over 30%
(very often)

Source: Own data

It is obvious that, for bakery and dairy products, small shops dominate. The hypermarkets' share is limited to planned shopping for supplies sprees, or to those living near hypermarkets and they tend to be women over 50 in smaller cities in the countryside who live in housing estates.

When it comes to planned weekend or monthly shopping trips, hypermarkets are the main outlet for frozen and canned goods, mineral water, spices, tea and flour. For daily supplies falling in the previous categories, small shops are most commonly used.

7.2. Perceived store characteristics

In the following step, only the hypermarket patrons' results are analysed; from the sample were excluded those shoppers who never visit this kind of store (N = 739). However, other store types are not excluded from the analysis.

With the help of a checklist containing 44 items each store type was characterised. For describing store types, a table was constructed using the relative image calculation technique, which allows for the deduction of the halo effect. The halo effect appeared when customers described the stores they knew well, which thus became over-represented in the responses. The final figures in the table display actual image performance; a positive figure signifies image strength, negative values represent image weakness. The sample size determines what is classified as a significant difference; empirical experience shows that values over +0.2 and under -0.2 can be considered as reliable store type descriptors.

Table 7

Perceived characteristics of store types in the case of hypermarket patrons (N = 736)

	Discount	Super-market	Hyper-market	C&C	Specia-lised	Market	Small shop
Lots of discount-price products	92%	40%	42%	16%	-68%	-57%	-66%
Orderly shelves	21%	34%	-5%	-12%	3%	-42%	1%
Clear price tags	21%	9%	-18%	-28%	15%	-11%	12%
Wide range of products	21%	39%	20%	52%	-60%	-15%	-57%
Sufficient parking	30%	16%	69%	109%	-85%	-53%	-86%
Products beyond date of expiry	26%	-1%	-21%	-23%	-20%	7%	31%
Bank cards accepted	53%	81%	34%	63%	-79%	-72%	-81%
Spectacular displays	-7%	16%	14%	-17%	4%	38%	-49%
Services (e.g. post office)	-58%	32%	198%	38%	-79%	-63%	-68%
On-site advertisements	31%	70%	54%	16%	-53%	-63%	-55%
Qualified staff	-16%	-15%	-40%	-21%	69%	6%	16%
Free parking	17%	8%	2%	37%	-20%	-13%	-31%
Suitable for buying specific products	-36%	-60%	-76%	-76%	70%	46%	133%
Good scents	-52%	-42%	-35%	-54%	158%	47%	-23%
Large packages, buying in bulk	6%	-19%	3%	264%	-84%	-80%	-89%
Long queues	57%	38%	31%	85%	-50%	-90%	-71%
Music	-47%	46%	127%	43%	-60%	-54%	-55%
Troublesome security service	36%	35%	17%	50%	-42%	-36%	-60%

	Discount	Super-market	Hyper-market	C&C	Specialised	Market	Small shop
Easily accessible	2%	-19%	-44%	-47%	12%	46%	51%
Personalised service	-67%	-70%	-81%	-79%	76%	136%	85%
Large trolleys	54%	34%	38%	119%	-79%	-83%	-82%
Polite staff	-42%	-46%	-66%	-65%	74%	75%	70%
Suitable opening hours	-2%	2%	0%	1%	-7%	8%	-3%
Free plastic bags	-35%	38%	132%	-13%	-50%	-27%	-45%
Convenient location	-7%	-33%	-61%	-85%	37%	33%	116%
Products easy to find	8%	-25%	-53%	-63%	28%	46%	60%
Shopping is time-consuming	-4%	15%	65%	96%	-72%	-23%	-77%
Always crowded	38%	31%	61%	53%	-80%	-20%	-83%
Wide range of brands for all kinds of products	0%	43%	54%	66%	-51%	-41%	-71%
Only small baskets	-60%	-72%	-88%	-83%	104%	-36%	235%
High quality products	-19%	-7%	-34%	-25%	58%	37%	-9%
Wide range of fresh products (vegetables, meats)	-40%	-16%	-15%	-38%	114%	23%	-28%
Changing arrangement of goods	-11%	40%	79%	17%	-51%	-37%	-36%
Wide range of own brands	2%	46%	73%	70%	-66%	-66%	-59%
Suitable for shopping when the household has run out of everything	11%	-25%	55%	33%	-50%	-36%	13%
Offers everything needed	14%	19%	50%	14%	-54%	-28%	-15%
Questionable quality	14%	-32%	-21%	-41%	-29%	115%	-6%
Good prices	80%	-13%	16%	6%	-63%	20%	-46%
Personal contact	-45%	-71%	-83%	-91%	56%	82%	152%
Products not available elsewhere	-27%	-25%	40%	22%	-26%	72%	-56%
Staff contacted easily	-45%	-62%	-81%	-83%	87%	81%	102%
Enough baskets / trolleys	29%	18%	-6%	2%	-21%	-53%	30%
Frequent promotions, lucky draws, free samples	-26%	76%	144%	13%	-70%	-63%	-75%
Suitable temperature	10%	11%	-9%	-8%	23%	-36%	9%

Source: Own data

7.3. Segments of hypermarket patrons

The segmentation of hypermarket patrons was conducted based on their shopping habits, purchase attitudes, decision-making on store patronage, and individual strategies. Five-point scales were used in the items surveying segmentation. K MEANS cluster analysis was applied to the data, missing data were handled with the Exclude cases listwise method. During the process, the sample was reduced to 522, as participants with unanswered items were excluded. Clusters were described using a one-way variance analysis, with all factors having a significant contribution (< 0.05). The resulting four clusters are presented in Table 8.

