



# **Demand for Brazilian Soccer: A Censored Model Approach**

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# **Demand for Brazilian Soccer: A Censored Model Approach**

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## **Summary**

For the efficient management of athletic clubs, it is crucial that there be a way to appropriately estimate the level of demand for the sporting events. More precise estimates allow for a more appropriate financial and operational plan, which, in turn, results in better performance of the team on the field and a higher quality of service delivery to the fans. The focus of this study is to analyze the demand for soccer matches in Brazilian stadiums through a regression model with a censored dependent variable. The model includes variables related to the economic environment, to the quality of the product and to the monetary and non-monetary incentives people have to go to the stadium.

Keywords: sports economics; censored regression model; attendance; soccer

## 1. Introduction

Soccer plays an undeniably important role not only in the context of Brazilian sports, but also in the world of international sports. Nevertheless, Brazilian soccer clubs, some over 100 years old, have many organizational problems and, in general, are overwhelmed by chronic mismanagement. The professionalization of the sport and its command structures are weak and lag behind the levels of organization and development achieved by its European counterparts.

As the most popular sport in Brazil, 6.7 million fans attended soccer games in Brazil's stadiums during the 2009 season<sup>1</sup>, an amount that could be considered minimal when compared to the 27.1 million<sup>2</sup> fans that attended games in British stadiums during the same season. The flood of European fans to their stadiums, especially since the 1990s, is a direct result of the high organizational standards of the European leagues (Sloane, 1997). These high standards maintained in Europe allow the major clubs to reach maximum attendance capacity in their stadiums for virtually every game of the season. In Brazil, by contrast, the number of fans attending games has been declining over the past decades (Giovannetti *et al.*, 2006).

It is essential to identify and understand the factors, both positive and negative, that influence attendance at these sporting events. Such analyses will prove instrumental for the Brazilian clubs as these clubs seek to increase attendance, and will thus contribute to a more efficient and professional management of the sport. The focus of this study, therefore, is to examine the demand for soccer stadiums in Brazil through an analysis of the paying public at the matches of the A series of the *Campeonato Brasileiro* (Brazilian national championship) between 2004 and 2009.

First, it is necessary to determine which variables influence the demand for games using a regression model with a censored dependent variable, the number of tickets sold, which is limited by the capacity of the stadium where each game is played, as proposed by Falter *et al.*, 2008. For this study, it is determined that the TOBIT model

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<sup>1</sup> Source: Brazilian Soccer Confederation (Confederação Brasileira de Futebol - CBF). Accessed on 12/09/2010. Includes only paying public.

<sup>2</sup> [www.premierleague.com](http://www.premierleague.com) Accessed on 12/09/2010

is econometrically more appropriate than other regression models as the literature on the topic related to the Brazilian case (Madalozzo and Villar, 2009; Melo, 2007, Giovannetti *et al.* 2006; Souza, 2004) does not use this specific tooling to estimate the demand for soccer in Brazil. Our intention is to fill this gap by providing more accurate estimates for decision-making process within the ambit of Brazilian soccer clubs.

The analysis shows that all variables except those indicating the season and the visiting team performance affect the demand for tickets. This work is divided into the following sections: Section 2 presents the literature review and description of variables incorporated in the model based on the theoretical framework, Section 3 briefly describes the methodology, Section 4 presents the interpretation of results, and Section 5 presents conclusions and suggestions for future research.

## **2. Literature Review and Description of Study Variables**

A merely superficial analysis of the management process of Brazilian soccer is sufficient to detect the indelible need for professional and organizational development aimed to increase the efficiency of management (Melo, 2007).

One of the crucial issues of effective management is embodied in the estimation of the levels of demand for those sporting events in which a particular club will participate throughout the year. The more precise the estimates, the better able management is to plan appropriately for the organization's financial and operational needs. A better plan, in turn, tends to result in a better performance of the team on the field and a higher quality of service delivery to the fans. Together, these two factors lead to a greater number of fans in the stadium and, consequently, increased revenue generated by the event for the organization, thus forming a profitable cycle.

