# Overview on the Production and Commercialization of "Barreado" in Paraná Coast, Brazil: Implications and Potentialities

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## **Abstract**

Barreado is a typical dish from Paraná, made with beef and some specific spices and cooked for a long time in a clay pot sealed by a mixture of ashes similar to the clay, being this dish produced with greater relevance in the coastal region of the state, where there is the largest productive arrangement of this dish in Brazil and where has a strong gastronomic touristic appeal. Despite the historical, cultural and economic relevance of gastronomic tourism in Paraná, few and sparse studies use the issue, thus, this study aimed to elaborate and show an overview of the current scenario of production and trade of the dish, highlighting the implications and potential of Barreado in Paraná Coast. The survey methodology was based on quantitative and qualitative descriptive exploratory research, the data collection was accomplished between May and June 2020, with 151 consumers. The study revealed that among Barreado consumers there was a predominance of women (n=61.5%). The average age was 40.9 years old, and the majority of

the respondents (46.4%) preferred to consume Barreado when it is done by the traditional way of cooking, in a clay pot and on a wood stove for 24 hours. The greatest potential described was the fact that the Barreado is a typical and original product of Paraná and has great acceptance in gastronomic tourism, which reveals its capacity to be a source that drives regional development, however the price considered high and the distribution network in the retail market was classified as deficient, they were identified as limiting factors to the development of the Barreado production and commercialization. In this context, still on the issue of price and its relationship with the consumption, given that it was one of the main factors identified as limiting and the lack of studies on the subject, for further studies on the cost and quality relationship should be considered by researchers in new future studies.

**Keywords:** Gastronomic Tourism; Cultural Appreciation; Morretes; Typical Dishes; Regional Cuisine.

## 1. Introduction

Brazilian gastronomy is diverse, especially due to the use of regional ingredients that allows a high mixture of flavors, which is still influenced by the regional culture. Culture and customs rooted in a people can hardly be separated from the cuisine, especially when it is taken into account those that are restricted to a specific geographic region (GANDARA; GIMENES, 2009). The symbolic gastronomy of a region can commonly be considered as crucial for the tourism development, because in addition to the food, they involve rites, traditions, values, cultural and symbolic practices of the communities where several types of typical dishes are practiced (GIMENES, 2011).

The offer of typical regional dishes according to Barroco and Barroco (2008), are always associated with tourism, because this offer goes beyond eating, it has a meaning for local society and culture and it becomes an object of curiosity for visitors, being precisely for this cultural contrast that awakens the desire for consumption, which in addition to the monetary value itself it brings traditions, operating memories, imaginations and unique meanings of the people who are linked to it. Gimenes (2011) corroborates the previous statements and points out that the gastronomy, besides being crucial for the tourism development, also raises the esteem of the people who are involved in this process.

Brazilian tourism occurs on a large scale in the coastal regions, where in addition to the charms of the natural beauty, according to Azevedo and Neto (2010), the cuisine is also a relevant factor in attracting tourists in Brazil. Specially in relation to the Paraná Coast, according to Anacleto et al. (2020) it has a strong influence of seasonal tourism, especially during the summer time, when it receives thousands of tourists from various Brazilian regions, and for this reason, over time, the population started producing and marketing a wide variety of typical products in order to offer to tourists.

According to Gimenes (2011), among the regional gastronomy products that had great acceptance, the typical dish called Barreado stands out, which is made with beef, some specific spices and cooked for a long time in a clay pot, being classified as typical food and produced only in Paraná, being the coastal region the largest producer, and where the delicacy has a strong tourist appeal.

The tourism in Paraná Coast, according to Anacleto et al. (2020) has an increasing importance for the regional economy, being among the main income-generating activities and opportunities for the coastal

municipalities, especially in the summer time, when a weekly and rotating number of people, greater than five times the regional population moves to the region, and a significant part of these tourists according to Hoffmann (2010) travel to the Northern portion of the Coast, especially to Morretes and Antonina, cities that have the greatest offer of the dish.

Barreado has significant relevance in this region, especially in Morretes its main tax collection sources is related to the tourism, with Barreado being considered the main attraction of gastronomic tourism. In this context, Anacleto et al. (2020) highlight that the strengthening of tourism can be understood as one of the alternatives of regional development, capable of bringing ways of increasing the families' income. Therefore, gastronomic tourism should be considered more comprehensively by the government as an alternative for social transformation, and this issue is most evident Paraná Coast.

