

EFFECTS OF INTERNATIONAL SUCCESS ON THE POPULARITY OF PROFESSIONAL  
SOCCER IN THE UNITED STATES

by

CARL WILLIAM HERTZBERG

(Under the Direction of Billy Hawkins)

ABSTRACT

Major League Soccer (MLS) plays its regular season during the warmer months from April to October. Their regular season covers the months when the World Cup is played. The purpose of this study was to examine the effects of World Cup appearances on the popularity of the MLS in the U.S., with a specific focus on college student participation with the MLS. A twenty-six question online survey was given to college students from eight universities, all over the U.S. Additionally, attendance records for the 2005, 2006, 2009, and 2010 MLS regular seasons were analyzed for possible variations during non-World Cup years and World Cup years. The results showed inconsistencies between the survey data and the MLS regular season attendance data. Analysis of survey results showed an increase in attendance and television viewing of MLS games during or right after World Cups, where as the attendance data showed no such increases.

INDEX WORDS: Major League Soccer, Soccer, World Cup

EFFECTS OF INTERNATIONAL SUCCESS ON THE POPULARITY OF PROFESSIONAL  
SOCCER IN THE UNITED STATES

by

CARL WILLIAM HERTZBERG

BS, Miami University, 2009

A Thesis Submitted to the Graduate Faculty of The University of Georgia in Partial Fulfillment  
of the Requirements for the Degree

MASTER OF SCIENCE

ATHENS, GEORGIA

2011

© 2011

Carl William Hertzberg

All Rights Reserved

EFFECTS OF INTERNATIONAL SUCCESS ON THE POPULARITY OF PROFESSIONAL  
SOCCER IN THE UNITED STATES

by

CARL WILLIAM HERTZBERG

Major Professor:	Billy Hawkins
Committee:	Joel Maxcy Michael Schmidt

Electronic Version Approved:

Maureen Grasso  
Dean of the Graduate School  
The University of Georgia  
August 2011

## DEDICATION

To all those who have helped me throughout this process and made conducting and writing such a project possible.

## ACKNOWLEDGEMENTS

I would like to thank everyone who has helped me in my educational career in getting me to this point, from my family and friends, teachers at Woodward Academy, professors at Miami University, and professors at the University of Georgia. Special thanks goes to my advisory committee who has helped me out each step of the way throughout the thesis process. An additional thanks goes out to institution of Major League Soccer for supplying the attendance data for this study.

## TABLE OF CONTENTS

	Page
ACKNOWLEDGEMENTS .....	v
LIST OF TABLES.....	ix
CHAPTER	
1 Introduction to the problem.....	1
Statement of the purpose.....	3
Significance of the study.....	3
Delimitations .....	4
Limitations .....	5
Assumptions .....	5
Research question .....	5
Definition of terms.....	6
2 Review of the literature.....	7
Soccer fans in the U.S.....	7
Factors influencing attendance.....	11
International sporting identity .....	16
Summary .....	17
3 Methodology .....	18
Participants & sampling techniques.....	18
Study design .....	19

Instrumentation.....	19
Procedures .....	21
Statistical analysis.....	22
4 Results.....	23
Demographics.....	23
Key areas of interest .....	25
Chi-square analysis .....	29
MLS attendance data .....	36
5 Discussion .....	37
Limitations .....	39
6 Conclusion .....	41
Future research .....	42
REFERENCES .....	43
APPENDICES	
A Thesis Survey .....	46
B Results.....	51
Question 10 .....	51
Question 11 .....	52
Question 13 .....	53
Question 15 .....	54
Question 16 .....	55
Question 17 .....	56
Question 18 .....	57



Question 23 .....	58
Question 25 .....	59
Question 26 .....	60
Table 2: raw statistics.....	61
Table 2: chi-square results .....	62
Table 3: raw statistics.....	63
Table 3: chi-square results .....	64
Table 4: raw statistics.....	65
Table 4: chi-square results .....	66
Table 5: raw statistics.....	67
Table 5: chi-square results .....	68
C MLS attendance graphs .....	69

## LIST OF TABLES

	Page
Table 1: Student Demographics .....	25
Table 2: Increased interest x MLS games attended or watched .....	31
Table 3: Length of peaked interest x MLS games attended or watched .....	32
Table 4: MLS fan x increased interest and MLS games attended or watched .....	34
Table 5: U.S. and MLS talent reflection x WC appearances influence .....	35

## CHAPTER 1

### INTRODUCTION TO THE PROBLEM

Soccer is known as the world's game, in part because the Fédération Internationale de Football Association (FIFA) has 204 members. FIFA has approximately as many members as the United Nations or the Olympics (Szymanski & Zimbalist, 2005). In fact, according to Collins (2006), the United States has a stronger participation in youth soccer than baseball, approximately 1.3 million more. Participation statistics for soccer in the U.S. are estimated to be around 19 million, with the total growing every year. Yet even with this strong soccer base, of concern with this study is do these participants turn into soccer fans, or at least fans of American soccer?

For example, in 2004, two years after a quarterfinal run in the World Cup by the U.S. men's team, in a friendly match between the U.S. men's team and the national team from Poland held in front of a sold out stadium in Chicago, the majority of fans there sported the colors of red and white in support the Polish team, even though most fans were U.S. citizens (Brown, 2007). Another example is how Americans will come out and watch international powerhouses play in friendly matches here in the U.S., either on television or at the game, yet not watch the MLS (Brown, 2005). Clearly something needs to be done, and perhaps it lies in the international sector of soccer.

Every four years FIFA holds the World Cup, an international competition that often rivals the Olympics in terms of the size of the viewing audience, and is generally seen as being a better soccer event than the Olympics. During the 1990's the U.S. women's team was highly

successful winning the Women's World Cup twice and finishing 3<sup>rd</sup> the other three times. The men recently finished 2<sup>nd</sup> in the Confederations Cup, a tournament held a year before the World Cup, and in 2002 reached the World Cup quarterfinals. This recent success hopes to bring in more fans, especially since the squad is nearly half full of Major League Soccer (MLS) players.

Besides trying to use the national team's success to boost Major League Soccer's fan base and attendance, the league has tried other alternatives as well. A few teams have tried to increase their fan bases by appealing to certain ethnic groups. Another, the L.A. Galaxy, has tried to bring in a current soccer star, David Beckham, to try and transform MLS into a better league. Even others have tried to identify and develop young stars only to later see them leave for a better team overseas. While so many tactics have been tried none seem to have lasting effects towards increasing the fan base of MLS teams, or even having a consistent fan base for the international squads.

International success has shown to boost the fan base for women's professional soccer in the U.S. with the WUSA, Women's United Soccer Association, being created during the 1999 World Cup run and victory for the women's team. The WUSA, however, has faltered due to financial matters, but steady support of women's soccer has led to the creation of the WPS, Women's Professional Soccer league. This provides evidence that international success, at least on the women's side, can lead to increasing the fan base for professional soccer in the U.S.

This study examined how the U.S. men's World Cup appearances impact MLS attendance. Research has been done for the women's side as to how the World Cup influences the WUSA attendance. Other research has been conducted on star players impact and the effects of marketing to certain demographics of the population, and how both of those impact the fan base for MLS games. Yet no research has been conducted on how World Cup appearances

influence MLS attendance. World Cup appearances will consist of making the actual tournament itself, not just by participating in World Cup qualifying. Every nation, with a internationally recognized and FIFA sanctioned soccer team is able to participate in World Cup qualifying, but only the best qualify for the tournament. This study seeks to produce insight that intends to inform the MLS and the United States Soccer Federation information as to whether or not to try and market the men's national team more with the MLS.

#### *Statement of the purpose*

Previous research has noted that success in international competitions can lead to greater attendance for professional leagues. The women's team proved that in 1999 by attracting 40 million viewers in the finals of the 1999 World Cup. Through their success they have established a significant fan base, and even created a professional women's league twice. In fact, on a Thursday afternoon in 2004, Wilson (2007) noted that roughly 10 million viewers watched the women's Olympic gold medal game between the U.S. and Brazil.

Rascher, Baehr, Wolfe, and Frohwerk (2006) believe that men's professional soccer has promise, as the league has slowly expanded out to its current status of 13 teams, and has plans to expand further if there are the means to do so. This research seeks to build off current research by looking into the realm of international play, as the World Cup is generally seen as the "gold standard" in determining how good of a national team one nation has. Therefore, the purpose of this study was to examine the effects of World Cup appearances on the popularity of the MLS in the U.S., with a specific focus on college student participation with the MLS.

#### *Significance of the study*

Studies have been conducted that try and look at several factors that influence attendance at MLS games. Jewell and Molina (2005) examined what keeps soccer fans of Latino or

Hispanic descent from following MLS. Their study found that the Hispanic soccer fans preferred the better soccer play of the professional Mexican leagues to the MLS. Other studies have looked into the effects of star players, such as David Beckham and Freddy Adu, and how they have impacted attendance of MLS games. One study, conducted by DeSchraver (2007), found that the stars in their first seasons provided huge financial gains for the MLS and greatly boosted attendance, Adu by an average of 11,000 fans per game in his 2004 rookie season.

Beckham's announcement of coming to the MLS provided a huge media buzz and has several fans excited about seeing the great English star (Cobb, 2007). While some note the impact of international success on the women's side, perhaps the lack of success on the men's side is one reason that has kept very many studies from being done concerning international success and MLS attendance. One study of note though, Markovits and Hellerman (2003), looked into media coverage of the World Cup in U.S. newspapers, as well as briefly noting MLS attendance. Collins (2006) has gone on to try and find the missing link, as to what keeps those who play soccer at a younger age from becoming soccer fans.

### *Delimitations*

Delimitations to the study are that 1) the study was conducted at eight colleges or universities, all but one are within a relatively close proximity to a MLS team, 2) the focus is on American soccer, both professionally and internationally, 3) participants should be sports fans, primarily soccer fans, and 4) the study will look into attendance figures for MLS and U.S. games to determine the popularity of American soccer, 5) the timeframe of the study only covered the 2005, 2006, 2009, and 2010 seasons of MLS attendance data, featuring two world cups.

### *Limitations*

Limitations to this study included the lack of sustained success by the U.S. men's team, the lack of a professional men's soccer team in the southeast, and finally the limited selection of potential university targets. The first limitation is the lack of the U.S. team winning the World Cup and then not making the World Cup, to get two very different results. Secondly, the lack of a professional team in the southeast means that the sample will have limited results, as some of the participants do not have the ability to follow a local MLS team. Lastly, the selection only of universities that contain a sports management or kinesiology program greatly reduces the number of potential universities to target.

### *Assumptions*

Three assumptions critical to this study are that 1) the U.S. economy and population has the ability to support a successful professional soccer league along with the other four professional sports leagues, 2) the survey created is a valid measuring tool in terms of gauging a participants interest in American soccer, both professionally and internationally, and 3) the participants answered the survey honestly and to the best of their ability. The first assumption is the most critical, because if the U.S. economy and U.S. citizens cannot support a professional soccer league than it doesn't matter how well the national team does in future World Cups.

### *Research question*

Does college student attendance at MLS games increase with each World Cup appearance by the U.S. men's team? Is there a connection between college student survey results and the national attendance records of the MLS?

*Definition of terms*

1. Popularity - attendance at MLS games, as in terms of tickets sold for each game and the percentage of each stadium filled.
2. World Cup – the 32-team tournament, not the qualifying stages.
3. Participation – attendance of games and/or watching games on television.



## CHAPTER TWO

### REVIEW OF THE LITERATURE

The proposed study examined how World Cup appearances influences college student attendance at Major League Soccer games. This section of the proposal will give a review of literature that is relevant to the proposed study. The literature review will be the national perspective on the state of affairs of soccer in the U.S. In particular, the review will focus on the current state fans of soccer in the U.S., factors that influence fan attendance in sport, and the impact of the international sporting events on national identity. The current state of soccer fans in the U.S. will help provide a background for the MLS and U.S. soccer. Attendance of sporting events can often be attributed to various factors and in understanding these factors; sports leagues can begin to shift their marketing strategy and game day operations to attract more fans. Lastly, soccer is one of the few sports where an international event is bigger than everything else going on in the sport; therefore understanding the influence of World Cup success on fan behavior is vital in predicting attendance at regular league games.

#### *Soccer fans in the U.S.*

American soccer, both professionally and internationally, is often seen as somewhat unpopular to the majority of the public in the U.S., there is a small soccer following (Markovits & Hellerman, 2003). Fan support for the national team has been lacking, as the example noted earlier where the U.S. men's team faced the national team from Poland in Chicago, yet most of the fans in attendance wore Polish colors and gear (Brown, 2007). Another example, noted by Brown (2005), of when this happened was when an MLS team, the Chicago Fire, played in a

friendly match against the Polish national team. The game drew approximately 40,000 fans yet once again, as in the international game, most fans wore Polish colors and Polish gear, such as jersey's or scarves.

This lack of fan support is a bit odd, considering there are numerous soccer participants in the U.S. Two studies found that participation rates in soccer have dramatically increased over the past several years. Brown (2007) found that there was a 300% increase in the participation rates for soccer during the 1980's and 1990's. Also, Collins (2006) similarly found that in 2001 over 19 million people participated in soccer in the U.S., and in terms of youth soccer, it had nearly 1.3 million more participants than little league baseball. In terms of participation in schools, soccer ranks fifth. It also ranks fifth in overall participation rates behind basketball, baseball and softball, American football, and volleyball (Brown, 2007; Wilson, 2007). Unfortunately, even with all this participation, MLS games and even games for the U.S. men's national team lack a strong fan base and following.