Falter and Pérignon (2000) divide the explanatory variables of demand for sporting events into three groups: i) variables related to the economic environment, ii) variables related to product quality, and iii) variables related to the incentives to go to the stadium.

The first group, defined by Madalozzo and Villar (2009) as structural variables, affects demand in that a consumption of the good (the purchase of tickets) affects the consumer's budget and is limited by available income. Therefore, two variables were incorporated into the model: per capita income in the city where the match occurs (PCI) and the population of the city (POP). The latter was included because a greater influx of people is expected in those stadiums located in the most densely populated cities. Data on these variables were obtained from the website of the Brazilian Institute of Geography and Statistics<sup>3</sup>.

The second group includes those variables related to product quality, that is, the quality of the soccer team that sells its ticket and the quality of the opponent. These data seek to measure the performance of the home and visiting teams in the tournament.

Szymanski (2001) examined 997 games over 22 years between the same teams in both the English Premiership and FA Cup. Szymanski states that the sum of the position of participating teams (in the championship) reflects statistically significant influence on the demand for tickets; that is, better positioned teams in the championship are more likely to have an increased number of fans in the stadiums.

Thus, the importance of the match for both home and visiting teams is relevant to understanding the demand for tickets. This factor will be represented in the study by the teams' positions in the league when those teams are facing each other in a match. Variables that will be important for the reproduction of the match will be the position of the home team (CLH) and the position of the visiting team (CLV) in the league on the date of the game.

In addition to position in the tournament, the model includes variables associated with goal differences and results in recent matches. The variables that express the number of points earned in the last three games before the match in question by the home team (PGH) and by the visiting team (PGV) are added to the model to measure the performances of the teams right before the match. This is derived from the premise that teams with higher values for these variables demonstrate improved quality and efficiency. These variables also capture a significant portion of the effect associated

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<sup>3</sup> <http://www.ibge.gov.br/home/>

with the presence of one or more outstanding players in the demand for tickets in the manner described by Brandes, Franck and Nüesch (2008).

Two other variables that seek to measure the expected quality of games are added to the model. These variables represent the sum of the goals scored by the home team (GLH) and the visiting team (GLV), in the three previous rounds to the game in question. It is implied that the greater the number of goals scored, the higher the quality of the match as the scoring of a goal is the part of the game the fans most enjoy and appreciate. Games with more goals tend to be viewed as more entertaining games.

The importance of the match in the league can also affect demand. It is reasonable to assume that a game with a higher relative value will attract more attendees. Thus, as a championship series progresses, the higher the relative value of the game and, therefore, the more attendees. For this reason, a given target league will be divided into two phases for analysis; furthermore, the beginning and the ending of each phase will also be considered. Thus, the tournament will be divided into four parts according to differentiate the degree of relative importance of matches that occur at different times during the season. We will have variables indicating parts 2 (PT2), 3 (PT3) and 4 (PT4), and it is expected that as the championship rounds advance, public attendance will increase.

The rivalry between teams is directly related to the degree of importance of a match. The higher the equilibrium and rivalry between the teams, the greater the interest of the fans in the match; thus, there is an increase in the demand for the game. Aiming to represent the effect of rivalry between teams, an indicator variable was included between the most traditional teams of the same state (CLS). Due to historically high competitiveness between two in-state teams and the great rivalry between the fans, these matches are expected to be of high quality.

A variable to represent the presence of a large team from São Paulo or Rio de Janeiro as a guest of a match (BIG) has also been added to the model because these teams have great historical importance in Brazilian soccer and have many fans throughout the country. This variable assumes a value 1 when a home team that is not from São Paulo or Rio de Janeiro faces the Sao Paulo, Corinthians, Palmeiras, Santos, Flamengo, Fluminense, Botafogo or Vasco teams, and assumes a value of zero for other

cases. It is expected that the presence of big clubs from these two states will increase the demand for tickets for the game in question.

The third group of variables represents the incentives that fans have to go to the stadium. There is a significant monetary incentive associated with the ticket price. Accordingly, a variable representing the average ticket price (PRC), obtained by dividing the income earned in the game by the number of paying attendees, is included.

