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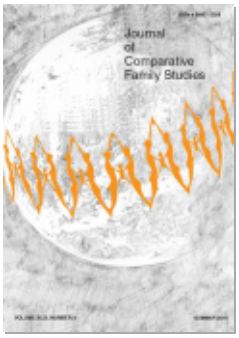

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Journal of Comparative Family Studies, Volume 49, Number 3, Summer 2018, pp. 333-354 (Article)

Published by University of Toronto Press

Role of Family Members in Sport Motivation, Involvement and Expertise of Track and Field Athletes in France

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INTRODUCTION

On February 15th 2014, the French champion Renaud Lavillenie beat the world pole vaulting record until then held by Ukrainian Sergey Bubka for over 20 years. This record drew attention from media worldwide. Already as a boy he dreamed of becoming a champion. Where does this dream come from? How did it build? Pole vaulters from (grand) father to son, in the Lavillenie household, the pole-vaulting passion seems to affect the whole family (grandfather, father, brother, and even his wife are pole vaulters). A family affair that makes each of its members leap ever higher.

Factors that contribute to success in sport and persistent sport motivations are many: physiological changes across maturation, injury and health concerns, psychological overload from excessive demands and expectations, nutrition, eating disorders in adolescent athletes, stressful environmental conditions, coaching education and effectiveness (Bergeron et al., 2015). In the face of their ubiquity and potential for influence, however, familial networks have been relatively neglected by researchers.

The first socialisation agents of an individual are parents and siblings (Coakley, 1987). The family plays a primary socialization role during childhood then a secondary role from adolescence (Segalen, 2010). Family environment enables the transmission of standards (rules that govern the actions of individuals within society) and values. Sillamy (1983) define socialization as the "slow and continuous process by which an individual assimilates patterns and values of the society to which he/she belongs" (Sillamy, 1983).

This process has an impact on motivations and practice patterns of athletes (Brustad et al., 2001; Coakley, 1987; Côté, 1999). Berger and Luckmann (1966) present socialisation in two important stages, primary socialisation during childhood with language learning, and secondary socialisation with learning a specific language when entering working life.

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Primary socialisation refers to identity-building from childhood, within a home environment and learning through the existing relationship between the two entities. The individuals then build their world view, referring to private (family) and institutional actors (school) around them. Primary socialisation leads to acquiring an overall vision of society. Socialisation continues as it is an ongoing process.

Secondary socialisation defines the process by which individuals acquire professional knowledge along with the relevant language. Individuals choose to head for a group or sub-universal symbol (Crosset and Beal, 1997). They then become aware of their "self-identity" and their "identity to others" (Mead, 1937). They establish the role they wish to play. They grow and adapt to this coveted group. For example, in athletics someone part of the throwing sub-universe will learn and apply the specific body language used by group members.

In this article we will only be focussing on primary socialisation, meaning both immediate family circles and distant family circles. In France, sociologists, particularly through the concept of habitus, have highlighted the influence of culture on body habitus, for example the way we walk or use a tool (Mauss, 1934) along with the influence of family towards mechanisms of inequality and social reproduction (Bourdieu, 1980; Bourdieu and Passeron, 1964). In the case of athletics, this means that having a family member who practices sport may allow the athlete to enter the social world of this particular sport more easily. As a result, he/she can interpret it in his own way, along with that of members of his/her community. These measures, namely habitus unconsciously assimilated by the athlete, are the cause of his/her behaviour and his/her future actions (Pociello, 1995).

THEORETICAL FRAMEWORK

The traditional family model has changed dramatically in France and in many Western countries since the 1970s (Dechaux, 2009). It is referred to as family pluralism. According to Roy (2011) families come in all shapes and sizes (traditional families, large families, single parent families and step-families). The French National Institute of Statistics and Economic Studies describes these various forms of family as follows: "a family is called large when there are three or more children,", "a single-parent family consists of a single parent and one or more unmarried children (with no children)", "a reconstituted family includes an adult couple, married or not, and at least one child from a previous relationship of one of the spouses. Children living with their parents along with half brothers or sisters are also part of a reconstituted family." (INSEE, 2016).