According to the MLS, there is a group of 80 million Americans who support the growth of soccer in the U.S. Also they had approximately 22 million people attend MLS games between 1996 and 2003 (Collins, 2006). In addition to that, approximately 95% of all MLS games were broadcasted on television during the 2004 season (Collins, 2006). These games unfortunately only had a rating of 0.2 (Collins, 2006). Brown (2005) found similar ratings and attendance numbers as Collins (2006), as the 2003 MLS cup had a rating of 0.6; this is significantly less when compared to other sporting championship games. A 0.6 rating means that only 0.6% of the television audience turned on the game, which roughly equates to 600,000 households, if the total market is 100 million televisions. The World Series had a rating of 13.9, NBA finals 6.5, and the Super Bowl a dominating 41.3. Demonstrating that in terms of television viewing

audiences, the MLS has a ways to go before being on par the bigger sports in the United States. Even with these poor viewer ratings, however, the MLS only drew in approximately 1,500 less fans a game compared to the NBA, attracting roughly 15,000 people on average to MLS games; and during the 2005 season, the MLS attracted 3.1 million fans to all their games (Brown, 2005; Wilson, 2007). This number has since risen to approximately 16,350 for this current 2010 season; the fourth highest in MLS history (Grayson, 2010). The recent spike could be attributed to World Cup fever that spreads throughout the U.S., bringing about a passion for soccer from Americans one month, every four years.

An increase in attendance for the MLS due to international soccer is possible as there has been a precedent set by the U.S. women's team, in that success in international competitions can lead to creating a larger fan base and a more dedicated fan base in America. For the 1999 Women's World Cup, approximately 40 million viewers tuned in to watch the championship game between the U.S. and China. Then based off this success, the United States Soccer Federation took the initiative and created the WUSA, a professional women's soccer league (Wilson, 2007). Unfortunately, the WUSA only lasted 4 years, closing in 2003. But, today there is the WPS, Women's Professional Soccer, which has taken the WUSA's place and is trying to survive longer than the WUSA did. This leads to hopeful thinking that a strong and consistent showing in international friendly's and World Cup's could boost the number of soccer fans in the U.S., and in particular, the number of fans of American soccer.

Markovits and Hellerman (2003) found some findings that MLS attendance may increase, if the U.S. men's national team is ever to consistently have World Cup success. They looked into the media coverage of the 2002 World Cup, and found that overall coverage of soccer increased during the World Cup, with coverage leading up to and recaps of all U.S. games

garnering the most coverage. However, during their study they did find that local soccer events, such as high school or club soccer, sometimes received more coverage than MLS games. But even with that finding, Markovits and Hellerman (2003) believe the U.S. can eventually become a soccer-crazed nation. They know there are soccer fans in the U.S., because World Cup games attracted a decent viewer rating of 1.4, similar to the rating the Stanley Cup finals had received. Furthermore, several thousand people, 50,000-60,000, turned out to a MLS game in Denver and then a similar number showed up for a game in Los Angeles. Clearly, based on those games featuring 50,000+ fans that there is a fan base for soccer within the U.S.

A final area of to look into ways fans may interact and follow their favorite MLS team is the technology sector. Several thousand people are now following MLS and U.S. national teams through the Internet. One of the main websites that soccer fans follow and visit is bigsoccer.com. According to Wilson (2007), bigsoccer.com provides all sorts of information concerning soccer, including current events and the selling of merchandise, not just for the U.S. teams, but also, teams all over the world. In August of 2005, bigsoccer.com had attracted over 1 million visits during that month, and currently has 68,000 members. During August 2005, bigsoccer.com had well over 300,000 posts and around 13 million page views, clearly demonstrating that there is a significant and strong following. In this online community of bigsoccer.com, there are several discussions on the lack of media coverage, an anti-soccer sentiment in the media, and a need for more passion and fans at MLS games. Perhaps studies should look into these suggestions, as the members of bigsoccer.com may be on to something. Another common post is about the lack of fans of soccer (Markovits & Hellerman, 2001).

Markovits and Hellerman (2001) found that a big reason for why other sports are more popular in the U.S. is that when the U.S. was developing as a nation, immigrants who came over

and wanted to assimilate were told that baseball was American; with basketball and football, also being called American sports as well. Soccer on the other hand, was seen as a foreign sport and therefore struggled to gain a fan base early on in the U.S., meaning they were unable to become an established league, much less a favorable sport in the U.S. for several years, if not decades. Along with this were communication problems between FIFA and the USSF in regards to athletics in high school and college, leading to both sides developing a slight dislike for the other, and straining future talks between them.

### *Factors influencing attendance*

Sports fans are a unique segment of the consumer market mainly because the sporting sector in and of itself is unique compared to other industries. Several factors are known to affect attendance at sporting events, none of which are primarily unique to soccer or any one sport in particular. These factors are how demographics of a region can affect a team's attendance, the influence of star players, and the impact of brand image and sponsorship deals. Jewell and Molina (2005) conducted a study that looked into factors affecting attendance of MLS games, and in particular, the attendance of Hispanics at MLS games. In their study, they found several factors that influenced attendance: quality of the team, number of star players on the team, quality of opponent, along with whether or not the MLS team was in an area that featured other professional sports teams, with quality of teams based on the number of points a team has accrued during the season.

One significant factor found was that the number of star players on the team affected attendance, with the greater the number of star players, the better the attendance at the specific game. The more stars on the team, the better the quality of the team due to individual talent. It was also found that being in a city with another professional team did not automatically mean

lower attendance at MLS games. In fact, MLS cities with NBA teams found slightly higher attendance, with one reason being that the seasons do not overlap and therefore no choice must be made between the two. But teams in a city with an NFL team had slightly lower attendance, indicating the two sports might be substitutes of one another or also that Americans have a greater passion for American football (Jewell & Molina, 2005).

The biggest finding out of their study was that star players do in fact attract greater attendance to their games, than games without any stars. Brown (2005) echoed these findings, in as until the quality of soccer improves in the U.S., very few will pay attention to the MLS. The MLS, with the signing of David Beckham, as well as keeping top national team players such as Landon Donovan, should see their attendance increase based on Jewell & Molina's findings. DeSchrive (2007) conducted a study looking at the impact of the young up and coming superstar, Freddy Adu, on attendance of away games during the 2004 for D.C. United. It found that the presence of Adu was highly significant in increasing overall fan attendance by approximately 10.7% or roughly an additional 1,750 people per game. DeSchrive (2007) then goes on to predict that Adu's presence in D.C. United's games increased MLS revenue by approximately \$3.25 million.

Cobb (2007) found that David Beckham's impact of coming to MLS was influential on fans as season ticket sales increased approximately 3,000 for every team, just on the announcement alone. While the L.A. Galaxy already boast quality star players, such as Landon Donovan, David Beckham brings another name for the MLS to try and market to attract more fans. Unfortunately there is not much data on Beckham's actual impact at the moment, but if the current studies' findings remain true, Beckham should provide a much-needed boost to MLS

attendance in every game he plays. Only time will tell if Beckham can have positive impact on MLS attendance, and the U.S.'s overall interest in soccer.

Garland, Macpherson, and Haughey (2004) looked into factors that influenced fan attendance at rugby games in New Zealand. In their study, they broke down the potential factors into two categories: 1) controllable factors, those that management of rugby teams is able to control, and 2) uncontrollable factors, those that management cannot control. Cleanliness of the stadium, the atmosphere of the event, other fan behavior, ticket prices, and access to the stadium were all significant controllable factors influencing attendance. While the live sport action, quality of the opposition and the home team's recent performance were significant and influential uncontrollable factors.

Furthermore, Garland and colleagues (2004) looked into how these factors influenced die-hard fans, fair weather fans, and those who are considered walk-up fans. Fair-weather fans, those who don't attend a lot of games but still consider themselves fans of the team, found the cleanliness of the stadium, atmosphere of the event, price of tickets, quality of opposition, and the recent performance of the home team as very important to them. Walk-up fans only found the fact that the event was a live sport contest as very important to them, but did find the same factors as the fair-weather fan to be important to them. This is an important find, as Garland et al (2004) states that if teams want to increase fan attendance, they need to work on converting walk-up fans to fair-weather fans, and fair-weather fans to die-hard fans. As fan loyalty and passion for the local team increases, so does the likelihood of the fan purchasing tickets, if not season tickets, to the local teams' rugby games.

Laverie and Arnett (2000) found similar results concerning fan loyalty and identification with teams. The stronger the fan identified with the team, the more likely they were to attend

games. They stated that creating a strong connection between the team and its surrounding local community would enhance fan identification with the team. Those relationships should then create a strong identification with the local MLS team, leading to greater attendance numbers for that team.

One study, while slightly dated, offers some promise that a successful run at the 2010 World Cup in South Africa would help increase attendance of MLS games the following year. Welki and Zlatoper (1991) looked at factors that affected attendance of NFL games during the 1991 NFL season. One of the strongest predictors of attendance was the record of the home team; the better the record of the home team, the higher the attendance at the game. This leads to the thought that a strong U.S. run at a World Cup, made by a team full of MLS players, would help boost the league's attendance overall.

Shackelford and Greenwell (2005) conducted a study on attendance of women's division I sports in the NCAA. In their study, they found that as the number of professional teams and especially other division I schools in the area increased that attendance of women's basketball, softball, volleyball, and soccer matches all decreased. They surmised that as the number of sporting event choices rose for consumers that there would be some drop off in attendance, as consumers are likely to go out for sporting events the same number of times, but will choose to go to a different sporting event each time.

Additionally, Shackelford and Greenwell (2005) proposed that women's soccer attendance was not impacted by size of the school simply because the women's soccer season occurs the same time as football. This is an important find, as the MLS needs to try and schedule its season during a time when there will be few other conflicts with other professional sports, so that they don't lose consumers to other sporting events. Furthermore, Welki and Zlatoper (1991)



found that non-televised games, i.e. blackouts, were more poorly attended, losing approximately 5000 fans. Clearly media coverage may play a role in how successful the MLS can become.

A growing trend in the sports industry is teams placing corporate logos all over the jerseys and naming teams after corporations might affect attendance. Jensen, Weston, and Wang (2008) showed that there was some unrest and anger amongst fans of the MLS team over the decision to allow a corporation to be part of the team's names. They also found, that some fans and people from other professional leagues in the U.S., saw this as a way of clearly distinguishing the MLS as a second rate professional league. The basis being that the top 4 leagues, NFL, NBA, NHL, MLB, do not do that; and because MLS did, to help increase its revenue, is a clear sign of its inferior status. However, Jensen and colleagues (2008) did find that the MLS saw this as a necessary move in order to grow and become a major player in the professional league fan market in the U.S.

A key part of this step in allowing corporations to be part of the team name, or to include their logos on the jerseys, is brand image of the team. Bauer, Sauer and Ecler (2005) conducted a study in Germany, concerning teams in the Bundesliga, examined the effects of brand power on fan attendance and loyalty. Brand image of the team significantly impacts attendance. Sponsorship deals impact the brand image, as partnering with bad corporations or scandal-ridden corporations can negatively influence a sports team's brand image. Similar results were found during a study conducted on French premier league soccer, as a positive brand image will help attract and keep fans (Beccarini & Ferrand, 2006). Bauer et al (2005) and Beccarini & Ferrand (2006) also found that on the field success does not completely translate into 100% fan attendance and loyalty, hence the importance of brand image. These two findings show that

success by the men's international squad of the U.S. might be just what the MLS needs in order to boost its attendance and create more fans.

### *International sporting identity*

A final key area in the literature is looking at to see if international sporting success truly effects fan attendance. This section will cover topics considering national pride that occurs in international sporting events, effects of hosting one of these international sporting events, and then stating the current sports culture in the U.S. In terms of U.S. soccer, as stated earlier, there has been a precedent set by the U.S. Women's team that international success can build and create a bigger fan base back home in the U.S. Smith and Jarkko (1998) found that international sporting competitions are a great source of national pride, and that 77% of the average Europeans national pride came from the success of the countries national sports teams. Nauright (2004) found similar results to Smith and Jarkko (1998), as nations use events such as the Olympics and the World Cup to gauge where they fit on the hierarchy of nations; especially, since international sporting events elicit great emotions of nationalism from fans, hence why countries desperately vie for the chance to host them.

In securing the bids for such events, the nations generally create several new facilities and greatly improve the infrastructure of their economy in the process. A good example of this was when Bayern Munich was able to acquire a new soccer specific stadium through Germany hosting the 2006 World Cup. Along with this, Germany benefited from having several thousand to millions of people come to their country to attend the games and partake in the festivities that accompany such an event (Hay & Joel, 2007).

In order for soccer to take the next step in America, the U.S. men's national team needs to have greater success and more sustained success, as failure to qualify for a World Cup will be

a major set back. Much of the reason for the success of the NFL, MLB, and NBA is because they have the top talent in their respective sports (Brown, 2007; Brown. 2005). With victories in World Cups, and the ability to keep top talent, particularly from the U.S. team, the MLS should be able to take the next step, Americans love success and only want to see top talent (Collins, 2006).

Brown (2005) found that one way to accomplish bringing greater international success to U.S. soccer and increase MLS attendance is by having MLS teams face top-notch European club teams. The only downside to this being that these games will only further show the disparity between the MLS and the professional leagues in Europe. The end result leading to fewer fans paying to go to MLS games since it is not a quality product. However there is some promise to the idea as it gives Americans teams to root for, ideally the MLS teams, as well as providing the fans with top-level players from the European club teams. As mentioned earlier, Cobb (2007) & DeShriver (2007) found that by attracting stars such as David Beckham and Freddy Adu to the MLS, attendance rose on average by 1,000-3,000 per game that these players played in.

### *Summary*

The literature has shown some themes for soccer in the U.S., as well as the implications of international success on the MLS. However, there are gaps because no one has looked into the impact of the U.S. men's team's success on MLS games' attendance. The proposed study looks to help fill this gap. Also in the literature there were many notions that increasing the number of stars in the MLS will boost attendance, which is why keeping players such as Donovan and landing David Beckham, are very important for the league to increase its popularity internationally. While soccer is on the rise, the review of the literature shows that there are still many steps to take in order to become a major sport in the U.S.