There are also several "non-monetary incentives". According to Knowles, Sherony, and Hauptert (1992) and Simmons (1996), the time and day of the week in which games are played have a significant influence on the demand. The authors demonstrate that matches held during the evening are more attractive to the public than daytime games held during the week. Weekend games are even more attractive than those played in the evenings on weekdays. Variables used to convey these desired effects are games on weekends (WND) and games on weekdays after 21:00 (NGT).

The weather on game day may also have an important explanatory effect with respect to the number of fans who go to the stadium. Factors such as extreme heat or cold, or rain, can be major factors as fans decide whether to go to the stadium to watch the game. To imprint this effect into the study, we included a variable that represents the accumulated precipitation in mm on the day and in the city where the match occurred (RAN) and a variable that expresses the season during which the match was played.

It can be expected that the more total rainfall recorded on game day, the lower the incentive for fans to attend game depending on i) the deficient infrastructure of the stadiums in Brazil (for example, not all seats are covered or protected from the rain in most Brazilian stadiums), ii) the expected drop in quality of a match when there is rain, and iii) the difficulties associated with transportation to the stadium on a rainy day.

Indicator variables to identify the season include winter (WIN) and spring (SPR). During the study period, there were no Campeonato Brasileiro games held during the summer<sup>4</sup>.

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<sup>4</sup> In Brazil, during the summer, there are regional soccer championships.



Data concerning the average ticket price, day of the week, time and location of the matches were obtained through consultations and examinations of overviews and bordereau at the site of the Brazilian Soccer Confederation as well as from tables provided by the Placar magazine's website. Data for cumulative amounts of precipitation were obtained from the National Institute of Meteorology (INMET)<sup>5</sup>.

Because the matches span the years 2004 to 2009, we will include variables indicating the year of the matches (Y05, Y06, Y07, Y08 and Y09) to analyze the demand over evaluated time and to monitor the possible effect of time in the model.

Table 1 presents a summary describing the variables that will be added to the model of linear regression (TOBIT) and the expected effect of each on the demand.

Table 1 - List of explanatory variables and the expected effect

<b>Variable</b>	<b>Description</b>	<b>Expected effect</b>
PCI	Annual per capita income in the city where the game takes place (in R\$)	+
POP	City population where the game occurs	+
CLH	Classification of the home team	-
CLV	Classification of the visiting team	-
PGH	Points won by the home team in the past 3 games	+
PGV	Points won by the visiting team in the past 3 games	+
GLH	Goals scored by the home team in the past 3 games	+
GLV	Goals scored by the visiting team in the past 3 games	+
PT2	Value 1 if the match occurs on the 2nd stage of the championship	+
PT3	Value 1 if the match occurs on the 3rd stage of the championship	+
PT4	Value 1 if the match occurs on the 4th stage of the championship	+
CLS	Value 1 if the match is considered a classic	+
BIG	Value 1 if the game has some great team from SP or RJ	+
PRC	Average ticket price	-
WND	Value 1 if the match occurred on the weekend	+
NGT	Value 1 if the match occurred after 21:00	+
RAN	Rainfall (in mm)	-
WIN	Value 1 if the match occurred in winter	-
SPR	Value 1 if the match occurred in spring	+

<sup>5</sup> <http://www.inmet.gov.br/>

Finally, one explanatory variable related to the television broadcasting of the soccer match must be factored into the equation, as Grant and Graeme (2008) have warned that such transmissions negatively impact the number of fans who go to the stadium to watch the game. Baimbridge, Cameron and Dawson (1996) estimate an approximate 15% reduction in attendance of the *English Premier League* games that are televised during the week.

In Brazil, as noted by Madalozzo and Villar (2009), "in the study period the TV (open and by subscription) transmitted matches in all rounds for all of Brazil, respecting the concept of not transmitting the match to the city where it was played. These games were available only on *pay-per-view*". In specific cases, as in the final games of the championship, there were situations where certain games were transmitted to the cities in which the games were held if there was total capacity sell out for the stadium. Thus, it was determined there is no justification for including this variable in our study.

