### ARTICLE IN PRESS

Business Horizons (2015) xxx, xxx-xxx



Available online at www.sciencedirect.com

### **ScienceDirect**



#### KELLEY SCHOOL OF BUSINESS

INDIANA UNIVERSITY

www.elsevier.com/locate/bushor

## Score a tweet and post a goal: Social media recipes for sports stars

Pawel Korzynski<sup>a</sup>, Jordi Paniagua<sup>b,\*</sup>

#### **KEYWORDS**

Social media; Twitter; Facebook; Sports business; Sports stars; Market value; Qualitative comparative analysis Abstract Sports performance is not the unique ingredient of a sports star's market value. Some gifted players are undermined by weak media exposure while some less talented players who actively engage in social media and attract fans in millions benefit from exorbitant contracts. This research conceptualizes the effect of social media in the sports business and analyzes the recipes that lead to high market value for sports stars. This study uses qualitative comparative analysis (QCA) on a sample of 95 top soccer players in Europe. The empirical results reveal that sports performance and social media activity are both necessary but insufficient conditions for a high market value condition. This research provides a roadmap for managers and sports stars to navigate in the social media arena.

© 2015 Kelley School of Business, Indiana University. Published by Elsevier Inc. All rights reserved.

## 1. World's highest paid athletes on social media

In November 2014 Forbes published a list of the world's highest paid athletes. Cristiano Ronaldo, a Portuguese soccer player who plays for the Spanish club Real Madrid, is second on the list behind Floyd Mayweather, an American professional boxer. Ronaldo is, however, the unquestionable social media leader with 110 million followers (Badenhausen, 2014a). Kobe Bryant, an American professional

basketball player for the Los Angeles Lakers, is also one of the top five on the list. Born in 1978, Bryant is close to the end of his basketball career, yet his salary is almost eight times higher than any other basketball player (Badenhausen, 2014b). Interestingly, he also takes fifth place on the list of the most popular players on social media, where he regularly posts updates on Facebook and tweets on Twitter. In comparison, Derrick Rose, a basketball player for the Chicago Bulls who was born in 1988, has less than half the number of social media followers of Bryant and only 46 tweets compared with Bryant's 871 (as of March 2015). Rose ranks no. 13 among the 100 highest paid athletes. Bryant and Rose have similar field performance, and despite the fact that Bryant seems to be overpaid by sports standards, the

0007-6813/\$ — see front matter  $\odot$  2015 Kelley School of Business, Indiana University. Published by Elsevier Inc. All rights reserved. http://dx.doi.org/10.1016/j.bushor.2015.11.002

<sup>&</sup>lt;sup>a</sup> Kozminski University, Warsaw, Poland & Harvard University, Cambridge, MA, U.S.A.

<sup>&</sup>lt;sup>b</sup> Catholic University of Valencia San Vicente Mártir, Calle Corona 34, Valencia, Spain

<sup>\*</sup> Corresponding author E-mail addresses: pkorzynski@fas.harvard.edu (P. Korzynski), jordi.paniagua@ucv.es (J. Paniagua)

## **ARTICLE IN PRESS**

athletes' online popularity is an asset that leads to a higher salary.

Social media (SM) is an excellent pension plan for retired stars. Old athletes—at least in soccer terms—can still profit from advertisement contracts and a social media facelift. Dewhurst (2015) reports that David Beckham is the most popular individual on Instagram ever. The retired English captain was the fastest to earn 1 million followers in his SM debut. In addition, his account was the fastest ever to reach 5 million followers, doing so in just 3 days.

Presence and awareness in social media ensures soccer players a global reach. Similar to large corporations, athletes are able to use online networking platforms such as Facebook, Twitter, and Instagram to interact with their current fans as well as to attract new ones. Sanderson (2011) argued that the role of social media in the sports business needs further research and better understanding. A majority of athletes, managers, and media advisors have a long way to go before they can develop an effective social media strategy.