Despite the historical, cultural and economic relevance of gastronomic tourism in Paraná, few and sparse studies use this issue, thus, this study aimed to elaborate an overview on the current scenario of the Barreado production and commercialization, highlighting the implications and potential of the dish in the coastal region of the State.

#### 2. Literature review

The news of the discovery of gold in Paranaguá, in the 16th century, according to Gortz and Siqueira (2013) attracted a greater number of Portuguese colonists to the region, among them those from the Azores, who landed in Antonina in 1720, when they discovered a type of delicacy made by the natives, they appreciated the dish, and over time they made changes in the preparation of the dish, using clay pots and mixtures of ash with water to cover it and thus prevent the entry of sand in the cooking. Because of this new way of elaborating the dish, the "Moqueado" (slowly cooked) as it was called by the natives, was renamed as Barreado, due to the mixture of ash and water that served to seal the the clay pot and prevent it from the entry of sand (GORTZ; SIQUEIRA, 2013).

The way of preparing Barreado according to Gimenes, (2011) has undergone new changes over the following decades, however the historical aspects of its origin have always been maintained, as well as the character of regional identification.

Mascarenhas and Ramos (2008) reported that over time goes by Barreado has strengthened like a meat stew made on the plateau and brought by the drovers (tropeiros) on the way between Curitiba and Morretes, especially during the yerba mate (erva mate) cycle. The meat used was not tender meat an aspect linked to the limitations of the caboclos (mixed of Brazilian Indigenous and European) from the Paraná Coast, and also because it is a meat resistant to the prolonged cooking, and Barreado was considered a nutritious dish, due to its energy value and practicality of its preparation, with few accompaniments, and it kept the flavor preserved, even when reheated (GIMENES, 2011).

Barreado then, since the drovers period, became one of the main delicacies associated with the Paraná Coast and with the development of the tourism it started to be offered and accepted by tourists. The Northern of the coast, which includes Antonina, Paranaguá, Guaraqueçaba and especially Morretes according to Anacleto et al. (2020) constitutes an important LPA - Local Productive Arrangement, this LPA

is based in the production and trade of Barreado, being estimated that 94% of all the production of the state occurs in these cities.

The gastronomy according to Gimenes (2011) is decisive for the tourist development, through a series of activities that can allow the visitor to know other cultures, to experience other rites and traditions. The culinary expression represents a historical cultural heritage, of different groups of society, and this reproduction in the consumption of regional food awakens in tourists the desire of knowing more deeply other cultures and their symbolic values.

The symbolic value in the case of gastronomic tourism, occurs through the affective judgment of a person, and with the direct influence created with the human values, by the decision at the moment of choices through the evaluation of the value and analysis of its characteristics with tangible and intangibles attributes of a product or service (ALLEN, 2001), however it is worth mentioning that there are other aspects in the development of a visitor's decision in the case of tourism, arising from the scenario analysis based in the available alternatives. Such multiple alternatives are closely related to psychological methods, particularities of conceptions, practices and formation of precepts that are intermediated by cognitive responses from personal experiences and desires.

In this context, valuing tradition can generate positive impacts on the local economy, since the incentive to the culture would allow return through the generation of jobs and income to the local community, significantly increasing the opening of new businesses and as consequence the development of the region. Local development is understood as a process that mobilizes people and institutions in order to transform the economy and the local society, creating opportunities for work and income, overcoming difficulties to favor the improvement of the local population living conditions.

Rocha et al. (2019) describe that it is essential that local and regional development is guided by diagnostic studies that present the current scenario in which the productive system is found and the conditions that can generate implications or potentialize the development of this productive arrangement. Still according to the authors, the overview obtained based on the testimonies of people who use products or services, are able to generate solid bases to guide actions to induce development

# 3. Methodology

The survey methodology was based on quantitative and qualitative descriptive exploratory research (GIL, 2008), the data collection was accomplished based on the self-perception of the consumers without worrying about the use of statistical techniques.

The study according to Fontelles et al. (2006) aimed to organize a diagnosis of the current situation of consumers' perception about the production and trade of the delicacy from Paraná Coast, and the interviews were conducted between May and June 2020, with 151 consumers.

According to what was proposed by Vergara (2015), data collection was accomplished with a semi-structured interview with a pre-prepared question script. The interview in question was conducted using digital media after previous contact by e-mail.

Initially, the interviewees answered questions about their socioeconomic profile, and later, they answered questions about production and commercialization of Barreado and in the last stage of the interview they answered questions regarding the implications and potential of the dish in the region.