Table 8

Segments of hypermarket patrons

	Settled and mature N = 122	Impulsive young people N = 86	Purchase-oriented N = 221	Seeking for optimal solutions N = 93
Shopping characteristics	Tend to search for novelties	Enjoy shopping	The group least interested in novelties	The group to enjoy shopping the most
	Enjoy shopping	Use promotion opportunities occasionally	The group that likes shopping the least	Do not consider shopping as tiring or waste of time
	Careful spenders	The least price-sensitive	Shopping is tiring	Consider shopping as a freetime activity away from home
	Shopping as a freetime activity away from home	Enjoy looking around while shopping	Shopping is not a good freetime activity	the group to get the most excited about promotions and special offers
	Enjoy the crowd while shopping	Not the most faithful to brands	Disturbed by crowds	The group to enjoy most the chance to look around
	Like promotions and discounted prices	The group most focused on quality	The group least interested in promotions	Shopping is a pastime, not a necessity
	Most likely to do shopping together with family, even with grown-up children	The group least concerned with being able to buy all in one place	The group to like shopping with the family the least	The group to be the most concerned about products and prices
	Intend to get over with shopping quickly, not the main freetime activity	The group least likely to do planned shopping	Do not enjoy looking around, want to get over with shopping quickly	The group to stick to brands the least
	Careful about products, prices, quality	The group most likely to do shopping at night	Shop because they have to, aim to finish quickly	Consider traditional brands and no-name brands of the same quality, the difference is the price of advertising
	Tend to stick to brands		The group to be the least careful about products and prices	Consider Hungarian products the same quality as imported goods
	Like to do daily shopping alone		Do not focus on quality in the first place	Consider branded products and store's own brands of the same quality
	The group to aim for "all in one place" attitude		Do not care at all about advertisements	The group to care the last about scheduled and planned shopping
	Only shop for food when stocks have run out at home Scheduled shopping		Do not go to another shop if a favourite product is not available	
Planned shopping	Consider store brands as more favourably prices than branded goods			

	Settled and mature N = 122	Impulsive young people N = 86	Purchase-oriented N = 221	Seeking for optimal solutions N = 93
Social and demographic characteristics	Tend to be women	Tend to be women	Tend to be men	Tend to be women
	Tend to be over 50 years of age	Highest proportion of under 25 group Lowest proportion of over 65 group	No distinct age group	The group with the lowest proportion of under 25 customers
	Tend to be married	Tend to be single	No distinct marital status	Tend to be married
	Lower than average proportion of university graduates	Tend to have secondary school degree	Higher than average proportion of university graduates	The group with the lowest proportion of highly qualified people and the largest proportion of primary school graduates
	Tend to live in small towns	Tend to live in towns and small towns		Tend to live in towns
	Mostly couples with grown-up children	Tend to be large families	Tend to live in the capital	Lowest per capita income
	Highest per capita income			
Retail patronage habits	Most frequent patrons of discount stores			Typical discount store patrons
	Typical customers in supermarkets	Visit hypermarkets once every two weeks or once a month	Do not visit hypermarkets out of their own free will, tend do so because of family pressure	Tend to visit hypermarkets once a week or twice a week The group to like hypermarkets the most
				The group to visit supermarkets the least

Source: Own data

Moreover, it is essential to survey the time and money spent by members of each segment on a typical essentials shopping trip or when shopping for supplies. Purchase-oriented customers spend the least (12,255 HUF), impulsive young people spend the most (16,720 HUF). Purchase-oriented customers also spend the least time on average (90 mins), whereas those seeking optimal solutions stay the longest (138 mins) on a typical supplies shopping trip.

8. Summary

The qualitative phase's aim in the research project was to establish Monroe & Gultinan's store patronage model's applicability or adaptability, and also that of Donovan & Rossiter's store atmosphere model in Hungarian food retail. According to the results, both models have proven adaptable. The qualitative data also revealed the factors having the most significant influence on the decision-making process. A small-scale sample was used to tap into the similarities in the different store types' perceived characteristics.

From the qualitative phase's conclusions and ideas, a standardised questionnaire was constructed, focusing on monitoring the frequency of visits to different store types, the typical purchase point for different kinds of goods, and perceived store types' characteristics. In the final step, hypermarket patrons were segmented using cluster analysis.

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