## CHAPTER THREE

### METHODOLOGY

#### *Participants and sampling techniques*

For this study, eight hundred students were targeted from eight universities, with one hundred college students being targeted from each university. To improve the participation from each university, four professors were contacted at each target university. The students were selected from the University of Georgia as a whole, as well as seven other universities that are within a close proximity to a MLS team. These universities consisted of George Washington University, Ohio State University, Southern Methodist University, University of Houston, University of Southern California, University of Utah, and the University of Washington.

Eight hundred students was the target number in hopes of having sufficient numbers to identify meaningful statistical differences in the data. All students were eligible to participate in the study, meaning undergraduate students, graduate students, and doctoral students, and all have the chance of having one of their classes being selected to participate in the study. If eight hundred students were not reached, a minimum of fifty students from each university was necessary for the study. A total of four hundred students was decided for the minimum number for the study, with eight hundred being the targeted number.

One key requirement in the study was that the student must have some interest in sports. Having enough of students who lacked an interest in sports would significantly skew the results. In order to reduce the number of non-sports interested persons from taking the survey, it was

noted in the consent form, asking them to please not take the survey if they lacked any interest in sport.

Additionally, MLS attendance data was gathered from the 2005, 2006, 2009, and 2010 MLS seasons. These four seasons included the 2006 and 2010 World Cups. Data was collected utilizing contacts made within Major League Soccer. The contacts were most helpful in providing the sought attendance data from the four seasons.

### *Study design*

The study was conducted online and in the form of a survey questionnaire. Overall, the questionnaire was comprised of twenty-six questions. Various types of questions were asked, based on their scale of measurement, in order to provide a broader perspective. The survey was administered to try and reach at the understanding for why the participants do or do not follow the MLS. One particular focus was centered on how their following is influenced by the World Cup.

After the initial contact and confirmation from professors, emails were sent out containing the link to the survey. After the emails are done, a 3-week period was given for the students to take the survey. At the conclusion of the 3-week period, a follow up email with each teacher were sent for the teacher to remind the students to take the survey. Then another 2-week interval was given after the follow up for all the students to take the survey.

### *Instrumentation*

The study was conducted using an online survey through the web based survey producer [www.surveymonkey.com](http://www.surveymonkey.com). On the survey website, participants were asked to take the survey questionnaire, which will take approximately 15-20 minutes to complete. The survey featured

several close-ended multiple-choice questions and a few rank order questions. Questions focused on the following areas:

- What factors affect their attendance of MLS games
- Does the participant follow soccer
- What factors will get them to watch MLS soccer
- How do World Cups affect the participants view of soccer
- How much soccer students watched during the World Cup
- Whom did they watch
- Did star power of the team influence their viewing patterns
- Did success influence their viewing patterns

Validity was enhanced by asking four people to take the survey in a certain way, as a person who does not care of soccer at all, someone who likes soccer but not the MLS, a casual MLS fan, and a die-hard MLS fan. Once they took the survey, the results were analyzed and a 1-on-1 meeting occurred to go over the results and make sure they were being interpreted properly in terms of the way the person answered the results. A couple of questions had their answers rewritten to bring about a better clarity and create less confusion. Additionally, some questions were rewritten as well to bring about a better focus to the question. With the reworking of a few questions and answers, a better analysis of three questions under the key areas of interest could be done. Some restrictions and dangers to the validity of the study are that the study will only be focused around the World Cup, and therefore might not capture the true picture of American sports fans concerning U.S. soccer.

### *Procedures*

For this study, the students were selected from eight universities: George Washington University, Ohio State University, Southern Methodist University, University of Georgia, University of Houston, University of Southern California, University of Utah, and the University of Washington. First, contacts were made with four professors from each university. One professor came from each university's kinesiology department. The other three professors were selected from three different departments, utilizing collegeboard.org to determine the most popular majors within each university. Within each department, professors were selected who taught classes with large student populations, hopefully featuring 30+ students. Selection was based on which professor can reach the most students. These professors were contacted once in the spring of 2011, after the 2010 World Cup and 2010 MLS season and prior to the start of the 2011 MLS season. After contact was made, an email with instructions concerning the survey was sent to each professor. The professor was asked to forward the email to his or her students. Each email contained website where the students can go to take the survey, as well as a brief description of what the study is about and roughly how long the survey should take.

Informed consent was obtained in the initial question of the survey. This question stated all the information concerning the survey, privacy concerns, etc. After having read the statement the student were given two options. The first option was "I have read and understand the above statement, and agree to participate in this study," and then the second option was "I do not wish to participate in this study." If the second option is selected, the student was directed to an end of survey screen.

*Statistical analysis*

Descriptive counts, such as graphs, charts, and tables, were used to help illustrate the results. The Chi-Square Test of independence was used to help identify statistical significance of observed relationships between multiple factors, with the statistical significance being highlighted between the key variables. The survey results only show the view of MLS soccer and World Cups through the participating college students' view. To get a national viewpoint as well, the attendance data from the 2005, 2006, 2009, and 2010 MLS seasons were examined.

Actual attendance data from the 2005, 2006, 2009, and 2010 MLS seasons were analyzed statistically. A week-to-week attendance analysis was conducted on the data. From the analysis, the impact of a World Cup's influence on MLS attendance was measured. Combining these results with the survey results provided a more complete picture of the soccer fan base in the United States, and in particular the fan base of the MLS. This combination will show how the national attendance records compare to the survey results of the college student population.

To answer the research questions, certain survey questions were analyzed along with the weekly attendance data. If the attendance data spike during the two months of World Cup play during the 2006 MLS season and 2010 MLS season, but is not shown in the other two seasons, then this spike suggests peaked interest due to the World Cup. In particular, if there is a spike in the 2010 season in which the U.S. men's team performed better, than the research question will be satisfied.



## CHAPTER FOUR

### RESULTS

This study looked into how World Cup appearances by the United States men's national team influenced college student attendance of Major League Soccer games. To accomplish this a twenty-six question online survey was created, with a goal of sending it out to 32 professors from 8 universities. Additionally, individual regular season attendance data from the 2005, 2006, 2009, and 2010 MLS seasons, were examined to help determine if the preliminary college student data relates to MLS attendance trends.

#### *Demographics*

Eight universities were sought out after, with all eight giving approval for the study. Unfortunately, due to unexpected time delays and then time constraints, only seven of the universities had their professors solicited for help. The University of Houston's Institutional Review Board granted approval of the study, but by the time of their approval, the ability to recruit teachers for the study was no longer available as the university was right at the end of their spring semester. Of those seven universities, only six (75%) of them had professors who were willing to help out with the study. From the six universities, 15 professors agreed to help with the study (46% of the professor slots filled). The process of securing help from 15 professors required soliciting help from 82 professors from seven universities, a return of 18%. George Washington University, which yielded zero professors, had the most professors contacted, with 19. With the help of 15 professors, 353 students started the survey, falling 47 students shy of the minimum target of 400 students. However, 353 students from 15 professors

yielded a rate averaging 24 students per professor. If the targeted amount of 32 professors were able to help, using the rate of 24 students per professor, a total of 768 students should have taken the survey. The overall return rate on students contacted compared to those that took the survey is unknown. Of the 353 students who started the survey, a total of 331 students finished the survey (93.7% completion rate).

Four demographic questions were asked to the participants, what is their age, what is their gender, what is their race, and what university does each person attend (see table 1). The vast majority, 70.3% of participants were between the ages of 18 and 21. 23.1% were 22-25, and 6.6% of participants were 26 or older. The majority of the participants, 63.4%, were female, compared to the 36.6% of their male counterparts. As for racial differences within the participants, 69.7% selected Caucasian, 5.4% selected African American, 6.2% selected Hispanic, 19.3% selected Asian/Pacific Islander, 1.1% preferred not to answer, and 1.7% selected other. It must be noted that some participants selected multiple races, hence the percentages adding up to 103%. This is not to be unexpected as the global society is becoming more and more diverse.

The final demographic category concerned the topic of which university the participants attended. Participants came from one of six universities: Ohio State University, Southern Methodist University, University of Georgia, University of Southern California, University of Utah, and University of Washington. The University of Southern California had the most responses, garnering 39.9% of all responses. Southern Methodist University was second with 17%, followed the University of Washington at 14.1%, and Ohio State University at 12.9%. The bottom two universities were University of Utah at 10.1% and the University of Georgia at 6%.

**Table 1 – Student Demographics (those who completed the study)**

<b>Gender</b>	<b>N</b>	<b>Percentage</b>
<i>Male</i>	127	36.6
<i>Female</i>	220	63.4
<b>Age</b>		
<i>18 – 21</i>	246	70.3
<i>22 - 25</i>	81	23.1
<i>26 +</i>	23	6.6
<b>Race/Ethnicity</b>		
<i>Caucasian</i>	246	69.7
<i>African American</i>	19	5.4
<i>Hispanic</i>	22	6.2
<i>Asian/Pacific Islander</i>	68	19.3
<i>Prefer not to answer</i>	4	1.1
<i>Other</i>	6	1.7
<b>University</b>		
<i>The Ohio State University</i>	45	12.9
<i>Southern Methodist University</i>	59	17.0
<i>University of Georgia</i>	21	6.0
<i>University of Southern California</i>	139	39.9
<i>University of Utah</i>	35	10.1
<i>University of Washington</i>	49	14.1

*Key areas of interest*

Structured throughout the twenty-six question online survey, were questions focused on the key areas of interest for this study. Three key areas within the survey focused on a participants' following of the World Cup, the relationship between World Cup nations and their respective soccer leagues, as well as Major League Soccer fandom and the following of regular season games. The key areas of interest cover questions 10-11, 15-18, and 23, 25-26. Basic descriptive statistics will be given of these questions first, followed by a more in-depth analysis featuring Chi-Square data analysis techniques to show potential relationships between questions.

Questions ten and eleven focused on whether or not a person has attended or watched a men's World Cup soccer game, as well as how many games of the men's 2010 World Cup were

watched by that person. Of the 340 people who answered question 10, 65% said that they had indeed attended or watched a men's World Cup game (see Appendix B – Question 10).

Question eleven focused the number of 2010 World Cup games were watched, offering answers of none, 1-2, 3-4, 5-6, and 7+. Of the 340 respondents, almost one third of them, 29.1%, said they had watched seven games or more of the 2010 World Cup. Furthermore, all but 15% had said they had watched more than one 2010 World Cup game. Since the United States men's team played in four games during the 2010 World Cup, this means that at least 42.4% watched more than just the U.S. play in the 2010 World Cup (see Appendix B – Question 11).

Questions fifteen and eighteen focused on how World Cup appearances by the country's national team influenced a person's perception on the talent level of the league in general and then specifically asking about the U.S. men's national team talent level and the MLS's talent level. The question with a general focus on the relationship between the national team and its country's primary soccer league had 338 respondents (see Appendix B – Question 15). Of those 338, 81.7% of the people believed that appearances by a country's men's national team either made the primary soccer league elite or positively influenced the league, just not to the elite level. An additional 11.8% believed that while appearances had no influence, how successful the team was during each appearance did positively influence the perception of the primary league. This leaves only 6.5% who believed that World Cup appearances by a country's national team had no influence on the perception of the country's primary soccer league.

As far as the question referring to the U.S. men's team's talent level reflecting the talent level of the MLS was answered, the respondents were split pretty evenly into thirds (see Appendix B – Question 18). Out of a total of 333 respondents for this question, 34.5% said that the talent level of the U.S. men's team talent level reflects the talent level of the MLS. 29.4%

thought that the U.S. men's team talent level does not reflect the talent level of the MLS. The final 36.1% who believed that the level of reflection of talent between the U.S. men's team and the MLS varies based on how many players from the MLS play on the national team: with the more players on the national team that play in the MLS, the stronger the relationship between the two will be and vice versa. This means that 70.6% of participants felt that the talent level of the U.S. men's team had some reflection on the talent level of the MLS.

Questions sixteen and seventeen focused on whether or not watching World Cup games increased a person's interest in watching other soccer games, as well as how long this peaked interest in soccer lasted. Question sixteen asked if watching World Cup games increased a person's interest in watching other soccer games (see Appendix B – Question 16). 51.3% answered yes that watching World Cup games did indeed increase their interest in other soccer games. 35% said no that their interest was not influenced in any way, either because they were not fans of soccer or because were already avid soccer fans. The majority within the 35% was the former of not being fans of soccer. However, a small group of respondents, 13.7%, answered that their interest was increased depending on the soccer league. This means that approximately two-thirds, 64.9%, of all respondents thought their interest in watching soccer increased due to watching World Cup games.

Question seventeen was used as a follow up question to sixteen, in order to try and determine how long the increased interest lasted (see Appendix B – Question 17). Respondents were given the choices of a) only until the U.S. completes its World Cup run, b) only until the end of the World Cup, c) a few weeks after the World Cup, d) a few months after, and e) till the end of the year. 217 total respondents, missing only 2 respondents who said they were influenced by watching World Cup games, answered question seventeen. The response was split

pretty evenly, almost 50-50 (55% to 45%) when looking at those who had a peaked interest longer than the World Cup and those that only had a peaked interest up until at most, the end of the World Cup. Specifically, 9.2% had their peaked interest end once the U.S. was out of the World Cup, 35% had their interest stop once the World Cup was over, 29% lasted a few weeks after the World Cup, and 26.8% had their interest last at least a few months. The data shows that there is some peaked interest in other soccer games outside the World Cup within the sample.

The final key area of interest focused on MLS fandom and how many MLS games people watched or attended during the 2010 MLS season. Question twenty-three asked whether or not respondents were MLS fans (see Appendix B – Question 23). 36.3% of respondents considered themselves MLS fans, while 63.7% did not consider themselves MLS fans.