### **3. Methodology**

The objective of this study is to estimate the demand for Campeonato Brasileiro games. The econometric approach used thus far by studies on the Brazilian context is not ideal as it neglects the fact that there exists a restriction due to the capacity of stadiums.

A censored sample is one in which the information returned is not available for all observations, that is, in the case of data on public demand in stadiums, there is the real demand only for those matches in the stadiums that did not exceed the maximum capacity. Thus, the real demand for tickets should not be estimated based on matches in which the stadium is filled. If the regression is based only on the sample of games that are not at capacity, the ordinary least squares estimators (OLS) of parameters will be biased and also inconsistent (Wooldridge, 2002, p. 524). Thus, marginal effects calculated based on the OLS estimators would not be suitable for the real situation and,

therefore, would lead to incorrect interpretations of the impact of each of the variables on demand.

The most appropriate model for these cases is the TOBIT, as it allows for working with censored variables; that is, where the real value is not noticed. In this work, the actual demand for tickets has not been observed in games where tickets were sold out; that is, the demand was censored on the right and the observed value corresponds to the limit of tickets on sale (stadium sold out).

The TOBIT model was proposed by Tobin (1958) and is named in honor of its creator. The TOBIT model specification is similar to the multiple linear regression model and is given by:

$$Y = X \beta + \varepsilon$$

where

$Y$  is the value of demand, that is, it corresponds to the value of actual demand if the tickets are not sold out, or it corresponds to the value of the stadium capacity if the tickets are sold out;

$X$  represents the matrix of explanatory variables of the games; and

$\varepsilon$  is the random error with normal distribution with 0 mean and variance  $\sigma^2$ .

In our case,  $Y$  is the paying public (PUB) who attended the soccer matches of the Campeonatos Brasileiros from 2004 to 2009. Intuitively, we can see that this value cannot assume a negative value. The threshold demand value represents the maximum attendance of a game as defined by the capacity of the stadium where the match is played. Truncation occurs in games where the demand for tickets is greater than the number of people the stadium can support; such that demand is designated as equal to capacity of the stadium.

The TOBIT model is estimated using the method of maximum likelihood estimation. However, due to the censorship observed, the process involves a weighting

of uncensored with censored variables. The goal is to eliminate the bias of estimators and adapt the method for latent models. It is noteworthy that the estimated coefficients for the TOBIT model should not be used directly to assess the impact of a change of a unit in the value of the regressor on the dependent variable. The calculation of the marginal effects of explanatory variables on demand can be easily obtained, and depends on the amount of censored data (Greene, 2003, p. 765). According to Greene (2003), the marginal effects of the TOBIT model will vary significantly from the marginal effects via OLS, due to the higher percentage of censored data.

As mentioned earlier, the dependent variable in the models to be analyzed represents the demand for tickets at the stadiums (PUB), that is, the paying public for the games analyzed. These data are obtained from summaries and bordereau at the site of the Brazilian Soccer Confederation. The model will be adjusted with and without the natural logarithm for the demand to verify its non-linear relationship with the selected explanatory variables.

To provide the value of censorship used by the TOBIT model, we select the variable that represents the capacity of the stadium (LOT); that is, the maximum number of tickets that can be sold for a particular soccer match. This variable represents the fact that, in certain instances, the actual demand for tickets can be higher than the number of tickets sold and is limited by the capacity of the stadium. Thus, this limit was set as a fraction of 95% of the capacity of the stadium. That is because, in the majority of instances, a share of seats is kept empty either for security reasons to separate rival fans or for maintenance.

More details about the TOBIT model, its estimation and its asymptotic properties of estimators can be found in Wooldridge (2002), Greene (2003) and Gujarat (2004).

#### **4. Results**

To estimate the TOBIT model described in Section 3, we collected information on the Campeonato Brasileiro games from 2004 to 2009 through consultations and examinations of Brazilian Soccer Confederation game statistics. In total, there were

2481 matches, 31 of which had maximum capacity and were regarded as censored in the model.