This study addresses the relevance of social media and sports performance in the market value of global sports stars. We present an empirical analysis to reinforce our argument that social media and professional performance are both relevant for the contract value of public figures. As a global phenomenon, soccer is one of the most popular disciplines on social media. Therefore, we analyzed a sample of approximately 100 worldwide soccer players with respect to their media activity (number of Twitter and Facebook followers), professional achievements (assists and goals), and contract value (dollars).

Regression analysis provides hardly any practical hints for field practitioners because it is insufficient to unravel the complex relationships of social media. In today's interconnected world, the paths of the social media labyrinth are often inscrutable; different and often contradictory data lead to similar outcomes. This phenomenon is palpable in sports, but it is not exclusive to sports management. Just as less talented players are often media darlings, average CEOs can compensate for their corporate weakness with active social engagement. This article focuses on sports, specifically soccer; however, the lessons learned from our study may be easily translated to a more general business horizon.

This research contributes to a new perspective on social media. The study presented herein provides practical recipes for social media management in the sports business. To formulate the suggestions, we leaned on complexity theory through fuzzy set qualitative comparative analysis (QCA) to study the role of social media in contract value creation. The player's value is often subjective, asymmetrical,

and complex, leading to multiple paths for the same solution. Some excellent players are poorly paid while some mediocre players gain high contracts. QCA allows for explaining an outcome with various complex solutions. This qualitative analysis complements the one-size-fits-all solutions of traditional regression analysis.

#### 2. Three powers of social media

Kaplan and Haenlein (2010) state that SM serves as a branding tool not only for large corporations but also for small- and medium-size companies, non-commercial organizations, and governmental institutions. However, some researchers have noticed that social media also plays an important role for individuals who build their personal brand through online social networking (OSN) (Harris & Rae, 2011). SM experts argue that it is crucial to control online identity (Schawbel, 2009). Through SM platforms, a post, tweet, or comment published in an online network and easily popularized by a number of users may influence one's image and sometimes even cause damage to a business or professional, or social marginalization. A reputation built for years may be undermined or lost with a single tweet; furthermore, an image far from reality can be created.

Researchers have dissected different areas of SM engagement and participation. Kietzmann, Hermkens, McCarthy, and Silvestre (2011) argued that OSN platforms support seven functional areas: identity, conversations, sharing, presence, relationships, reputation, and groups. Parent, Plangger, and Bal (2011) referred to the six levels of progressive participation: viewing, forwarding, commenting, creating, moderating, and arbitrating. Drawing on these concepts, we develop a framework of three powers of social media that might prove useful for leaders, influencers, and global athletes.

#### 2.1. Power of informing on social media

As our study concerns global stars, virtual settings should serve as a very good tool to show where these actors are and what they will do in the near future. For example, on Ronaldo's Facebook profile, posts about past meetings with fans and future events in which Ronaldo will participate collect the highest number of likes—usually more than 1 million.

Top sports stars need to find a balance between protecting their identity and sharing interesting news from their private lives. Scholars point out that online fans avidly expect information about athletes' personal lives on SM (Frederick, Lim, Clavio, Pedersen, & Burch, 2014; Pegoraro,

2

2010). SM serves as a primary informal channel; it transmits private information about the player and magnifies the news from traditional platforms. Unfortunately, to satisfy fans' desire to get personal information about their favorite players, paparazzi and gossip columnists sometimes spread unsolicited information about athletes. Thus, athletes need to monitor SM and respond quickly in such cases. In the case of top athletes, information about doping is the most harmful to their reputation in both online and offline settings (Ehrnborg & Rosén, 2009). However, experts underline that while it is necessary to be careful about the posts of other users, it is even more important to be cautious about texts, photos, and videos that are published by sports celebrities themselves.