The importance level of the delicacy was assessed using the summation scale or Likert scale with an assessment of the degree attributed by the interviewees who promoted a hierarchical categorization ranging from none to high importance.

As implicações econômicas foram aferidas com o uso de respostas similares e percentuais e também com a organização de uma matriz de impacto cruzado. A matriz de impacto cruzado foi realizada similarmente ao proposto por Anacleto e Prazeres (2020), os autores descrevem a matriz como sendo o cruzamento das implicações entre si mediante o relato da autopercepção dos entrevistados. A matriz emprega valores percentuais de 0 a 100 a cada opinião exposta pelos entrevistados em relação as demais opiniões expressadas, comparando cada item analisado na relação de influência exercida e a influência sofrida nas práticas cotidianas na gestão das pousadas, assim quanto maior o índice, maior a relevância e a atenção a ser dada a situação problemas vivenciados pelos gestores.

The economic implications were assessed with the use of similar and percentage responses and also with the organization of a cross-impact matrix. The cross-impact matrix was performed similarly to what was proposed by Anacleto et al. (2021), the authors describe the matrix as being the crossing of the implications among themselves through the self-perception of the interviewees. The matrix uses percentage values from 0 to 100 for each opinion exposed by the interviewees in relation to the other opinions expressed, comparing each item analyzed in relation to the influence provoked and received in the daily practices, as the higher the index, the higher the relevance and the attention to be given to the situation and problems experienced. The impact matrix generates an index of relevance and importance in the perception of the consumers and it reveals what needs attention for the best performance in the sector, according to Anacleto and Prazeres (2020) the matrix can be obtained by the equation:

$$IR = \frac{FA \times FB \times 100}{\sum SF}$$

IR= Index of relevance of the assessed situation;

FA = Indexes of received influence;

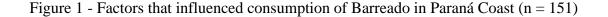
FB = Indexes of provoked influence;

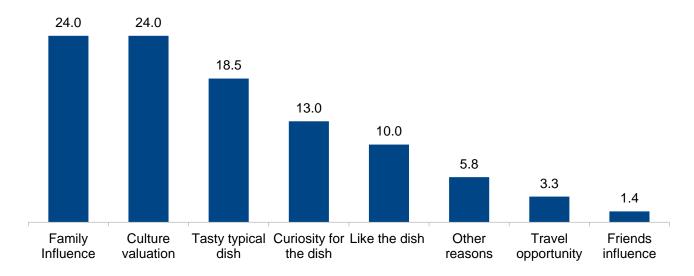
 $\Sigma$ SF= Sum of the indexes (FA x FB) of all analyzed questions.

Finally, according to Vergara (2015), interpretative analysis was adopted, performed using the data triangulation technique with similar groupings, with the focus on classifying elements that could be perceived as similar or relatively homogeneous based on the set of questions researched, it was sought to homogenize the possible objects within the groups and simultaneously maximize the heterogeneity among the investigated group.

#### 5. Results and discussion

The results of the research showed that among Barreado consumers there was a predominance of women (n = 61.5%). The average age was 40.9 years old. The main reasons that promoted consumption of Barreado were family influence and knowledge about the historical value and regional culture related to it (Figure 1).





Source: The authors (2020).

The preferred places for Barreado consumption were restaurants (62%), followed by consumption in the consumers' own homes (27%), however despite a significant portion of respondents having the preference for domestic consumption, 46% of the interviewees revealed that it would facilitate consumption if they could find the delicacy in the markets near their homes, or in other commercial formats such as fairs (9%) and in the delivery system (9%).

Regarding the way of preparing the dish, most respondents (46.4%) prefer to consume Barreado if it is done by the traditional way of cooking, in a clay pot and wood stove, however a significant portion of the interviewees (12.6%) still prioritize the consumption of the delicacy when it is made by the old way, which is also called caiçara, when it is prepared in ditches with a clay pot with a sealed lid, similar to the way prepared at the time of the drovers and eaten with orange and especially with banana (58%).

The cultural relevance was corroborated in the present study when questioned, 47.68% of the respondents said to have knowledge about the history of Barreado, as well as 66% of the respondents were aware that Barreado was classified as immaterial heritage of the city of Morretes, the largest producer of Barreado in Brazil, and the same percentages of the interviewees relate the city of Morretes to the Barreado, where tourism and gastronomy are inseparable from the city image.