Questions twenty-five and twenty-six asked how many MLS games respondents attended during the 2010 season and how many MLS games respondents watched on television during the 2010 season (see Appendices J and K). Both questions featured the same answer choices of a) none, b) 1-2, c) 3-5, d) 6-9, and e) 10+. Both questions also had an equal number of respondents of 327 people. The responses to these questions are slightly different, as more people watched MLS games on television than actually attended a game. A big majority of 74% stated that they had not attended a MLS game during the 2010 MLS season. Of those who had attended at least one game, a majority of those people, 74.1%, had only attended one or two games. This leaves 1.5% who attended at least 6 games.

When it came to watching MLS games on television during the 2010 season, the results were slightly better. Only 52.3% of 327 respondents reported not watching a single MLS game on television, while 8.3% of respondents had watched at least 6 MLS games on television. Also, of those that watched at least one game on television, only 62.2% of respondents had watched

only one to two games. This leaves 18% who had watched more than two games of the 2010 MLS season. The differences between watching versus attending MLS games is not too surprising, given the relative ease of turning on a television versus driving to a game, parking, attending, and then driving back home.

### *Chi-square analysis*

To determine if there were any relationships between questions, a Chi-Square analysis was used. This analysis will not say what the relationship is, or which way it flows, but rather indicates whether the observed frequencies differ significantly from the expected frequencies if no relationship. As stated earlier, there are three sets of questions covering key areas of interest for the study. These three sets of questions were analyzed against one another to determine if there was a potential relationship between them.

The first sets of questions to be compared are 16, 17 and 25, 26 (see Table's 2 & 3). This means looking to see if there is a relationship between peaked interests in soccer during and following the World Cup, and how many MLS games are watched or attended. When comparing whether or not watching World Cup games increases the respondents' interest in watching other soccer games versus how many MLS games the respondent watched during the 2010 season, the Chi-Square analysis comes out with a p-value of  $<0.001$ . While this result seems significant, a larger sample size is necessary to accurately determine significance as multiple cells have less than 5 responses in them. The significance is considered invalid if there are not enough responses in each cell. To avoid this problem certain answers will be combined together, when applicable, to help increase the number of responses in each cell. That being said, of those that answered, "no, I am not a soccer fan," they almost all appeared in the "none" category for how many MLS games they attended during the 2010 season. However, those that

responded, “yes” or “depends on the league,” each had a respondent attending 10 plus games.

The “avid soccer fan” respondents featured more game attendees than non-game attendees, and were the only group to do so, as 9 did not attend a game, compared to the 14 that attended at least one game.

Comparing a peaked interest to how many MLS games were watched, rather than attended, also came out significant with a p-value of  $< 0.001$ . Once again a larger sample size is necessary to determine significance accurately, but the patterns in the results give a pretty good suggestion as to the relationship that may in fact be there between the two questions. Unlike the previous comparison where only the avid soccer fans had more respondents attending games than not attending games, the only group of respondents to not have more people watch games than not watch games were in the “no peaked interest and not a fan of soccer” group. This time the numbers of respondents who watched more than two games increased to fifty-nine compared to the twenty-two people who attended more than two games, an increase of thirty-seven people. One interesting thing to note, is that those respondents who did answer “yes” had sixteen people watch six or more games, with seven of them watching ten or more games, which is a big increase over the single respondent who attended ten or more games.



**Table 2 – Increased interest x MLS games attended or watched**

		<b>Does watching World Cup games increase your interest in watching other soccer games?</b>				<b>Total</b>
		<i>Yes</i>	<i>No, not a fan</i>	<i>No, already of an avid soccer fan</i>	<i>Depends on the league</i>	
<b>How many MLS games did you attend in the 2010 season?</b>	<i>None</i>	36.2%	25.8%	2.8%	9.2%	74%
	<i>1 – 2</i>	11.4%	1.4%	2.8%	3.7%	19.3%
	<i>3 +</i>	4.0%	0.0%	1.5%	1.2%	6.7%
	<b>Total</b>	51.6%	27.3%	7.1%	14.1%	100%
	<b>p-value</b>	< 0.001				
<b>How many MLS games did you watch on television in the 2010 season?</b>	<i>None</i>	22.4%	24.2%	0.6%	4.9%	52.1%
	<i>1 – 2</i>	17.8%	3.1%	2.8%	6.1%	29.8%
	<i>3 +</i>	11.3%	0.0%	3.7%	3.1%	18.1%
	<b>Total</b>	51.5%	27.3%	7.1%	14.1%	100%
	<b>p-value</b>	< 0.001				

The other pairing of comparisons within this four-question group is the length of the peaked interest against number of MLS games attended or watched. Both comparisons have significant p-values at < 0.01 (attend) and 0.01 (watched on television). Once again, these p-values need to read with caution, as even by combining the data into broader answers (larger groups), there were still answer cells that had less than the minimum desired for the expected count. Looking solely at games attended versus length of peaked interest reveals that when peaked interest is longer, then the more games respondents are likely to attend. Those respondents who answered that their peaked interest lasted “till the end of the year,” had the only people who attended ten or more games, as well as had more people who attended three to five

games than all the other categories of peaked interest. Another interesting piece to note is that of those who only had their interest peaked during the U.S. World Cup run, all but one did not attend a single MLS game. There are couple of reasons for this, such as timing of the MLS schedule during the World Cup run, but even then it seems that more people would have likely gone to see at least one game during the U.S.'s World Cup run, as the respondents come from all over the country.

**Table 3 – Length of peaked interest x MLS games attended or watched**

		<b>How long does this peaked interest last?</b>			<b>Total</b>
		<i>Only until the end of the World Cup</i>	<i>A few weeks after the World Cup</i>	<i>A few months after the World Cup</i>	
<b>How many MLS games did you attend in the 2010 season?</b>	<i>None</i>	35.5%	18.2%	15.4%	69.6%
	<i>1 – 2</i>	7.5%	8.9%	6.5%	22.9%
	<i>3 +</i>	0.9%	1.9%	5.1%	7.9%
	<b>Total</b>	43.9%	29%	27.1%	100%
p-value		0.001			
<b>How many MLS games did you watch on television in the 2010 season?</b>	<i>None</i>	24.8%	12.1%	4.7%	41.6%
	<i>1 – 2</i>	13.1%	9.8%	13.6%	36.4%
	<i>3 +</i>	6.1%	7.0%	8.9%	22.0%
	<b>Total</b>	43.9%	29%	27.1%	100%
p-value		< 0.001			

When looking at the number of MLS games watched on television compared to the length of the peaked interest, a similar pattern to the MLS games attended is revealed. Once again, the longer the peaked interest lasted, then the more likely respondents were going to have watched more games. The largest number of respondents came from the “until the end of the

World Cup” and “a few weeks after the World Cup” groups. Here, both groups had strong numbers of respondents viewing one to two games, featuring over 20 respondents each. As should be predicted, the two longest peaked interest groups held the two smallest amounts of respondents who did not watch a single MLS game on television. The data from both watching MLS games on television and attending them appears to indicate that the longer the peaked interest in soccer lasted, then the more MLS games would be attended or watched.

The second Chi-Square data analysis worth noting is comparing the previously mentioned four questions and question twenty-three, which asks if the respondent is an MLS fan or not (see Table 4). This will help provide some clarity as to whether or not the people viewing most games are MLS fans or not, as it should be expected of MLS fans to view more games than a non-MLS fan. When comparing respondent’s answers to being MLS fans compared to if their interest was increased for other soccer, a significant relationship is found, as the p-value is  $< 0.001$ . The data are a little unclear as to what the relationship might be exactly, but what does appear is that if someone is not an MLS fan, then there is a high chance they will select the “no, it has no influence because I was not and am not a fan of soccer” response. Eighty-six out of eighty-eight respondents selected that, an overwhelming majority. Also, it appears that MLS fans are less likely to be influenced by the World Cup simply because they are already soccer fans and so their interest won’t be increased much, if at all. In contrast, people who weren’t MLS fans either had their interest peaked, or didn’t like soccer, almost a 50-50 split. While having an increased interest in soccer was significant to being an MLS fan, how long the peaked interest last was not significant, as the p-value was well over 0.05, with a value of 0.399.

**Table 4 – MLS fan x increased interest and MLS games attended or watched**

		<b>Are you an MLS fan?</b>		
		<i>Yes</i>	<i>No</i>	<i>Total</i>
<b>Does watching World Cup games increase your interest in watching other soccer games?</b>	<i>Yes</i>	23.8%	27.8%	51.5%
	<i>No, because I am not a fan of soccer</i>	0.6%	26.5%	27.2%
	<i>No, because I am already an avid soccer fan</i>	5.2%	1.9%	7.1%
	<i>Depends on the league</i>	6.5%	7.7%	14.2%
	<b>Total</b>	<b>36.1%</b>	<b>63.9%</b>	<b>100%</b>
p-value		< 0.001		
<b>How many MLS games did you attend in the 2010 season?</b>	<i>None</i>	17.2%	56.6%	73.8%
	<i>1 - 2</i>	12.6%	6.8%	19.4%
	<i>3 +</i>	6.5%	0.3%	6.8%
	<b>Total</b>	<b>36.3%</b>	<b>63.7%</b>	<b>100%</b>
p-value		< 0.001		
<b>How many MLS games did you watch on television in the 2010 season?</b>	<i>None</i>	4.9%	47.1%	52.0%
	<i>1 - 2</i>	15.4%	14.5%	29.8%
	<i>3 +</i>	16.0%	2.2%	18.2%
	<b>Total</b>	<b>36.3%</b>	<b>63.7%</b>	<b>100%</b>
p-value		< 0.001		

As it should be expected, the comparisons of MLS fandom and how many games watched or attended during the 2010 MLS season both turned out to be significant, with each having a p-value of < 0.001. Those who were not fans of the MLS mostly did not attend or watch any MLS games, an overwhelming 88.9% for attending and 73.9% for watching. The reverse is true for those who were MLS fans, as they were more likely to watch and attend MLS games. 52.5% of MLS fan respondents attended at least one game, whereas 86.4% of MLS fan respondents watched at least one game on television. While the percentages of those who

considered themselves MLS fans are not overwhelming for attending or watching games, it is pretty clear that if a person is not a fan of the MLS, then the chances of that person attending or watching a game are pretty low.

The final grouping of Chi-Square analysis involves questions fifteen, eighteen, and twenty-three. The three questions ask the following: question fifteen asks if World Cup appearances of country's men's national team lead the respondent to believe that the country's primary soccer league is elite; question eighteen asks if the respondent believes the U.S. men's team talent level reflects the talent level of the MLS; and question twenty-three asks if the respondent is a fan of the MLS. Neither questions fifteen nor eighteen were significant when analyzed with question twenty-three, yielding p-values of 0.277 for fifteen and 0.229 for eighteen. Now when analyzing fifteen and eighteen with one another, they have a significant relationship, with a p-value of 0.002 (see Table 5).

**Table 5 – U.S. and MLS talent reflection x World Cup appearances influence**

		<b>Do you believe the U.S. men's team talent level reflects the talent level of the MLS?</b>			<b>Total</b>
		<i>Yes</i>	<i>No</i>	<i>Depends on % of MLS players on U.S. team</i>	
<b>Do World Cup appearances by a country's men's national team lead you to believe that the country's primary soccer league is elite?</b>	<i>Yes, league is elite</i>	15.0%	7.2%	10.8%	33.0%
	<i>No, but is positively influenced</i>	15.3%	14.1%	18.9%	48.3%
	<i>No, appearances have no impact but success from appearances does</i>	3.0%	3.9%	5.1%	12.0%
	<i>No impact at all</i>	1.2%	4.2%	1.2%	6.6%
	<b>Total</b>	<b>34.5%</b>	<b>29.4%</b>	<b>36.0%</b>	<b>100%</b>
<b>p-value</b>		<b>0.002</b>			

The data indicate that if the respondent thought a World Cup appearance by a country's national team would influence the prestige of the primary soccer league, then the respondent also believed that either the U.S. men's team talent level directly related to the talent level of the MLS, or at least was dependent on the number of MLS players on the U.S. team. Only those respondents who said World Cup appearances had no impact over the status of the league, overwhelmingly selected that there was no relationship between the U.S. men's team talent and the MLS's talent levels.

#### *MLS attendance data*

While the survey data seem to paint one picture of the World Cup helping to increase an interest in soccer and interest in MLS games that year, the MLS attendance data appears to paint an entirely different picture. When examining the MLS attendance data it appears that the World Cup appearance by the U.S. men's team has no affect on attendance, as the non-World Cup seasons' attendance patterns do not appear to be different than the World Cup seasons' attendance patterns (see Appendix C). To clarify when the 2006 and 2010 World Cup's took place, the 2006 World Cup started June 9<sup>th</sup> and ended July 9<sup>th</sup>, with the 2010 World Cup starting on June 11<sup>th</sup> and ending on July 11<sup>th</sup>. This means that the 2006 World Cup coincided with week's eleven through fifteen of the MLS season, and the 2010 World Cup coincided with the very end of week twelve till the very beginning of week seventeen. During those weeks, and the weeks following the World Cup, the data show no patterns of an increase in attendance that is not outside of the normal variation seen elsewhere in the year or previous year.

## CHAPTER FIVE

### DISCUSSION

The data revealed interesting results. As with the three main sections that were discussed in the results sections, those sections will be the main feature of this discussion section. As each section is discussed, potential marketing suggestions are given as potential ideas that Major League Soccer should consider for marketing its product.

The three key areas of interest helped provide an answer for how World Cup appearances by the U.S. men's team impact on attendance at MLS games by college students. When comparing peaked interest in soccer because of the World Cup and how many MLS games were attended or watched, a relationship was found. This means that at the very least there is a spread of enthusiasm for soccer within individuals who watched the U.S. Within the U.S., this often means either attending or watching MLS games, as there aren't too many professional soccer options in the U.S., and the MLS is the biggest fish in the small pond of U.S. soccer.