#### 2.2. Power of interacting on social media

Pronschinske, Groza, and Walker (2012) show that interacting with fans and engaging in discussion on Facebook has a positive influence on the number of followers or likes. Neymar, a Brazilian professional footballer who plays for the Spanish club FC Barcelona and is valued at €80 million, has 67 million followers on Twitter and Facebook, likely due in part to his high online activity. He participates regularly in online discussion (approximately 40,000 tweets on his Twitter profile) and posts frequently (approximately 2,600 updates on Instagram). Other good examples of high frequency social media users are Karim Benzema, a French footballer who plays for the Spanish club Real Madrid and is valued at €50 million, and Gonzalo Higuain, an Argentine professional footballer who plays for S.S.C. Napoli in Italy and is valued at €35 million. Comparatively, neither Benzema (20 million followers) nor Higuain (7 million followers) are as active on Twitter and Facebook as Nevmar.

SM users interact with other Twitter users by following their Twitter accounts and using replies and mentions. Athletes rarely share their political views or interact with politicians. When they do so, they normally receive strong media attraction. For example, more than 7,000 users re-tweeted Roberto Soldado's tweet against the new uprising populist parties in Spain. However, most comments on his timeline harshly criticized the Tottenham Hotspur member's political views.

Most players stick to a sports theme in SM. Soccer stars usually follow other players from their team, corporate profiles of their sponsors, or other celebrities. Every third tweet on Neymar's Twitter account contained replies or mentions during January and February 2015. On the other hand, Paul Pogba, a French footballer who plays for the Italian

club Juventus and is valued at €50 million, does not have high activity on his Twitter account, and his posts from the last year had very few replies or mentions. According to Hopkins (2013), SM enables companies to develop relationships with fans. However, different platforms serve different functions: Twitter provides a mechanism for real-time interaction while Facebook provides a channel to enrich fans' experiences. Paniagua and Sapena (2014) define Facebook as a complex service for simple interactions and Twitter as a simple service for complex relationships. Sports stars use both platforms to gain visibility and are thereby better placed to attract sponsors and prospective clubs.

#### 2.3. Power of inspiring on social media

The power of inspiring sports fans through SM refers to the extent to which followers are energized and encouraged to undertake activities in offline and online settings. In the offline world, athletes motivate fans to attend live games and events. In the online environment, they inspire fans to share the content on a player's SM profile. Cristiano Ronaldo is the master of influence on sharing. He posted approximately 600,000 shares in January and February 2015. In addition, during these 2 months, he posted 25 updates on his Facebook profile containing photos from soccer matches, trainings, meetings, events, and merchandising advertisements. Evidently, this SM activity is managed by a SM team. However, we observed several updates to his profile that Ronaldo made himself, such as apologies for bad plays and personal photos with family and friends. 'Selfies' and mirror photos are not uncommon in his profile, either, which transmits Ronaldo's personal involvement in his updates.

Social media inspiration increases with a direct and personal connection with the online crowd. Videos are an excellent means to transmit this personal participation. For example, a short video of a soccer match garnered the highest number of shares in Ronaldo's timeline. Another player, Diego Costa, a Spanish footballer who plays for the English club Chelsea and is valued at €50 million, added only 3 updates in January and February, resulting in approximately 100 shares on his Facebook profile (6,000 times fewer shares than Ronaldo), but increased his average number of shares three times over when he added a video in March 2015.

The importance of video content is mentioned by a number of social media experts. Demers (2014) explained that videos enable professionals to reach new audiences in new ways with powerful messaging. Rozgonyi (2015) emphasized that 90% of information transmitted to the brain is visual, and visual

information is processed 60,000 times faster in the brain than text.

However, the power of inspiring is more than just the result of media richness and personalization. The strength of this power also depends on the previous powers—informing and interacting—because an athlete is able to energize his or her fans by staying in touch with them through regular updates about his or her professional and private life.