In relation to the product itself, the interviewees attributed concepts that reveal the level of importance related to its consistency, way of dish presentation, affordable price and the traditional way of preparation

(Figure 2), and in all cases the junction of the attributes revealed that these four requirements are decisive with regard to the possibility of consumption.



Figure 2 - Level of importance of the delicacy in the consumer's perception (n = 151)

Source: The authors (2020).

The study revealed that the consistency of the Barreado is a very important factor for the consumer, however the adequate consistency of the dish can be obtained by two factors, the first one is the quantity and quality of the cassava flour used in its preparation, it is necessary to emphasize that the Barreado consistency is closely linked to the presentation of the dish to the consumer.

The consumption is made with white (not toasted) cassava flour after cooking. The white flour is used in the preparation of a kind of mush, where over the white flour the Barreado is served in boiling broth, that is, the consumer can choose both a Barreado in a mush style, as well as a more consistent one. Mascarenhas and Ramos (2008), corroborate this statement and verified in relation to the Barreado consistency that consumers complaints in relation to the consistency of the dish reporting that it was served more broth than meat, thus the choice by consumers of the traditional establishments can represent a greater satisfaction regarding the quality of the product in the consumer's perception.

Still talking about the Barreado consistency, another relevant alternative to resolve the issue related to its consistency and that not all establishments make the correct orientation of how the flour should be made available in the dish, the way of scalding the flour with the hot broth and finally how to serve the meat, even do not they explain the reasons why the banana is served with the dish because it is a typical product of the region. In this context, a brief explanation by the waiters about the history of the Barreado and the way of preparation could increase the level of satisfaction in eating the dish and make loyal consumers. Gortz and Siqueira (2013) corroborate what was found in the present study, and report that giving the presentation on the correct way of how to eat Barreado, showing the ideal consistency and the traditional way to taste the dish, talking about the history and its origin, the possibility of success by the entrepreneur rises.

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The overview on the production and trade of Barreado in Paraná Coast showed that the main implications were associated with commercial issues of price and distribution, however the potentialities such as the product has origin in Paraná and the ability to generate regional development were highlighted (Table 1).

Table 1. Diagnosis of the scenario external to the activity of Barreado production and trade in Paraná Coast in the perception of the interviewees.

	Threats (implications)	IR		Opportunities (strengths)	IR
1	High price	24,14	1	Regional development alternative	16,76
2	Few product distribution locations	15,46	2	Cultural exclusivity of a regional productl	15,33
3	Organization of producers and traders in		3	Strengthening regional gastronomic tourisml	14,91
	initial stage	11,09			
4	Lack of government incentive for		4	High tourist demand in the summer time	14,91
	gastronomic tourism	10,00			
5	Poor disclosure of Barreado in Brazil		5	Productive arrangement in the organization	9,86
		9,06		process	
6	Variation in the preparation of the delicacy	8,71	6	Low raw material cost	9,23
7	Lack of knowledge Barreado history inhibits		7	Valorization of female labor	7,35
	consumption by tourists	6,89			
8	Aesthetics of the dish does not always please		8	Simple production technology	4,21
	the tourist consumer	6,89			
9	Low quality of Barreado produced by some		9	Possibility of production growth	4,21
	restaurants	5,44			
10	Little offer of delivery service		10	Possibility of expanding the distribution to	3,23
		2,32		other Brazilian regions	

Source: The authors (2020).

Regarding the opportunities, gastronomic tourism as an alternative for regional development apparently constituted one of the main alternatives to the Northern portion of Paraná Coast, this assumption emphasizes that through incentives to local culture, there is also an increase in the appreciation of that region that ends up boosting trade, transforming the current scenario. The development of tourism based on Barreado can promote the insertion of regional culture and history, generating jobs, income and opportunities for local people, moving the economy, enabling an increase in the income for local residents. However, it must be considered by those involved in the segment a minimum standardization of the ingredients in order to minimize the variation in the preparation of the delicacy pointed out by consumers. The cultural factors according to Kotler (2000) are those that exert the broadest and most profound influence on consumer behavior, and specifically in relation to the consumption of Barreado, the delicacy is classified as being the cultural value, therefore it is essential to understand its origin, history and forms of preparation as a tactic to strengthen the product consumption with the consumers.

According to Furtado (2004), individuals look for new possibilities of learning, information, experiences, through unknown flavors they can experience, therefore, a new culture and gastronomic style with the objective of exploring the locality in particular. In this sense, the gastronomy has a cultural value that interferes with the definition of the tourist destination.