However, familial networks are still essential features of society. As defined by Simmel (1908), family is a cultural construction. The social processes that a family applies in order to live together are complex. According to Levi-Strauss (1958) family is both a community of individuals united by kinship and a social, legal and an economic institution. Members, abide by a whole set of rules, are also bound by psychological feelings such as love, affection and respect. It creates moral and tangible solidarity among its members, designed to protect them and promote their social, physical and emotional development.

Familial networks play a central role in the support of children. Family is a resource and a protective system for the individual members (Masten and Coatsworth, 1998). When an individual or couple in a family has children, caring for children becomes a developmental task for the family. Families provide a sense of belonging and connectedness. Later, socializing children to behave according to sociocultural norms is a family task (Masten and Monn, 2015). However, families change over time, moving through life cycles related to the development of individuals (Goldenberg and Goldenberg, 2013; Walsh, 2011).

Family members have responsibilities and obligations beyond the family itself. Families often are expected to support and contribute to their communities, cultures, and other important systems in societies, such as schools, religious organizations (Harkness and Super, 2012; Walsh, 2012), and sports.

Families can mediate the exposure of children to adversities arising outside the family. Parenting quality is generally associated with many aspects of future competence in children, including academic achievement, sport achievement, social competence, and parenting quality in the next generation (Masten and Coatsworth, 1998; Sroufe et al., 2005). Parents, for example, may increase their level of monitoring or comforting of a child in the presence of a threat. Parents may act to mobilize emergency supports or special services for their children during a crisis (Masten and Monn, 2015). Parents may also encourage or discourage the desire to engage in physical activities.

Sport and Dependent Variables

A track and field athlete is a person who performs athletics. Athletics is a sport with 23 events grouped into races, jumps, throws, combined events and walking. Running is a universal fun/competitive human activity (Caillois, 1958) just like throwing an object as far as possible and that the men's 100m final at the Olympics is followed by hundreds of millions of people worldwide. Athletics is very wide and diversified. In France it has long been arranged on a pyramidal structure: mass sport at the bottom and professional sports at the top.

Although athletics is often described as an individual performance search sport, a number of collective events such as club meetings, increase mutual aid and groups, setting the pace of the athlete's year. Values associated with this sport are individualistic, performative, but also tribal (Maffesoli, 1988), in other words, familial. The 23 athletic events, grouped into five "families" (a term full of meaning), consist of subgroups (Unruh, 1983) meaning unique subcultures towards specific representations, discourses and rituals. According to Crosset and Beal (1997), sub-worlds refer to "a cultural process by which groups of people come together to create a "social object" while a subculture is defined by the treatment given to it by members of the dominant culture." To the question "what is athletics?" Athletes are often troubled and tend to evoke the subcultures that it consists of: sprinting, middle-distance, cross-country, long-distance, jumps and throws. Athletics is therefore a social underworld composed of subcultures. This underworld and subcultures have a twofold reality: objective and subjective (Berger and Luckmann, 1966). An objective reality, standardised and measured by chronometers, judges and standards. A subjective reality, sensitive, built by individual experiences, interconnected

within subcultures. In this way, subcultures form "secondary socialization" spaces (Berger and Luckmann, 1966). On a micro-sociological scale, they play a role in the structure of society.

Athletes can be motivated by internal or external factors, or a combination of both, which may vary by context and time. According to Thill and Vallerand (1993) "The concept of motivation is the hypothetical construction used to describe the internal and/or external forces that produce the initiation, direction, intensity and persistence of behaviour." The Self-Determination Theory (Deci and Ryan, 1985), which addresses the why of behaviour, describes two types of motivation: intrinsic and extrinsic motivation. Intrinsic motivations are those that come from within. Extrinsic motivations are related to external factors. We believed that each of these two types of motivation may be influenced by the familial environments of the athletes.