## 3. Social media and superstars' market value

The concept of 'superstar phenomenon' is applied to managers, artists, celebrities, and professional athletes (Franck & Nüesch, 2012). In the business literature, there are two basic concepts explaining the value of superstars: the role of talent (Rosen, 1981) and the positive network externalities of popularity (Adler, 1985). More recent theories have explained that players' salaries are determined by factors such as performance (goals scored, assists, tackles), number of games, player position, contract duration, and age. Herm, Callsen-Bracker, and Kreis (2014) argued that apart from talent reflected by simple statistics, the number of press citations translates into athletes' market value.

Current researchers specializing in SM underline the crucial role of fans on SM platforms and suggest that the number of fans may serve as an indicator of success (Shih, Lin, & Luarn, 2014) or performance (Paniagua & Sapena, 2014). Since the majority of top soccer players are registered on major OSN platforms such as Twitter and Facebook, we can

argue that their market value is positively associated with both sports performance and number of fans on SM. Moreover, players' generated content potentiates the influence of SM on contract value.

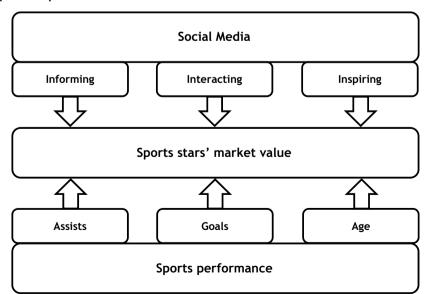
Retired sports stars can use SM as a retirement investment. For example, retired national captains David Beckham (United Kingdom), Zinedine Zidane (France), and Raúl (Spain)—who returned as a player after announcing his retirement—still actively engage in SM. These sports pensioners stretch their sports and business lives to unprecedented ages with the help of millions of followers. Their social media exposure is an asset used to negotiate advertisement and sponsorship contracts, even when their successful athletic careers are over.

Figure 1 shows a conceptual map summarizing our arguments. Sports stars' market value is influenced by their athletic performance and the three powers of social media. In the next section, we present the logical recipes that maximize market value of sports stars.

#### 4. The results: Two calls for action

In this section we present a glimpse of our analytical method and the main results of our analysis based on two sets of analyses we performed: a standard regression and a qualitative comparative analysis. Business studies have used QCA as a tool to clarify previous puzzling results (Fiss, 2007; Hsu, Woodside, & Marshall, 2013). However, business literature has also shown interest in QCA as a standalone analysis tool (Woodside, 2014). Readers interested in a





5

## **ARTICLE IN PRESS**

Score a tweet and post a goal: Social media recipes for sports stars

comprehensive description of the methods may refer to the technical appendix. Full regression results are available upon request.

#### 4.1. Act I: Engagement

The results from our standard regression analysis indicate that the effect of Twitter followers on contract value is fully mediated by the number of tweets. There are two paths that lead to high value scores: directly from Twitter followers and indirectly through number of tweets. That is, player generated content potentiates the influence of SM in athletes' contract value.

This result is the first call for action from our study. Sports stars increase their contract value by attracting followers on social media. However, the follower effect on contract value is mainly an indirect effect through number of tweets. This means that sports stars should pursue followers and engage actively with them in order to maximize their contract value.

#### 4.2. Act II: New recipes for new media

Although regression analysis is favored by most academics, it gives no clear direction for action to managers and sports stars themselves. That is, regressions shed no light on which conditions might be necessary and/or sufficient for a high contract value. However, QCA provides practitioners applicable recipes for the desired outcome.

QCA involves the analysis of necessary and sufficient conditions to produce a given outcome. Necessary conditions are those required to produce the outcome, but might not be sufficient by themselves to produce the outcome. Sufficient conditions, on the other hand, always lead to the desired outcome but may not be the *only* conditions that lead to the outcome.

The sports business is a particularly complex theater of operations. For example, in our context, high values of sports performance (goals, assists) may be necessary but not sufficient for high market value (i.e., highly valued contracts occur only with high values of goals, but other variables are needed to produce high contracts). Alternatively, high values of sports performance may be sufficient but not necessary for a high market value (i.e., high values of contracts may occur with both low and high performance values).