While conclusive evidence of a World Cup appearance influencing the number of MLS games attended or watched cannot be determined, due to the fact that the U.S. men's national team has made several World Cups in a row, with their most recent appearance being in 2010, its possible some are influenced solely by the U.S. men's team making the World Cup. 9.3% only had an increased interest in soccer during the U.S.'s World Cup run, highlighting that some are affected simply by the U.S. being there, and therefore if the U.S. is not in the World Cup that those people might not have a peaked interest. Some people might have their interest peaked because of the U.S. and it stays peaked till the end of the World Cup, a thought that cannot be

disregarded. If this held true then 43.9% of participants would be impacted by a U.S. appearance in the World Cup. Since the attendance data shows no real difference in attendance between World Cup and non-World Cup years, even with the increase of college student attendance at MLS games. It appears that based on the national attendance records that the survey results stand alone in showing an increased interest in soccer during and following World Cup.

It is also interesting to see how MLS fans responded. While it is no surprise to see them attend and view more MLS games than non MLS fans, it is a little surprising to how MLS fans answered to World Cup games increasing their interest in other soccer games. The majority of them, 65.8%, said that their interest was increased, while only 14.5% said that it didn't increase their interest because they were already avid soccer fans. This is interesting because it shows, based strictly on the survey results, that perhaps MLS fans are only casual soccer fans, rather than die-hard soccer fans who try to watch either as many MLS games as possible or even other international leagues' games. The results show that there is the occasional die-hard MLS fan but is mostly filled with the casual fan who attends a few games a year and watches several on television but does not purchase season tickets and attend every single game.

As mentioned in the results section, it is interesting that the respondents who thought World Cup appearances made a country's primary soccer elite, or at least had a positive influence on the leagues perception, also seemed to believe that the U.S. men's teams' talent level reflected the talent level of the MLS. This is of interest in the greater scheme of things for the MLS because it means if the U.S. team can ever truly achieve the ultimate success of winning the World Cup, then Major League Soccer's prestige level should increase heavily. With this increase in prestige, there should come an increase in attendance and participation at



MLS games. Waiting for the U.S. to have success in the World Cup, however is not a viable option to sustain a successful and ever growing league.

Rather the MLS should take a proactive approach in utilizing the “World Cup soccer fever,” found within the survey results, that comes along every four years and use it to help create long lasting relationships with people. Forming new long-term fans during each World Cup is a goal the MLS should seek. Clearly, based on the survey results, there are people who have an increased interest in soccer during and following the World Cup. The MLS needs to take advantage of this.

### *Limitations*

Through this study, several interesting results were obtained. There are, however, some limitations. The survey has a very limited representativeness, as it only reached six universities, and brought in only 353 participants. This means that the results and discussion might only apply to the participants and cannot be generalized beyond the sample to encompass each university nor the surrounding areas of each MLS team. It shows the feelings of the participants but not the attitudes and feelings of each MLS teams’ city. Furthermore, the survey intentionally picked universities that were near MLS teams, utilizing only one university not necessarily in a relatively close proximity to an MLS team. Another limitation is that the survey took place a semester after the end of the MLS season, instead of the semester in which the 2010 MLS season ended in. Thus some potential participants might not have been interested in taking the survey, and for current participants might not have had as fresh a memory and thoughts on the past season and World Cup. With these limitations, and the lack of some other data such as television viewer ratings, it is hard to determine the exact impact of the U.S. men’s national team on college student attendance at MLS games. The limited number of participants drastically

reduced the statistical power to draw very many conclusions from the data, often forcing data combination in order to get valid statistical results.

The a lack of a strong statistical background by the researcher perhaps leaves out some other statistical methods that might be better suited for analyzing the data than just a simple Chi-Square analysis, such a likelihood based tests. Additionally, only the previous two World Cup MLS seasons and the seasons directly before them, 2005, 2006, 2009, and 2010, were used. This leaves out of the analysis lots of useful data from previous World Cup years and non-World Cup years out of the equation. Lastly, the survey only targeted college students, which does not allow for the results to be generalized to the overall U.S. population.

## CHAPTER SIX

### CONCLUSION

Overall, this study's survey results conflict with attendance data from the 2005, 2006, 2009, and 2010 MLS seasons, meaning that the views and actions of the survey participants differ from those of the general public. College students had their MLS attendance patterns more heavily affected by World Cups than the general public did. The data suggest that during, and within the next month or two after, the World Cup, attendance should increase. But no increase is shown in the attendance data. Survey results indicate that the collegiate population's interest in soccer increases because of the World Cup, and especially if the U.S. team participates in it.

It remains somewhat unclear from the data whether or not the primary attendance booster of college students is the World Cup itself or the U.S. men's team making a World Cup appearance. Based on how many people felt their peaked interest lasted beyond the U.S.'s World Cup run, it appears that perhaps the World Cup has more influence than the national team. While U.S. men's team World Cup appearances might not impact overall attendance of MLS games, they appear to influence the perception of the MLS, as the majority of the respondents felt that World Cup appearances did positively influence the country's primary soccer league. This finding reiterates findings from the literature review, with attention being paid to women's soccer, that international success can influence league perception and attendance.

Furthermore, the data reveal those with a peaked interest in soccer are more likely to watch and attend more MLS games than those whose interest in soccer was not increased. Also, there were indications of regional differences and gender differences found within the data

results, but thesis differences need a bigger sampling pool before making any conclusions can be reached.

#### *Future research*

Future research should continue work on the impact of appearances by the national team on the country's primary soccer league's participation rates. Such research should include a larger sample size, both in number of participants and scope to include more universities. Also, the projects can expand into non-collegiate settings to try to obtain a clearer image of society as a whole that can be generalized beyond the collegiate ranks. Data from more World Cup years and non-World Cup years should also be analyzed, as more years to study can increase statistical power to detect significant jumps in attendance or viewer ratings. Additionally, working with Major League Soccer employees, as well as the United States Soccer Federation, might allow the researcher to access valuable information and detailed information from the league itself and from its federation. These studies should not just be limited to the U.S. and the MLS, as this phenomenon could exist elsewhere in the world, as soccer is after all the world's game.

## REFERENCES

- Bauer, H. H., Sauer, N. E., & Exler, S. (2005). The loyalty of German soccer fans: Does a team's brand image matter? *International Journal of Sports Marketing & Sponsorship*, 7(1), 14-22.
- Beccarini, C., & Ferrand, A. (2006). Factors affecting soccer club season ticket holders' satisfaction: The influence of club image and fans' motives. *European Sport Management Quarterly*, 6(1), 1-22. Routledge, Taylor & Francis Group.
- Brown, S. (2007). Fleet feet: The USSF and the peculiarities of soccer fandom in America. *Soccer and Society*, 8(2-3), 366-380. doi:10.1080/14660970701224640
- Brown, S. F. (2005). Can European football spur interest in American soccer? A look at the champions world™ series and major league soccer. *Soccer & Society*, 6(1), 49-61. doi:10.1080/146609705200037007
- Cobb, C. (2007). Coming to America: Exploring the PR implications of David Beckham's presence on major league soccer. *Public Relations Tactics*, 14(3), 9-9.
- Collins, S. (2006). National sports and other myths: The failure of US soccer. *Soccer and Society*, 7(2-3), 353-363. doi:10.1080/14660970600615443
- DeSchrive, T. D. (2007). Much adieu about Freddy: Freddy Adu and attendance in major league soccer. *Journal of Sport Management*, 21(3), 438-451.
- Garland, R., Macpherson, T., & Haughey, K. (2004). Rugby fan attraction factors. *Marketing Bulletin*, 15(3).

- Grayson, M. (2010, August 26). *Marquee players boost mls attendances; Houston dynamo stadium progress*. Retrieved from <http://www.worldfootballinsider.com/Story.aspx?id=33661>
- Hay, R., & Joel, T. (2007). Football's world cup and its fans – reflections on national styles: A photo essay on Germany 2006. *Soccer & Society*, 8(1), 1-32.
- Jensen, R., Weston, S., & Wang, Y. (2008). How do fans react when sports teams are named after corporations? *Sport Journal*, 11(1)
- Jewell, R. T., & Molina, D. J. (2005). An evaluation of the relationship between Hispanics and major league soccer. *Journal of Sports Economics*, 6(2), 160-177.
- Laverie, D. A., & Arnett, D. B. (2000). Factors affecting fan attendance: The influence of identity salience and satisfaction. *Journal of Leisure Research*, 32(2), 225-246.
- Markovits, A. S. & Hellerman, S. L. (2001). *Offside: Soccer and American exceptionalism*. Princeton, NJ: Princeton University Press.
- Markovits, A. S. & Hellerman, S. L. (2003). The “olympianization” of soccer in the United States. *American Behavioral Scientist*, 46(11), 1533-1549.  
doi:10.1177/0002764203046011006
- Nauright, J. (2004). Global games: Culture, political economy and sport in the globalised world of the 21st century. *Third World Quarterly*, 25(7), 1325-1336.  
doi:10.1080/014365904200281302
- Rascher, D. A., Baehr, M. J., Wolfe, J., & Frohwerk, S. (2006). An analysis of expansion and relocation sties for major league soccer. *International Journal of Sport Management*, 7(1)

- Shackelford, D. E., & Greenwell, T. C. (2005). Predicting women's division I sports attendance: An analysis of institutional characteristics. *Sport Marketing Quarterly*, 14, 139-147. West Virginia University.
- Smith, T. W., & Jarkko, L. (1998). National pride: A cross-national analysis. *GSS Cross-national Report*, (19).
- Szymanski, S., & Zimbalist, A. (2005). *National pastime: How Americans play baseball and the rest of the world plays soccer*. Washington DC: The Brookings Institution.
- Welki, A. M., & Zlatoper, T. J. (1991). US professional football: The demand for game-day attendance in 1991. *Managerial and Decision Economics*, 15(5), 489-495. John Wiley & Sons.
- Wilson, W. (2007). All together now, click: MLS soccer fans in cyberspace. *Soccer and Society*, 8(2-3), 381-398. doi:10.1080/14660970701224657

**Appendix A**  
**MLS Survey Questions**  
*Consent Form*

**Informational Letter for Online Instrument**

I am a graduate student under the direction of professor Billy Hawkins in the Department of Kinesiology at The University of Georgia. I invite you to participate in a research study entitled "Effects of World Cup appearances on the popularity of professional soccer in the United States." The purpose of this study is to determine the effects of World Cup appearances on the popularity of Major League Soccer in the United States, with a specific focus on college student participation with Major League Soccer events.

All participants must be 18 years of age or older in order to participate in this study.

Your participation will involve taking a twenty-five question online survey and should only take about 15 MINUTES. Your involvement in the study is voluntary, and you may choose not to participate or to stop at any time without penalty or loss of benefits to which you are otherwise entitled. Your responses are CONFIDENTIAL and will not be labeled with any personally identifiable information. Internet communications are insecure and there is a limit to the confidentiality that can be guaranteed due to the technology itself. However, once the research team receives the materials, standard confidentiality procedures will be employed. Our research team will store the data on a secure, password-protected server that only our research team can access. The results of the research study may be published, but your name will not be used. In fact, the published results will be presented in summary form only. Your identity will not be associated with your responses in any published format.

The findings from this project may provide information for Major League Soccer to enhance their marketing efforts during World Cup years with the college student population. THERE ARE NO BENEFITS THAT WILL ACCRUE INDIVIDUALLY TO EACH PARTICIPANT BEYOND THIS SOCIETAL BENEFIT. There are no known risks or discomforts associated with this research.

If you have any questions about this research project, please feel free to contact me through e-mail at [hertz12@uga.edu](mailto:hertz12@uga.edu). You can also contact Dr. Hawkins at [bhawk@uga.edu](mailto:bhawk@uga.edu). Questions or concerns about your rights as a research participant should be directed to The Chairperson, University of Georgia Institutional Review Board, 612 Boyd GSRC, Athens, Georgia 30602-7411; telephone (706) 542-3199; email address [irb@uga.edu](mailto:irb@uga.edu).

By completing the following survey, you are agreeing to participate in the above described research project.

Thank you for your consideration! Please keep this letter for your records.