Figure 1 shows the graph of the evolution of the paying public and the capacity of the stadiums in the Campeonato Brasileiro from 2004 to 2009. The average occupancy rate of stadiums was 32% of full capacity during this period, a low percentage, especially when compared to European standards.

Based on Figure 1, it is noteworthy that there was an increase of approximately 18% in the capacity of stadiums from 2005 to 2006, whereas capacity remained constant from 2006 to 2009. In terms of audience, there was a 62% increase from 2004 to 2005 and a 40% increase from 2006 to 2007; no major changes were indicated from 2007 to 2009. As there was this increase in audience over the assessed time, we will include indicators of the year in the model to control for this effect in time.

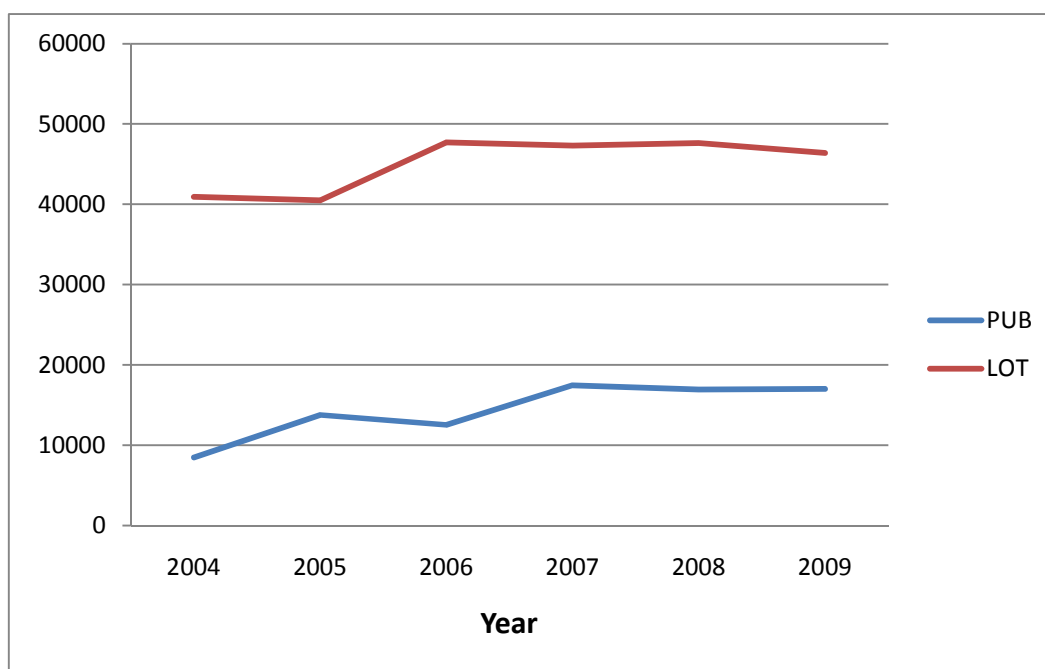


Figure 1 - Evolution of the paying public and the capacity of stadiums in the Campeonato Brasileiro from 2004 to 2009.

In the descriptive analysis of the categorical variables, we see that 8.5% of the games were considered classic, 36.7% of the games include the major teams from São Paulo or Rio de Janeiro as visitors, 74.4% of the games occurred on weekends and 17.5% of the games took place after 21:00.

Table 2 presents the descriptive analysis of numerical variables used in the study and described in Table 1. Note that the average attendance in the stadiums during the study period is 13,937 fans per game with a high dispersion of 11,509. The average capacity of the stadiums in the Campeonato Brasileiro games during the specified period was 44,665, with a 24,276 dispersal. There is great variability in these values with a minimum capacity of 11,400 and a maximum of 95,000 people.