In our study, the full solution for high contract value is:

$$Value = Assists * (Goals * young * FB + Goals * TW * FB + young * Twitter)$$

where a high value is logically associated with high scores of Assists, Goals, Facebook (FB), and Twitter (TW), and low values are associated with age (young players). The asterisk stands for a logical 'AND,' which indicates a necessary condition. The '+' indicates a logical 'OR,' a sufficient condition.

Sports performance (assists) is a necessary condition—but not sufficient by itself—for high contract value. It is the only necessary condition, since it is common to all solutions. However, it is not enough by itself to produce a high contract value. Moreover, players can cook a good contract using different recipes. Table 1 shows the different conditions leading to a high contract value.

Table 1 contains our second call for action. In particular, there are three possible recipes leading to a high contract value. That means that we can find three different kinds of top soccer players with high contracts: (1) young players with high values of assists, goals, and Facebook; (2) young players with worse goal aim, but with high values of assists and Twitter; and (3) old players with high values of everything else—assists, goals, Twitter, and Facebook.

The leap from condition 1 (Assists\*Goals\*Young\* Facebook) to condition 2 (Assists\*Young\*Twitter) reveals that young players can compensate for a deficit in sports performance (i.e., less goals) with frenetic activity in SM, especially through Twitter. This result is relevant since it highlights the high degree of substitutability between real world performance and social network activity. Virtual performance in social networks is as important as sports performance to reach a high contract value. Furthermore, our result highlights the championship of Twitter over Facebook for young players. In line with previous research, 140 characters are one of the most powerful tools in the SM arena.

Old players must play a tougher game. Players with an above average age (25 in our sample) have to excel in all conditions in order to reach a high contract value: assists, goals, Twitter, and Facebook. These players have to play hard both on the field and in the social media arena.

When we group SM activity into one unique social media condition (SM=Twitter or Facebook), we uncover a second necessary, but not sufficient, condition for high market value:

Value = Assists \* (SM) \* (Goals + young)

Table 1. Conditions leading to high contract value							
	Assists	Goals	Age	Twitter	Facebook		
(1)	High	High	Young	-	High		
(2)	High	-	Young	High	-		
(3)	High	High	-	High	High		

	Mean	SD	Min	Max
Value	37.76	25.66	21	220
Goals	11.85	10.18	0	51
Assists	9.33	6.24	0	26
Twitter	1593385	1989071	413	8970000
Facebook	7118974	1.51e+07	1516	1.07e+08
Age N=95	24.96	2.88	19	31

This recipe reveals that top players always need both high athletic results and high social media engagement (Facebook or Twitter) for high contract values. However, old players suffer an extra necessary condition for contract value: goal scoring. Young players are able to bypass the goal scoring condition with less sweat. A good example of this is Eden Hazard, a 23-year-old Belgian professional footballer who plays for Chelsea, whose value is higher than older players such as Edinson Cavani, a 27-year-old Uruguavan professional footballer who plays as a striker for Paris Saint-Germain, and Karim Benzema, a 27-year-old French professional footballer who plays for Spanish club Real Madrid this in spite of the fact that they score more goals than Hazard.

#### 5. Lessons learned

The lessons learned from this research extend beyond the sports arena. Although our study focused on soccer players, the insights regarding social media and performance are relevant for general management (Korzynski, 2014). A large number of firms hire star CEOs with media coverage similar to that of sports stars. Our study opens the path to study the success of people such as Mark Zuckerberg, Richard Branson, and Bill Gates, who engage constantly with social media.

Sports managers, SEOs, media advisers, and stars themselves profit from the insights of this study. Excellence in sports is a necessary condition to negotiate a successful contract, but it is not the only ingredient for a recipe for success. In addition to a particular athletic skillset, sports stars need to use the powers of SM to maximize their market value: first by sharing with their fans some details of their private lives (power of informing); second by motivating discussions with fans and other players (power of interaction); third by posting regular and inspiring personal updates on SM using text, graphic, and video content (power of inspiring). Social media is also an excellent investment for retirement.