Sincerely,

Carl Hertzberg

1. Do you understand the information provided and agree to participate in this study?
  - a. Yes, I willingly agree to participate in this study and understand the information provided
  - b. No, I do not wish to participate in this study

*Demographic Questions*

2. Sex:
  - a. Male
  - b. Female
3. Age:
  - a. Under 18
  - b. 18 – 21
  - c. 22 – 25
  - d. 26 or over
4. Race/Ethnicity:
  - a. Caucasian
  - b. African-American
  - c. Hispanic/Latin American
  - d. Asian
  - e. Other \_\_\_\_\_
  - f. Prefer not to answer
5. What university do you attend?
  - a. George Washington University
  - b. Ohio State University
  - c. Southern Methodist University
  - d. University of Georgia
  - e. University of Houston
  - f. University of Southern California
  - g. University of Utah
  - h. University of Washington

*General Questions*

6. Would you consider yourself a sports fan?
  - a. Yes
  - b. No
7. How would you rank the Major League Soccer in the professional sports culture of the United States?
  - a. In the top 4 sports
  - b. Not in the top 4 sports
8. Have you ever participated in an organized sport?
  - a. Yes
  - b. No
9. If yes, what sport did you play?
  - a. Football
  - b. Basketball

- c. Baseball/Softball
- d. Volleyball
- e. Soccer
- f. Track and Field
- g. Other (Please list) \_\_\_\_\_

*World Cup Questions*

10. Have you attended or watched a men's World Cup soccer game?
  - a. Yes
  - b. No
11. How many of the 2010 World Cup soccer games did you watch?
  - a. None
  - b. 1-2
  - c. 3-4
  - d. 5-6
  - e. 7+
12. How many U.S. men's games did you watch?
  - a. None
  - b. One
  - c. Two
  - d. Three
  - e. All four
13. How do you factor in a World Cup appearance in judging the success of the U.S. men's team?
  - a. Making the World Cup means the team is a complete success
  - b. Making the World Cup is a requirement for the team to not be considered a failure
  - c. I will reserve judgment till their World Cup run is over
14. In your opinion, where does the U.S. Men's national team rank compared to other national teams?
  - a. Top 5
  - b. Top 10
  - c. Top 32 (number of teams to make the World Cup)
  - d. Top 50
  - e. Top 100
  - f. Not in the top 100

*MLS Questions*

15. Do World Cup appearances of a country's men's national team lead you to believe that the country's primary soccer league is elite?
  - a. Yes, they do make the country's primary soccer league elite.
  - b. No, but World Cup appearances do positively influence the primary soccer leagues' status, just not to the elite level.
  - c. No, World Cup appearances have no impact, but how successful those appearances turn out to be can be influential
  - d. No, World Cup appearances have no impact or influence over the country's primary soccer leagues' perception.
16. Does watching World Cup games increase your interest in watching other soccer games?
  - a. Yes

- b. No, it has no influence because I was not and am not a fan of soccer
  - c. No, it has no influence because I am already an avid soccer fan
  - d. It depends on the league, e.g. Champions League vs. the NASL
17. How long does this peaked interest last?
- a. Only until the U.S. completes its World Cup run
  - b. Only until the end of the World Cup
  - c. A few weeks after the World Cup
  - d. A few months after
  - e. Till the end of the year
18. Do you believe the U.S. men's team talent level reflects the talent level of the MLS?
- a. Yes
  - b. No
  - c. It depends on how many players are from the MLS, with more players from the MLS on the team meaning there is a stronger relationship between the two talent levels
19. How do you rank the MLS compared to other soccer leagues?
- a. Top tier league
  - b. Middle tier league
  - c. Bottom tier league
20. Which soccer league do you view as being the best league?
- a. \_\_\_\_\_
21. Why do you believe that (answer to #20) is the best league?
- a. \_\_\_\_\_
22. How do you view the talent level of the MLS?
- a. Elite
  - b. Pretty good
  - c. Decent
  - d. Sub par
  - e. Terrible
23. Are you a fan of the MLS?
- a. Yes
  - b. No
24. What factors influence your decision to attend MLS games? (Select top 3 factors)
- a. MLS fan
  - b. I enjoy the game of soccer
  - c. Was given the ticket
  - d. Family/Friends were going
  - e. Ticket Price/Affordability
  - f. Peaked interest from watching World Cup games
  - g. Close proximity to stadium
  - h. Nothing better to do
  - i. Curious about MLS games
  - j. Following a favorite player from the U.S. men's national team
  - k. I do not attend MLS games
  - l. Other (please list) \_\_\_\_\_
25. How many MLS games did you attend in the 2010 season?
- a. None

- b. 1 - 2
- c. 3 - 5
- d. 6 - 9
- e. 10+

26. How many MLS games did you watch on television in the 2010 season?

- a. None
- b. 1 - 2
- c. 3 - 5
- d. 6 - 9
- e. 10+

## Appendix B

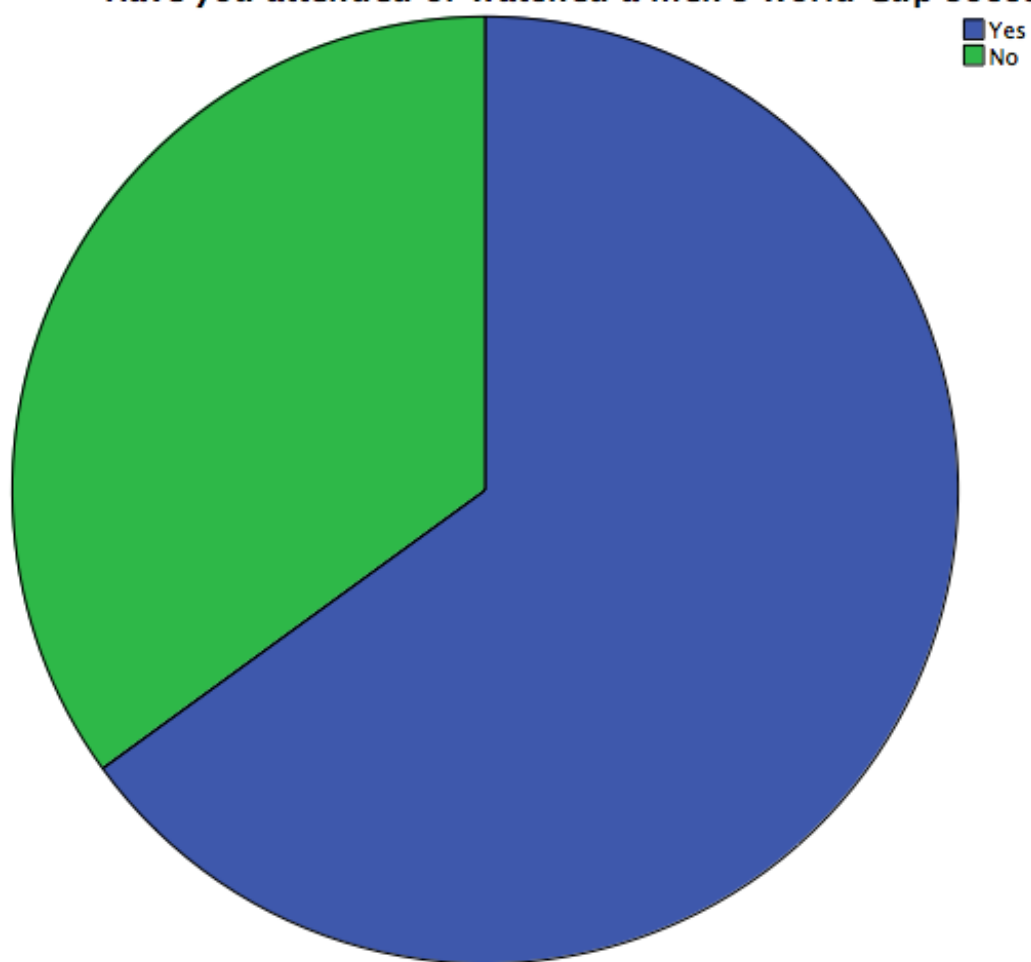
### Results

Question 10: Have you ever attended or watched a men's World Cup soccer game? - Descriptive Statistics and Pie Chart

Have you ever attended or watched a men's World Cup soccer game?

	Observed N	Percent	Expected N	Residual
Yes	221	65.0	170.0	51.0
No	119	35.0	170.0	-51.0
Total	340			

**Have you attended or watched a men's World Cup soccer game?**

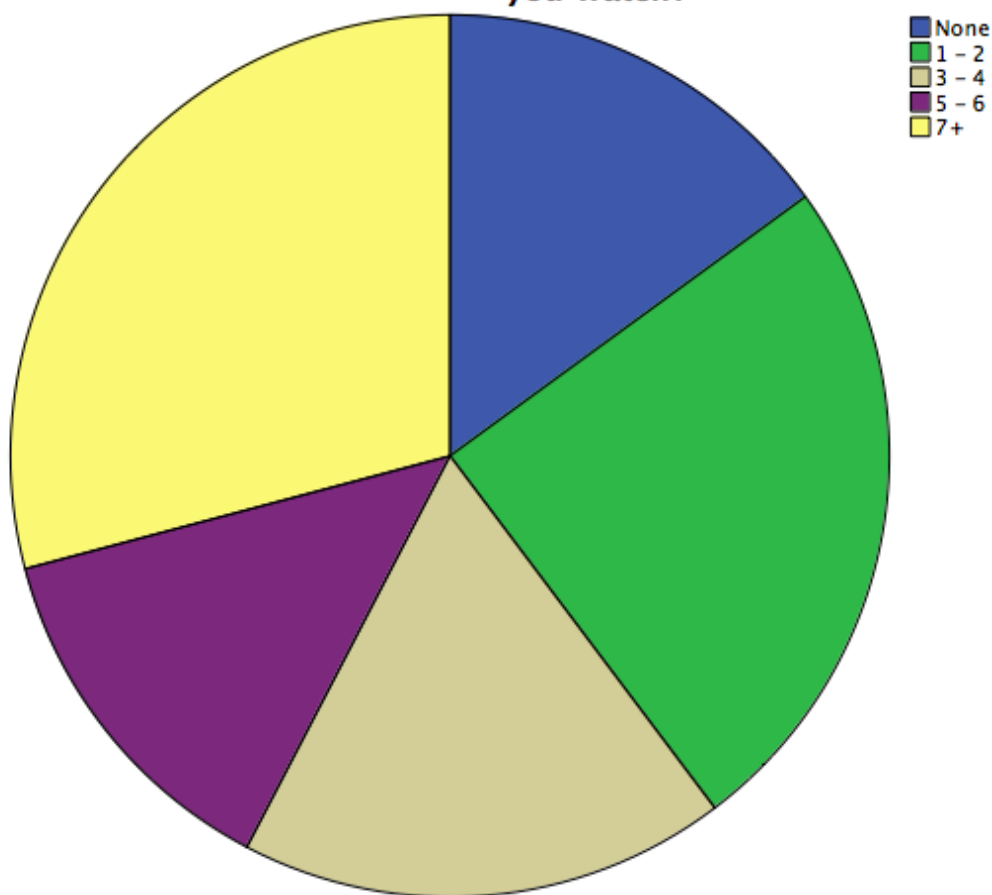


Question 11: Approximately how many of the men's 2010 World Cup soccer games did you watch? - Descriptive Statistics and Pie Chart

Approximately how many of the men's 2010 World Cup soccer games did you watch?

	Observed N	Percent	Expected N	Residual
None	51	15.0	68.0	-17.0
1 – 2	84	24.7	68.0	16.0
3 – 4	61	17.9	68.0	-7.0
5 – 6	45	13.2	68.0	-23.0
7 +	99	29.1	68.0	31.0
Total	340			

**Approximately how many of the men's 2010 World Cup soccer games did you watch?**

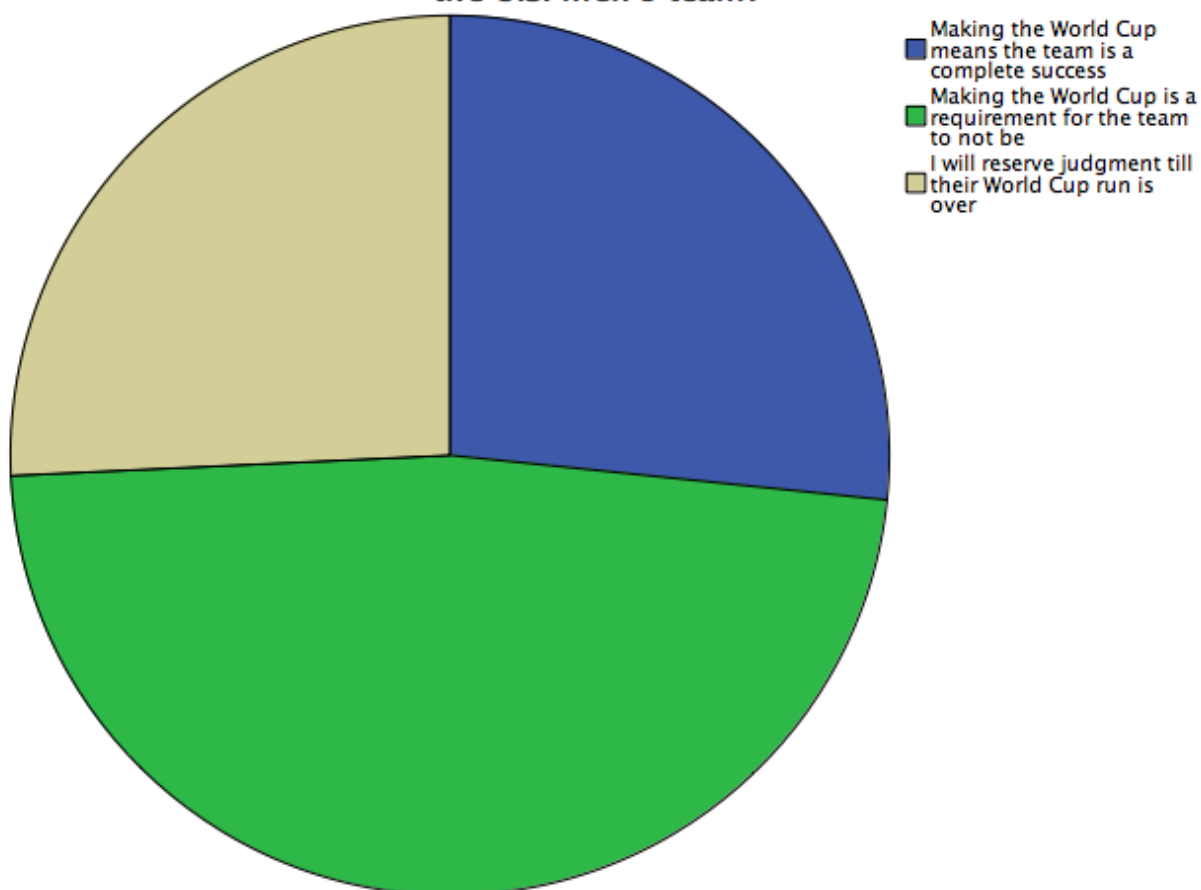


Question 13: How do you factor in a World Cup appearance in judging the success of the U.S. men's team? - Descriptive Statistics and Pie Chart

How do you factor in a World Cup appearance in judging the success of the U.S. men's team?