Table 2 - Descriptive analysis of numerical variables

<b>Variable</b>	<b>Average</b>	<b>Standard deviation</b>	<b>Minimum</b>	<b>Maximum</b>
<i>PUB</i>	13,937	11,509	147	87,895
<i>LOT</i>	44,665	24,276	11,400	95,000
<i>PCI</i>	22,773	11,833	6,895	100,806
<i>POP</i>	4,603,280	6,226,333	87,800	19,223,897
<i>CLH</i>	10.85	6.26	0	24
<i>CLV</i>	10:43	6.27	0	24
<i>PGH</i>	3.88	2.29	0	10
<i>PGV</i>	4.24	2.31	0	12
<i>GLH</i>	4.09	2.16	0	13
<i>GLV</i>	4.32	2.20	0	14
<i>PRC</i>	12.54	7.16	0	148
<i>RAN</i>	3.49	9.63	0	86

Based on the data collected, we estimated the TOBIT model for demand as measured by the paying public in the games (PUB) using as a maximum capacity of the stadiums (LOT). The estimated model coefficients, their standard errors and their marginal effects for the relevant variables are in Table 3. According to the residual analysis to verify the assumptions of the model and the coefficient of determination ( $R^2$ ) equal to 40%, the model was considered adequate from the econometric point of view.

Table 3 - Estimate TOBIT model for public demand in the Campeonato Brasileiro matches from 2004 to 2009 and the marginal effects for relevant variables

Variable	Coefficient	Standard error	Marginal effect
Log PRC	-0.4735 **	0.0386	4.7% (variation of 10%)
Log POP	0.1588 **	0.0122	1.6% (variation of 10%)
CLH	-0.0270 **	0.0025	13.5% (variation of 5 positions)
CLV	-0.0102 **	0.0024	5.1% (variation of 5 positions)
PGH	0.0496 **	0.0075	24.8% (variation of 5 points)
PGV	-0.0084	0.0077	
GLH	0.0309 **	0.0078	15.5% (variation of 5 goals)
GLV	0.0144	0.0076	
PT2	0.1528 *	0.0622	15:28% (compared to part 1)
PT3	0.1378 *	0.0661	13.78% (compared to part 1)
PT4	0.1869 *	0.0863	18.69% (compared to part 1)
CLS	0.4266 **	0.0509	42.7%
BIG	0.2636 **	0.0304	26.4%
Log CRP	-0.2120 **	0.0393	2.11% (variation of \$ 10.00)
WND	0.2511 **	0.0527	25.1%
NGT	0.0687	0.0626	
RAN	-0.0046 **	0.0016	4.6% (variation of 10 mm)
WIN	0.0032	0.0650	
SPR	0.0797	0.0853	
Y05	0.4247 **	0.0452	42.5% (compared to 2004)
Y06	0.2315 **	0.0482	23.2% (compared to 2004)
Y07	0.6218 **	0.0494	62.2% (compared to 2004)
Y08	0.6280 **	0.0510	62.8% (compared to 2004)
Y09	0.6711 **	0.0513	67.1% (compared to 2004)
Constant	11.3287 **	0.4456	

Note: Asterisks denote significance: \* Significant at 5%, and \*\* Significant at 1%.

Variables representing the economic environment; that is, the resident population and annual per capita income in the city in which the match occurred were statistically significant in explaining demand. With respect to population, the impact was positive, as expected. The negative impact with respect to income seems counterintuitive but is identical to that observed in Madalozzo and Villar (2009). It could be argued that this negative effect is associated with the existence of other forms

of entertainment in those cities with a higher per capita income, although this assertion requires further empirical study.

Among the variables that indicate the quality of the match, the majority were statistically significant. The current situation of the teams based on the ranking, points won and goals scored in the last three games has statistically significant influence on demand. We can observe a negative influence of the ranking on the audience on game day; that is, the worse the team's position in the tournament, the smaller the audience in the stadium. Only the offensive power of the home team, represented by points won and goals scored, has a significant and positive relationship with the number of tickets sold for such a match, thus confirming the assumption that the greater the number of goals scored, the greater the number of fans at the game.

As for the stage of the season, it should be noted that the demand increases with the advance of the championship, that is, the final phase (stage 4) attracts more attendees than the earlier phases and the intermediate stages (steps 2 and 3) attract more attendees than the initial phase (stage 1). As expected, the fact that a game is a classic, that is, a rivalry between major teams with a strong fan base, has a positive effect on the demand for tickets. Moreover, when the visiting team is one of the great teams from São Paulo or Rio de Janeiro, the demand for tickets increases.