The results of our qualitative analysis provide valuable insights for athletes' career path development. Young players may disguise mediocre performance with high social media activity to acquire valuable contracts. Additionally, this study provides some hints regarding the best suited social media platform for sports stars. We show that Twitter is more appealing for young players. However, toward the end of their career, soccer players should attain high performance in both sports and social media realms in order to garner a high-value contract. This insight can prove useful for clubs and sponsors in contract negotiations.

This study sets a path for a wide range of exciting research possibilities. We focused on soccer, which is widespread in Europe, South America, and Asia. However, in North America soccer is not as popular as football or basketball. Therefore, the results might not be directly applicable to the American sports market. An interesting future application of our methodology could focus on other sports (e.g., basketball, American football, baseball).

In addition, research that applies and extends our framework toward non-sports business presents exciting prospects. One interesting application would be to study the weight of social media in star CEOs' remuneration. Another study might consider the effect of social media on hiring practices, as most personal interviews today include a screening of the candidate's social media. Similarly, the relevance of social media profiles in corporate salaries and positions would make for a noteworthy extension of our work.

# 6. About this research: Technical appendix

We collected data for the top 95 European soccer players. For each individual, we registered the value of the club contract and two sets of data: sports performance data (i.e., goals scored and assists to goals in the last season, 2013/2014) and social media activity (Facebook fans, Twitter followers). We also annotated age as a control variable. Table 2

Table 3. Results							
Set	Raw Coverage	Unique Coverage	Solution Consistency				
Assists * Goals * young * FB	0.382	0.031	0.932				
Assists * Goals * TW * FB	0.442	0.092	0.903				
Assists * young * Twitter	0.454	0.104	0.925				
Total Coverage = 0.577							
Solution Consistency = 0.890							

reports a summary of the statistics of the variables used in the analysis.

The statistical methods used to analyze social media tend to rely on symmetrical relationships between variables. These methods include simple regression analysis (Asur & Huberman, 2010; Ettredge, Gerdes, & Karuga, 2005; Gilbert & Karahalios, 2009); autoregressive time-series analysis (Choi & Varian, 2012; Tirunillai & Tellis, 2012); and non-linear fixed effects panel regression (Paniagua & Sapena, 2014).

Sir Francis Galton coined the term 'regression' in the 19th century while studying growth patterns in the industrial revolution. Two centuries later, scholars are still wearing an old and sophisticated suit to study the social media revolution. However, the complexity of the interaction between business and social media calls for a new set of analytical tools.

In line with these arguments, Armstrong (2012) advocates against the use of multiple regression analysis in complex situations. Instead, we used Qualitative Comparative Analysis (QCA), which is extremely efficient when the sample size is small (Fiss, 2011; Lijphart, 1971).

From the standard ordinary least squares (OLS) double log regression we conclude that both sports performance and social media activity positively influence contract value. The standard interpretation of these results is that a 1% increase in goals scored would lead to a contract value increase of 0.215% on average. In contrast, a 1% increase in Facebook fans would increase contract value by 0.077% on average.

Additionally, we used a mediated structural equation model (SEM) (Baron & Kenny, 1986). This method fits a series of linear regression models to distinguish between direct and indirect effects. The results indicate that player-generated content (tweets) indeed increases the number of followers (as seen by the positive and significant coefficient of 0.479). The effect of tweeting is fully and positively mediating the effect of Twitter followers on contract value. The total effect of 0.023 (and significant to the 10% level) is basically the result of the effect of Twitter followers on the number of tweets (0.479 and significant to the 1% level).