	Observed N	Percent	Expected N	Residual
Making the World Cup means the team is a complete success	90	26.6	112.7	-22.7
Making the World Cup is a requirement for the team to not be a failure	161	47.6	112.7	48.3
I will reserve judgment till their World Cup run is over	87	25.7	112.7	-25.7
Total	338			

**How do you factor in a World Cup appearance in judging the success of the U.S. men's team?**

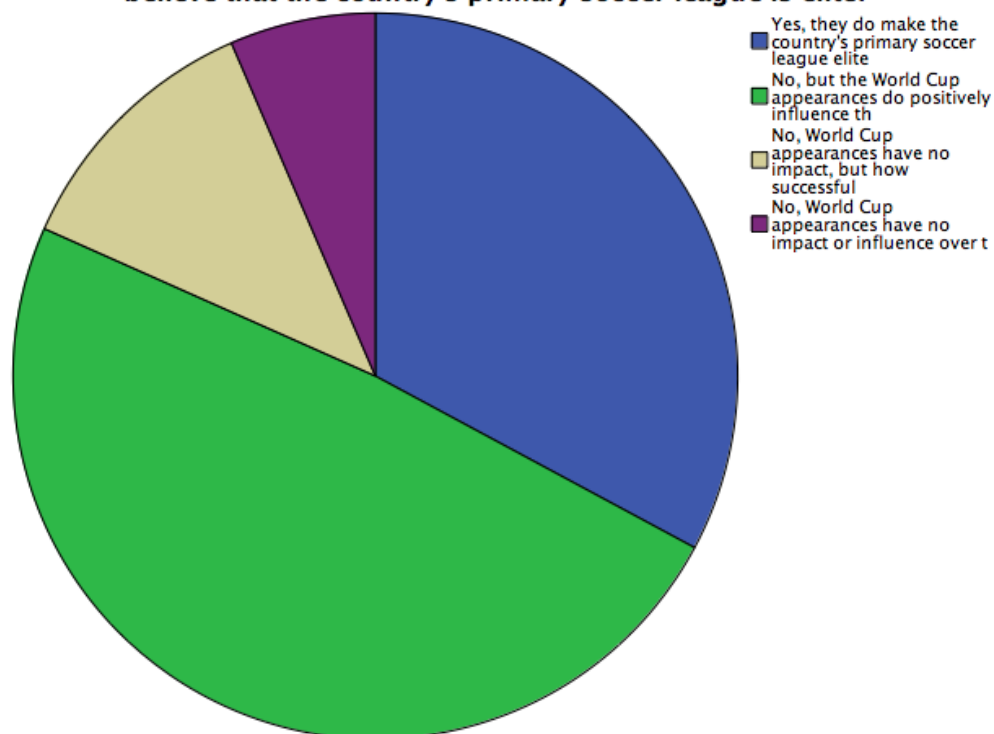


Question 15: Do World Cup appearances of a country's men's national team lead you to believe that the country's primary soccer league is elite? - Descriptive Statistics and Pie Chart

Do World Cup appearances of a country's men's national team lead you to believe that the country's primary soccer league is elite?

	Observed N	Percent	Expected N	Residual
Yes, the do make the country's primary soccer league elite	111	32.8	84.5	26.5
No, but World Cup appearances do positively influence the primary soccer leagues' status, just not to the elite level	165	48.8	84.5	80.5
No, World Cup appearances have no impact, but how successful those appearances turn out to be can be influential	40	11.8	84.5	-44.5
No, World Cup appearances have no impact or influence over the country's primary soccer leagues' perception	22	6.5	84.5	-62.5
Total	338			

**Do World Cup appearances of a country's men's national team lead you to believe that the country's primary soccer league is elite?**



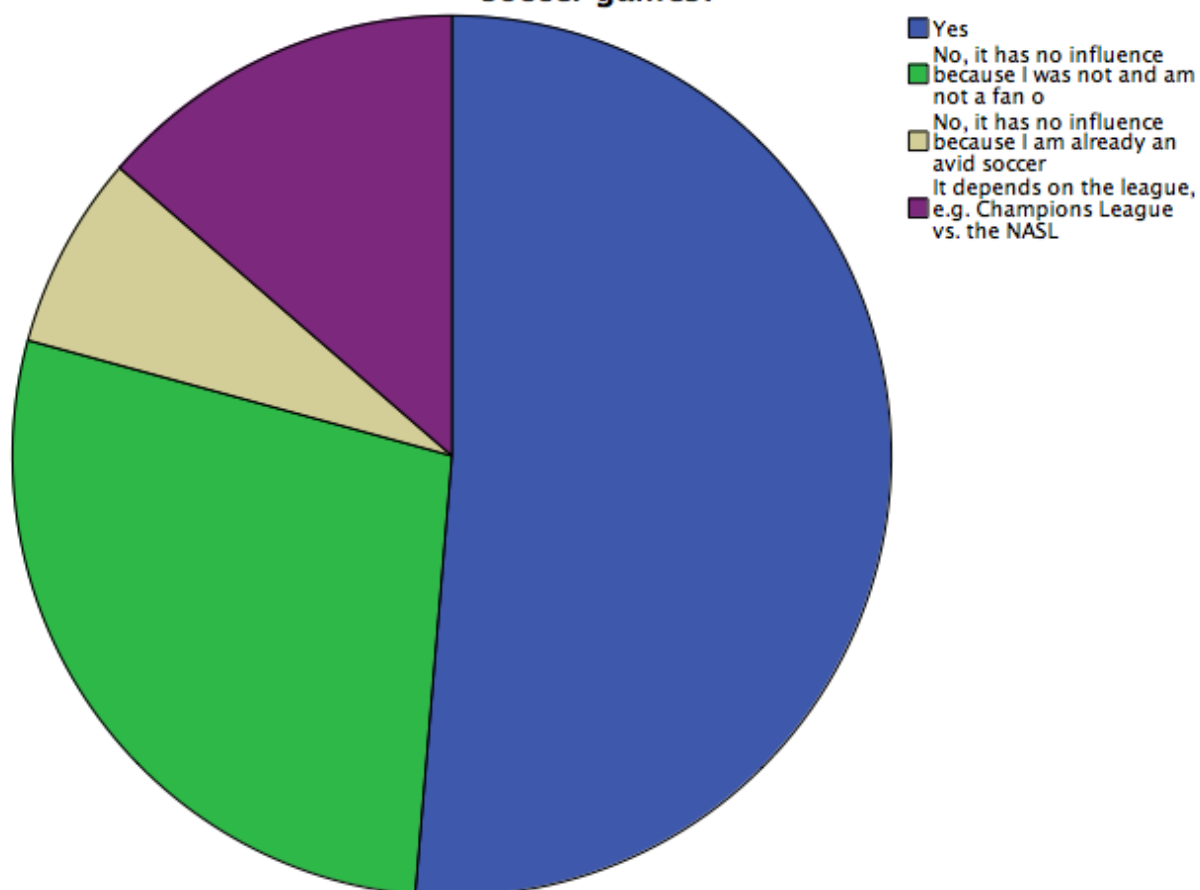


Question 16: Does watching World Cup games increase your interest in watching other soccer games? - Descriptive Statistics and Pie Chart

Does watching World Cup games increase your interest in watching other soccer games?

	Observed N	Percent	Expected N	Residual
Yes	173	51.3	84.3	88.8
No, it has no influence because I was not and am not a fan of soccer	94	27.9	84.3	9.8
No, it has no influence because I am already an avid soccer fan	24	7.1	84.3	-60.3
It depends on the league, e.g. Champions League vs. the NASL	46	13.6	84.3	-38.3
Total	337			

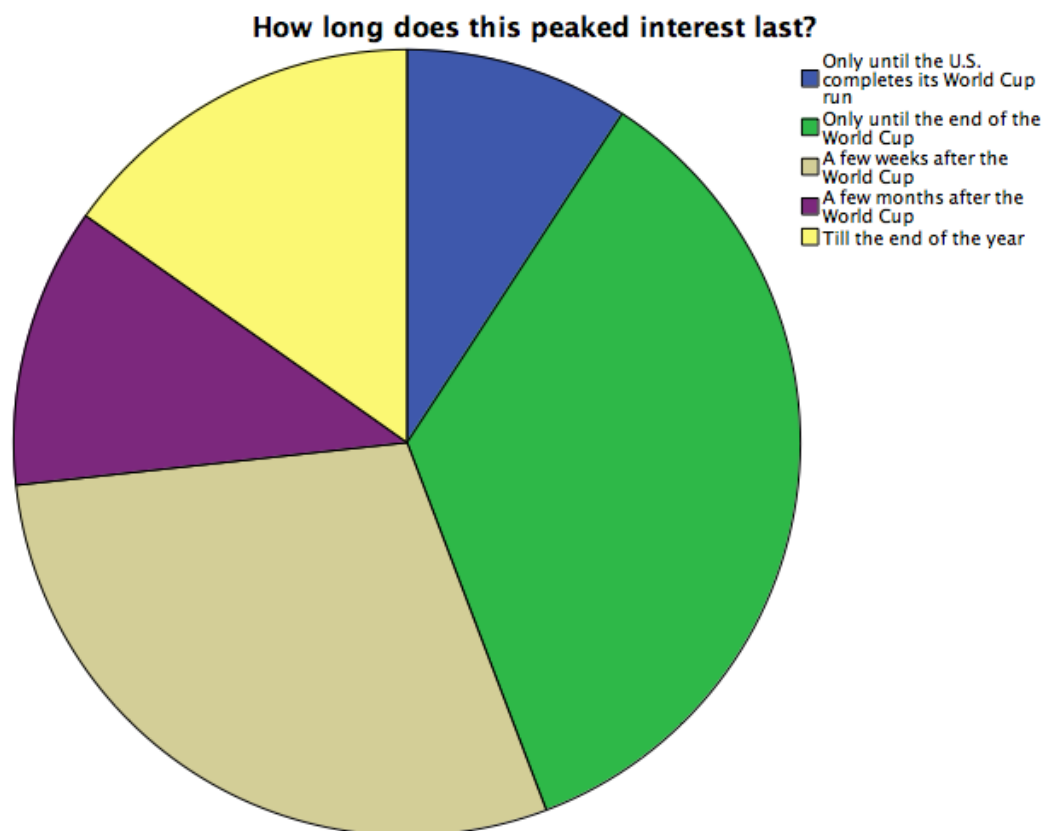
**Does watching World Cup games increase your interest in watching other soccer games?**



## Question 17: How long does this peaked interest last? - Descriptive Statistics and Pie Chart

How long does this peaked interest last?

	Observed N	Percent	Expected N	Residual
Only until the U.S. completes its World Cup run	20	9.2	43.4	-23/4
Only until the end of the World Cup	76	35.0	43.4	32.6
A few weeks after the World Cup	63	29.0	43.4	19.6
A few months after the World Cup	25	11.5	43.4	-18.4
Till the end of the year	33	15.2	43.4	-10.4
Total	217			



Question 18: Do you believe the U.S. men's team talent level reflects the talent level of the MLS? - Descriptive Statistics

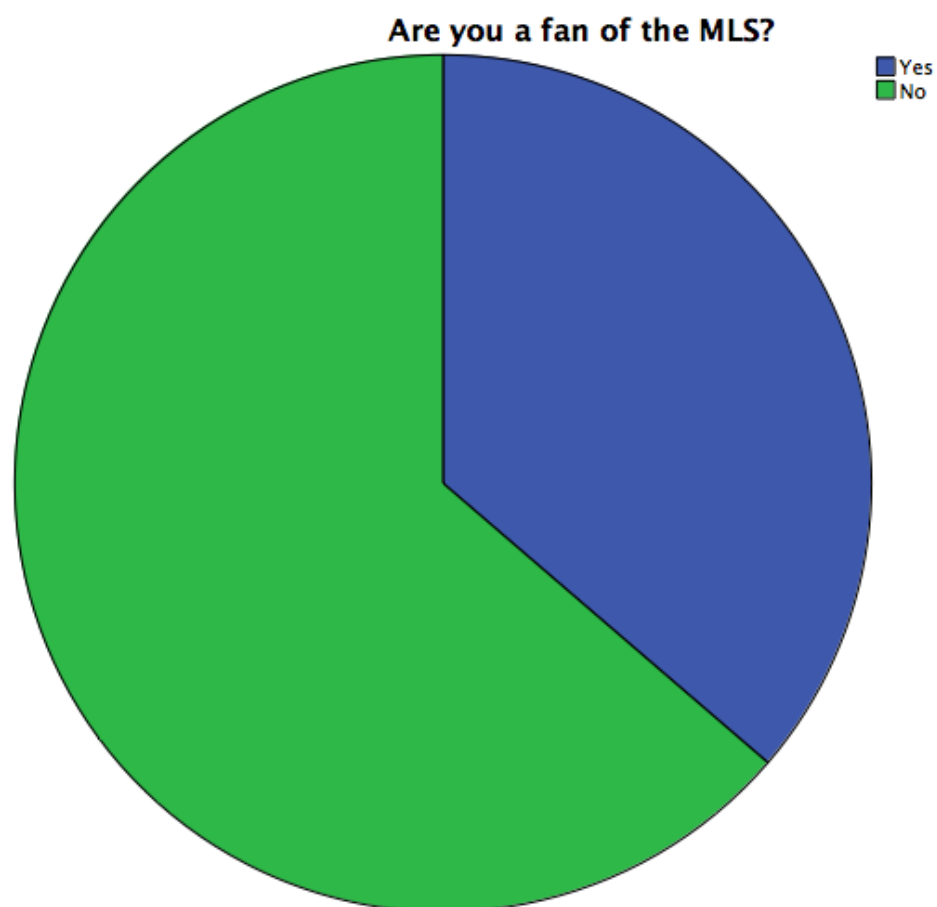
Do you believe the U.S. men's team talent level reflects the talent level of the MLS?

	Observed N	Percent	Expected N	Residual
Yes	115	34.5	111.0	4.0
No	98	29.4	111.0	-13.0
It depends on how many players are from the MLS with more players from the MLS on the team meaning there is a stronger relationship between the two talent levels	120	36.0	111.0	9.0
Total	333			

## Question 23: Are you a fan of the MLS? - Descriptive Statistics and Pie Chart

Are you a fan of the MLS?