Variables representing the incentives that the public has to go to the stadium, such as the average ticket price, the day and the time of the game and the amount of rainfall also play a significant role on demand. Only the season appears to have no affect on attendance.

The average ticket price reflected a negative sign, thus indicating that the higher the price, the lower the demand. Matches that occur on weekends or after 21:00 have greater attendance than those held on weekdays before 21:00. The lowest attendance in the stadiums coincided with game days that had the most rainfall in the area of the game, reflecting the potential problems with transportation on rainy days. Finally, the years are significant variables in controlling the increase in attendance between 2004 and 2009, as can be seen in Figure 1.



The last column of Table 3 reports the estimated marginal effects for the statistically significant explanatory variables. Much thought should be given when comparing these effects, as the estimated effect is associated with a given change in the regressor. Nevertheless, one can say that a positive change in per capita income in the city where the game takes place is more important (4.7% for each 10% increase in income) than an equal percentage change in the population of that city (1.6 % for each 10% increase in population). Moreover, the performance of the home team has a much higher impact than that exerted by the visiting team (13.5% for each five positions of variation compared to 5.1% for the visiting team). Precipitation of 50 mm on game day reduces by 23% the paying public, whereas an increase of \$10.00 in average ticket price reduces the paying public by only 2.11%, which demonstrates low price elasticity in the demand for tickets. With regard to qualitative variables, the most relevant marginal effects are those associated with the occurrence of classic matches (42.7%) and games that occur during the last phase of the championship (18.69%).

## **5. Conclusion**

The number of fans who attend the stadiums in Brazil is not considered satisfactory especially when compared to European standards. This situation constitutes a problem in the development of Brazilian soccer as the revenue earned by a soccer club through ticket sales represents its major resource.

The aim of this study was to demonstrate how and to what extent the demand for tickets is affected by several variables so that corrective actions can be adopted to increase the presence of the public in stadiums. The applied model included variables related to the economic environment, the product quality and the incentive that people have to go to the stadium. Most of the variables are statistically significant and in line with the results presented by Madalozzo and Villar (2009) for the first two groups of regressors.

The econometric approach used allows us to more accurately estimate the marginal effects of variables because it does not overlook the fact that there is a problem of censorship due to maximum capacity of stadiums, and it includes variables

associated with non-monetary incentives. The marginal effects calculated here are of great importance for the managers of teams involved in competition to the extent that they explicitly and more accurately reflect the relative influence of explanatory variables.

The study further found that the degree to which a specific match influences the championship match plays a major role in explaining the demand for tickets. We estimated the relevance of variables related to the positions of the challenging teams and found the influence of these variables on the number of fans in the stadiums was significant. However, the most important conclusion with respect to variables is associated with product quality. The recent performance of the home team has a tremendous influence in the demand for tickets and is a determining factor when a fan decides whether to go to the stadium.

Together, these two findings are of paramount importance to club managers with respect to taking corrective action so as to stimulate the influx of fans to stadiums. To mitigate the negative effect on the demand (and therefore on the revenue earned) of a team's sub-par performance, especially with regard to recent performance, it is essential that a significant portion of the tickets be sold before the beginning of the championships as is successfully done in Europe where clubs offer ticket packages with great advantages for the fans.

Much has been said about the need for an organized and invariant calendar that facilitates the advance sale of ticket packages. However, managers should not overlook the effect of a weak infrastructure in the process, as the study was able to show that rainfall negatively influences the demand for tickets, and the nonexistence of covered stadiums (in whole or in part) is the rule rather than the exception in Brazil.

This study examined some of the factors that could affect the demand for tickets for the Campeonato Brasileiro based on the foremost models described in literature regarding the subject. The analysis is not exhaustive and there is room for further studies that, for example, will demonstrate the effect of the habit of going to the stadium or, additionally, will explain the negative influence of per capita income of the city on the demand for soccer tickets. Nevertheless, the results obtained are robust and can be used as subsidies for the strategic planning of soccer associations in Brazil.

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