The QCA results are reported in Table 3. We followed the method developed by Longest and Vaisey (2008) and presented the minimum configuration set using the Quine—McCluskey algorithm (Ragin, 2014) to logically reduce the configurations. We present only those combinations significant at the 95% level with a cut-off consistency of 0.700 (Ragin, 2006).

We achieved a total coverage of 0.577 and solution consistency of 0.890. Consistency ranged from 0 to 1 and represented the extent to which the combinations lead to a given outcome. Coverage corresponded to the number of cases represented by the conditions. Therefore, these consistency and coverage values are considered as acceptable to interpret the results (Ragin, 2006).

#### References

Adler, M. (1985). Stardom and talent. The American Economic Review, 75(1), 208–212.

Armstrong, J. S. (2012). Illusions in regression analysis. *International Journal of Forecasting*, 28(3), 689–694.

Asur, S., & Huberman, B. A. (2010). Predicting the future with social media. Paper presented at the Web Intelligence and Intelligent Agent Technology (WI-IAT) International Conference, August 31—September 3.

Badenhausen, K. (2014a, June 11). Cristiano Ronaldo leads the biggest athletes on social media. Forbes. Retrieved from http://www.forbes.com/sites/kurtbadenhausen/2014/06/ 11/cristiano-ronaldo-leads-the-biggest-athletes-on-socialmedia/

Badenhausen, K. (2014b, June 11). Floyd Mayweather heads 2014 list of the world's highest-paid athletes. Forbes. Retrieved from <a href="http://www.forbes.com/sites/kurtbadenhausen/2014/06/11/floyd-mayweather-heads-2014-list-of-the-worlds-highest-paid-athletes/">http://www.forbes.com/sites/kurtbadenhausen/2014/06/11/floyd-mayweather-heads-2014-list-of-the-worlds-highest-paid-athletes/</a>

Baron, R. M., & Kenny, D. A. (1986). The moderator—mediator variable distinction in social psychological research: Conceptual, strategic, and statistical considerations. *Journal of Per*sonality and Social Psychology, 51(6), 1173—1182.

Choi, H., & Varian, H. (2012). Predicting the present with Google trends. *Economic Record*, 88(S1), 2–9.

Demers, J. (2014, August 11). 5 social media trends buzzing right now. *Inc.* Retrieved from <a href="http://www.inc.com/jayson-demers/5-social-media-trends-buzzing-in-2014.html">http://www.inc.com/jayson-demers/5-social-media-trends-buzzing-in-2014.html</a>

Dewhurst, A. (2015, May 7). It's official: David Beckham is the most popular person on Instagram EVER. *Grazia*. Available at <a href="http://www.graziadaily.co.uk/2015/05/its-official-david-beckham-is-the-most-popular-person-on-instagram-ever">http://www.graziadaily.co.uk/2015/05/its-official-david-beckham-is-the-most-popular-person-on-instagram-ever</a>

Ehrnborg, C., & Rosén, T. (2009). The psychology behind doping in sport. *Growth Hormone and IGF Research*, 19(4), 285–287.