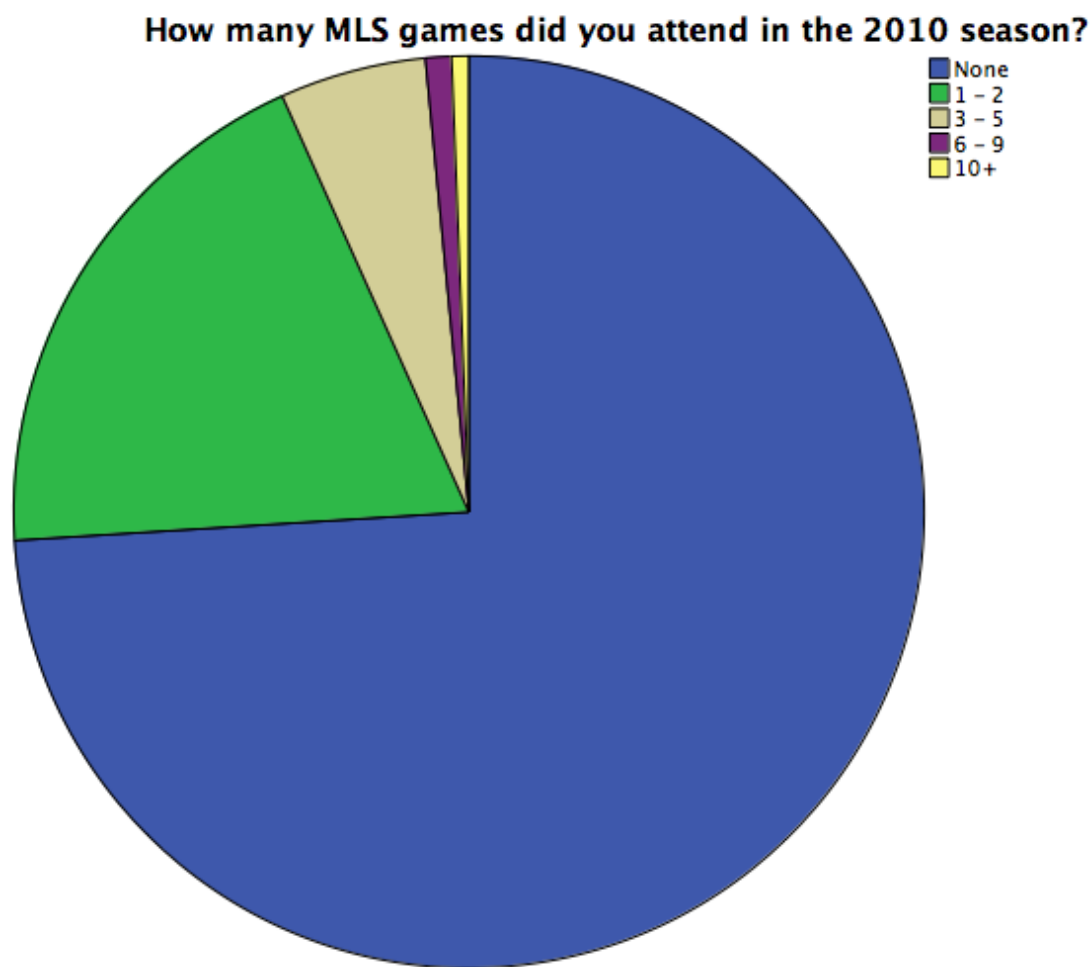
	Observed N	Percent	Expected N	Residual
Yes	118	36.3	162.5	-44.5
No	207	63.7	162.5	44.5
Total	327			



Question 25: How many MLS games did you attend in the 2010 season? - Descriptive Statistics and Pie Chart

How many MLS games did you attend in the 2010 season?

	Observed N	Percent	Expected N	Residual
None	242	74.0	65.4	176.6
1 – 2	63	19.3	65.4	-2.4
3 – 5	17	5.2	65.4	-48.4
6 – 9	3	.9	65.4	-62.4
10 +	2	.6	65.4	-63.4
Total	327			



Question 26: How many MLS games did you watch on television in the 2010 season? -  
Descriptive Statistics and Pie Chart

How many MLS games did you watch on television in the 2010 season?

	Observed N	Percent	Expected N	Residual
None	171	52.3	65.4	105.6
1 – 2	97	29.7	65.4	31.6
3 – 5	32	9.8	65.4	-33.4
6 – 9	14	4.3	65.4	-52.4
10 +	13	4.0	65.4	-52.4
Total	327			

**How many MLS games did you watch on television in the 2010 season?**

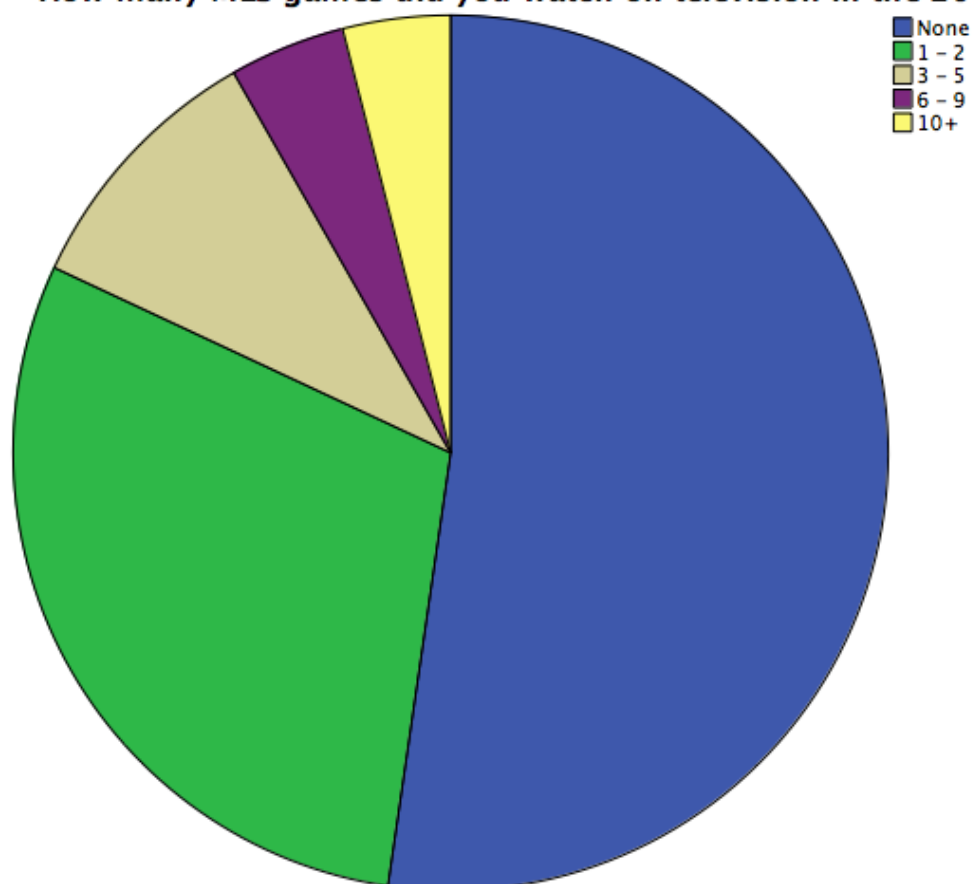


Table 2: raw statistics

**Table 2 – Increased interest x MLS games attended or watched**

		<b>Does watching World Cup games increase your interest in watching other soccer games?</b>				<b>Total</b>
		<i>Yes</i>	<i>No, not a fan</i>	<i>No, already of an avid soccer fan</i>	<i>Depends on the league</i>	
<b>How many MLS games did you attend in the 2010 season?</b>	<i>None</i>	118	84	9	30	241
	<i>1 – 2</i>	37	5	9	12	63
	<i>3 +</i>	13	0	5	4	22
	<b>Total</b>	168	89	23	46	326
	<b>p-value</b>	< 0.001				
<b>How many MLS games did you watch on television in the 2010 season?</b>	<i>None</i>	73	79	2	16	170
	<i>1 – 2</i>	58	10	9	20	97
	<i>3 +</i>	37	0	12	10	59
	<b>Total</b>	168	89	23	46	326
	<b>p-value</b>	< 0.001				

Table 2: chi-square results

**Does watching World Cup games increase your interest in watching other soccer games? \***  
**How many MLS games did you attend in the 2010 season?**

**Chi-Square Tests**

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	38.796 <sup>a</sup>	6	.000
Likelihood Ratio	44.491	6	.000
Linear-by-Linear Association	1.374	1	.241
N of Valid Cases	326		

a. 3 cells (25.0%) have expected count less than 5. The minimum expected count is 1.55.

**Does watching World Cup games increase your interest in watching other soccer games? \***  
**How many MLS games did you watch on television in the 2010 season?**

**Chi-Square Tests**

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	84.071 <sup>a</sup>	6	.000
Likelihood Ratio	98.760	6	.000
Linear-by-Linear Association	1.181	1	.277
N of Valid Cases	326		

a. 1 cells (8.3%) have expected count less than 5. The minimum expected count is 4.16.



Table 3: raw statistics

**Table 3 – Length of peaked interest x MLS games attended or watched**

		<b>How long does this peaked interest last?</b>			<b>Total</b>
		<i>Only until the end of the World Cup</i>	<i>A few weeks after the World Cup</i>	<i>A few months after the World Cup</i>	
<b>How many MLS games did you attend in the 2010 season?</b>	<i>None</i>	76	39	33	148
	<i>1 – 2</i>	16	19	14	49
	<i>3 +</i>	2	4	9	17
	<b>Total</b>	94	62	58	214
p-value		0.001			
<b>How many MLS games did you watch on television in the 2010 season?</b>	<i>None</i>	53	26	10	89
	<i>1 – 2</i>	28	21	29	78
	<i>3 +</i>	13	15	19	29
	<b>Total</b>	94	62	58	214
p-value		< 0.001			

Table 3: chi-square results

**How long does this peaked interest last? \* How many MLS games did you attend in the 2010 season?**

**Chi-Square Tests**

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	19.598 <sup>a</sup>	4	.001
Likelihood Ratio	18.740	4	.001
Linear-by-Linear Association	15.449	1	.000
N of Valid Cases	214		

a. 2 cells (22.2%) have expected count less than 5. The minimum expected count is 4.61.

**How long does this peaked interest last? \* How many MLS games did you watch on television in the 2010 season?**

**Chi-Square Tests**

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	23.445 <sup>a</sup>	4	.000
Likelihood Ratio	25.104	4	.000
Linear-by-Linear Association	20.089	1	.000
N of Valid Cases	214		

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 12.74.

Table 4: raw statistics

**Table 4 – MLS fan x increased interest and MLS games attended or watched**

		<b>Are you an MLS fan?</b>		
		<i>Yes</i>	<i>No</i>	Total
<b>Does watching World Cup games increase your interest in watching other soccer games?</b>	<i>Yes</i>	77	90	167
	<i>No, because I am not a fan of soccer</i>	2	86	88
	<i>No, because I am already an avid soccer fan</i>	17	6	23
	<i>Depends on the league</i>	21	25	46
	Total	117	207	324
p-value		< 0.001		
<b>How many MLS games did you attend in the 2010 season?</b>	<i>None</i>	56	184	240
	<i>1 - 2</i>	41	22	63
	<i>3 +</i>	21	1	22
	Total	118	207	325
p-value		< 0.001		
<b>How many MLS games did you watch on television in the 2010 season?</b>	<i>None</i>	16	153	169
	<i>1 - 2</i>	50	47	97
	<i>3 +</i>	52	7	59
	Total	118	207	325
p-value		< 0.001		

Table 4: chi-square results

**Are you a fan of the MLS? \* Does watching World Cup games increase your interest in watching other soccer games?**

**Chi-Square Tests**

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	66.970 <sup>a</sup>	3	.000
Likelihood Ratio	84.415	3	.000
Linear-by-Linear Association	.007	1	.933
N of Valid Cases	324		

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 8.31.

**Are you a fan of the MLS? \* How many MLS games did you attend in the 2010 season?**

**Chi-Square Tests**

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	73.303 <sup>a</sup>	2	.000
Likelihood Ratio	75.436	2	.000
Linear-by-Linear Association	72.585	1	.000
N of Valid Cases	325		

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 7.99.

**Are you a fan of the MLS? \* How many MLS games did you watch on television in the 2010 season?**

**Chi-Square Tests**

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	130.920 <sup>a</sup>	2	.000
Likelihood Ratio	142.635	2	.000
Linear-by-Linear Association	130.314	1	.000
N of Valid Cases	325		

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 21.42.

Table 5: raw statistics

**Table 5 – U.S. and MLS talent reflection x World Cup appearances influence**

		<b>Do you believe the U.S. men's team talent level reflects the talent level of the MLS?</b>			<b>Total</b>
		<i>Yes</i>	<i>No</i>	<i>Depends on % of MLS players on U.S. team</i>	
<b>Do World Cup appearances by a country's men's national team lead you to believe that the country's primary soccer league is elite?</b>	<i>Yes, league is elite</i>	50	24	36	110
	<i>No, but is positively influenced</i>	51	47	63	161
	<i>No, appearances have no impact but success from appearances does</i>	10	13	17	40
	<i>No impact at all</i>	4	14	4	22
	<b>Total</b>	115	98	120	333
p-value		0.002			

Table 5: chi-square results

**Do you believe the U.S. men's team talent level reflects the talent level of the MLS? \* Do World Cup appearances of a country's men's national team lead you to believe that the country's primary soccer league is elite?**

**Chi-Square Tests**

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	21.151 <sup>a</sup>	6	.002
Likelihood Ratio	19.704	6	.003
Linear-by-Linear Association	2.740	1	.098
N of Valid Cases	333		

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 6.47.

## Appendix C

### MLS attendance graphs

\*No MLS games were played during week's 19 (2006) and 13 (2010)

\*\* World Cup took place in weeks 11-15 (2006) and 12-17 (2010)