In relation to the implications, Barreado is considered an expensive product when compared to other food offerings easily found in the region, so the price ends up limiting the possibility of increasing the levels of service to consumers, lovers and those who still are not loyal to the consumption of the dish. In this respect, two issues must be considered in relation to the price of Barreado.

The first question, despite the high price, does the consumer of Barreado have the satisfaction feeling of his need? Satisfaction according to Kotler (2000) is the feeling of pleasure or disappointment resulting from the comparison of the performance expected by the product (or result) in relation to the person's expectations. In this context, it is natural for people to make their purchases with expectations about the product performance, therefore, satisfaction is the expected result, that is, it is defined as the post-consumer assessment that the alternative chosen by the consumer met or exceeded the expectations. The consumption of Barreado among respondents met this prerogative, given that 62% of respondents had the habit of eating Barreado in restaurants, where the cost is higher than domestic consumption.

With regard to the possibility of expanding products and gaining new markets, consumers with less sensitivity to the price issue revealed difficulty in acquiring the product outside the local productive arrangement, as the product meets the needs and desires of the customers in terms of quality, so it is necessary to consider new ways of distributing the product to retail chains, including products being offered in new formats different from the traditional ones and in the frozen product shelves in the supermarkets. Thus, if the delicacy meets the consumer's taste and there is an acceptance in relation to cost, benefit and quality of the product, the second factor to be analyzed is the question of price, classified as being high when it comes to winning new customers.

The price when it is the first time of consumption or experimentation represents the main obstacle to be overcome, there is a wide range of food products that can be offered to consumers, so the cultural issue and the desire for experimentation can be limited if the scale of values used by consumers for their individual satisfaction is more strongly linked to the economic issue.

According to Porter (2004), consumers have the power to bargain with companies, forcing them to lower prices and increase the quality of the product or service offered, this can be further evidenced in local productive arrangements such as Barreado one, when dozens of establishments offering the same product, so the bargaining power of consumers can generate rivalry between competing business, forcing entrepreneurs to adhere to the requirements desired by customers in order to win them over. However, when companies try to win over this more price-sensitive class of customers, there may be a reduction in the quality of the Barreado offered, as the price reduction may result in it being impossible to meet all requirements with excellence.

Products of high value when compared to those that replace them, it has a greater commercial possibility if a focus or differentiation strategy is adopted, given that the higher price makes it possible to increase the quality of the product, thus reaching the satisfaction and requirements of the customers (PORTER, 2004). However, due to the high commercial value, the offer of a product in a well-defined geographic area and

consumption by people with less price sensitivity, suggests that the appropriate strategic positioning for the development of the activity is the focus strategy as also named by Porter (2004).

The focus is a very competitive strategic positioning, being possible to choose a restricted product line or to choose a specific segment of consumers (PORTER, 2004). Barreado is not a seasonal product, given that in addition to the summer time when consumption rises, it is also sold throughout the year, which generates stability for the traders and producers in relation to their consumers. Therefore, the focus strategy allows the sector that produces the delicacy to explore the market with an approach based on the quality of production, culture and history of the delicacy.

The ability to organize a segment can be considered a major factor in regional development based on gastronomic tourism, the low capacity for collective organization, both with regard to the organization in commercial cooperation in the promotion of the product, or even in the search for demand from the public concessions in order to obtain greater visibility, dissemination and benefits to the production and trade of the Barreado. The creation of a trade association related to this issue was registered in the municipality of Morretes, the largest producer in Brazil. This stage, although embryonic, may represent an increase in participation in the collective processes of seeking improvements, which may result in a more assertive scenario, in contrast to the current one, where the problems with production and trade should receive better treatment.

## 6. Final considerations

The results of the research showed that among Barreado consumers there was a predominance of women (n = 61.5%), and the average age was 40.9 years old, and the majority of the respondents (46.4%) prefers to consume Barreado if it is done by the traditional way of cooking in a clay pot and on a wood stove for 24 hours.

The greatest potential described was the fact that Barreado is a typical product of Paraná State and it has great acceptance in gastronomic tourism, which reveals its capacity to be a source that drives to regional development, however the price considered high and the distribution in the retail trade were classified as deficient, they were identified as limiting to the development of Barreado production and trade. In this context, still on the issue of price and its relation to the consumption, it was one of the main factors identified as limiting consumption and the lack of studies on this subject, then further studies on the cost and quality relationship should be considered by researchers in new future studies.

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