### ARTICLE IN PRESS

- Ettredge, M., Gerdes, J., & Karuga, G. (2005). Using Web-based search data to predict macroeconomic statistics. *Communications of the ACM*, 48(11), 87–92.
- Fiss, P. C. (2007). A set-theoretic approach to organizational configurations. *Academy of Management Review*, 32(4), 1180–1198.
- Fiss, P. C. (2011). Building better causal theories: A fuzzy set approach to typologies in organization research. *Academy of Management Journal*, 54(2), 393–420.
- Franck, E., & Nüesch, S. (2012). Talent and/or popularity: What does it take to be a superstar? *Economic Inquiry*, 50(1), 202–216.
- Frederick, E., Lim, C. H., Clavio, G., Pedersen, P., & Burch, L. M. (2014). Choosing between the one-way or two-way street: An exploration of relationship promotion by professional athletes on Twitter. *Communication and Sport*, 2(1), 80–99.
- Gilbert, E., & Karahalios, K. (2009). Predicting tie strength with social media. Paper presented at the Proceedings of the SIGCHI Conference on Human Factors in Computing Systems, April 4-9.
- Harris, L., & Rae, A. (2011). Building a personal brand through social networking. *Journal of Business Strategy*, 32(5), 14–21.
- Herm, S., Callsen-Bracker, H.-M., & Kreis, H. (2014). When the crowd evaluates soccer players' market values: Accuracy and evaluation attributes of an online community. Sport Management Review, 17(4), 484–492.
- Hopkins, J. L. (2013). Engaging Australian Rules Football fans with social media: A case study. *International Journal of Sport Management and Marketing*, 13(1), 104–121.
- Hsu, S.-Y., Woodside, A. G., & Marshall, R. (2013). Critical tests of multiple theories of cultures' consequences: Comparing the usefulness of models by Hofstede, Inglehart and Baker, Schwartz, Steenkamp, as well as GDP and distance for explaining overseas tourism behavior. *Journal of Travel Research*, 59(6), 679–704.
- Kaplan, A. M., & Haenlein, M. (2010). Users of the world, unite! The challenges and opportunities of social media. *Business Horizons*, 53(1), 59–68.
- Kietzmann, J. H., Hermkens, K., McCarthy, I. P., & Silvestre, B. S. (2011). Social media? Get serious! Understanding the functional building blocks of social media. *Business Horizons*, 54(3), 241–251.
- Korzynski, P. (2014). How does online social networking help leaders communicate? Evidence from the Fortune 500. Asia Pacific Journal of Human Resources, 52(4), 460–475.

- Lijphart, A. (1971). Comparative politics and the comparative method. *American Political Science Review*, 65(03), 682–693
- Longest, K. C., & Vaisey, S. (2008). Fuzzy: A program for performing qualitative comparative analyses (QCA) in Stata. *Stata Journal*, 8(1), 79–104.
- Paniagua, J., & Sapena, J. (2014). Business performance and social media: Love or hate? *Business Horizons*, 57(6), 719–778.
- Parent, M., Plangger, K., & Bal, A. (2011). The new WTP: Willingness to participate. *Business Horizons*, 54(3), 219–229.
- Pegoraro, A. (2010). Look who's talking—Athletes on Twitter: A case study. *International Journal of Sport Communication*, 3(4), 501–514.
- Pronschinske, M., Groza, M. D., & Walker, M. (2012). Attracting Facebook 'fans': The importance of authenticity and engagement as a social networking strategy for professional sport teams. Sport Marketing Quarterly, 21(4), 221–231.
- Ragin, C. C. (2006). Set relations in social research: Evaluating their consistency and coverage. *Political Analysis*, 14(3), 201–310
- Ragin, C. C. (2014). The comparative method: Moving beyond qualitative and quantitative strategies. Oakland, CA: University of California Press.
- Rosen, S. (1981). The economics of superstars. *The American Economic Review*, 71(5), 845–858.
- Rozgonyi, B. (2015, January 8). Social media predictions podcast: What to expect in 2015. wiredPRworks. Retrieved from http://wiredprworks.com/social-media-predictions-2015/
- Sanderson, J. (2011). It's a whole new ballgame: How social media is changing sports. New York: Hampton Press.
- Schawbel, D. (2009). Me 2.0: Build a powerful brand to achieve career success. Berkshire, UK: Kaplan Books.
- Shih, C.-C., Lin, T. M. Y., & Luarn, P. (2014). Fan-centric social media: The Xiaomi phenomenon in China. *Business Horizons*, 57(3), 349–358.
- Tirunillai, S., & Tellis, G. J. (2012). Does chatter really matter? Dynamics of user-generated content and stock performance. *Marketing Science*, 31(2), 198–215.
- Woodside, A. G. (2014). Embrace perform model: Complexity theory, contrarian case analysis, and multiple realities. *Journal of Business Research*, 67(12), 2495—2503.