Intrinsic Motivation

Intrinsic motivation (IM) refers to engaging in an activity purely for the pleasure and satisfaction derived from doing the activity (Deci and Ryan, 1985). Intrinsic motivation is considered the highest level of self-determined motivation that an individual can reach. Intrinsic motivation is defined as the tendency to engage in an activity for the pleasure and the satisfaction obtained from the activity, and not by rewards and external pressure (Deci, 1975). Literature presents three types of intrinsic motivations studied independently. Intrinsic motivation toward accomplishments relates to the desire to do an activity for the satisfaction and pleasure of the activity. Intrinsic motivation to know is that of the individual who practices an activity for the satisfaction and pleasure to learn, discover and explore new things. Intrinsic motivation to experience stimulation refers to doing an activity to feel specific sensations of excitement and pleasure (Csikszentmihalyi, 1978).

Extrinsic Motivation

Extrinsic motivation (EM) is related to external factors. It occurs when an individual seeks to get something in exchange for the activity (Deci, 1975). The activity is not performed for the pleasure it brings, but for instrumental reasons. According to Deci and Ryan (1985), there is three types of extrinsic motivations. These three types are on a continuum of self-determined motivation. Identification implies an awareness of the individual's interest in his/her activity. He/she not only feels satisfaction, but a need to do it. This choice is made freely. Introjection involves the individual's internalisation. This influences his/her behaviour and actions. The individual internalises external restrictions. Not doing the activity makes him feel pressure or guilt. Finally, external regulation implies that an individual is motivated by external elements such as rewards or punishments.

Amotivation

Amotivation is linked with the concept of "learned helplessness" (Abramson et al., 1978). It is the lack of self-determined motivation in the individual. An amotivated individual may perform an activity but constantly questions his involvement and may abandon the activity.

Motivation leads to persistent sport participation which in turn leads to good health. All healthy adults aged 18–65 years should aim to take part in at least 150 min of moderate-intensity aerobic activity each week. Children and young people aged 5–16 years should accumulate at least 60 min of moderate-to-vigorous-intensity aerobic activity per day, including vigorous-intensity aerobic activities that improve bone density and muscle strength (O'Donovan et al., 2010). However, adolescents' participation and motivation to participate in sports and physical activities decreased significantly over the past years in France (Recours et al., 2011). In track and field, the level of performance is objectively measurable (Schotté, 2012). The national athletic federations (FFA) defines the athlete's level of expertise by referring to the performance chart (2018). For example, if a sprinter realizes 100m in 10"20 and less he/she will have an international level, between 10"21 et 10"94 a national level, between 10"95 et 11"54 an inter-regional level, between 11"55 et 12"44 a regional level and 12"45 and more a departmental level. Then we also identified the level of expertise (given by the FFA) and the number of hours dedicated by athletes as dependant variables.

Familial and Independent Variables

Family Variables (Grand-Parents, Parents, Siblings and Cousins)

Various publications (Bonvalet, 1993; Durkheim, 1921) focus on family zones or circles. They are usually presented as a more or less close relationship circle. Scientific literature on the subject has allowed us to identify two circles. The closest "nuclear family" includes couples, with direct descendants. The most distant "extended family" includes uncles, aunts, and cousins.

Parents may be the most influent "significant others" which influence sporting careers (Bloom, 1985; Durand-Bush, 2000; Lefèvre, 2010; Van Rossum, 1995). The literature (Smoll, 1998; Bois and Sarrazin, 2006; Octobre, and Jauneau, 2008) shows that they often choose the physical activity for their child, above all when they were engaged in this activity in the past.

Sibling relationships have been relatively neglected by researchers studying close relationships. However, they are a fixture in the family lives of children and adolescents. They are companions, confidantes, combatants, and the focus of social comparisons (McHale et al., 2012). Siblings can have direct effects on one another's development when they serve as social partners and role models. Siblings can influence one another indirectly by virtue of their impact on larger family dynamics—such as by serving as building blocks of the family structure, holding a favoured family niche, or diluting family resources (McHale et al., 2006).

In the past, grandparents and their collateral descendants (uncles, aunts, and cousins) were present within families. Parents and children often had to resort for their help in case of problems. Nowadays with greater social mobility (Vallet, 1999) a faster pace of life, family pluralism (Roy, 2011) increasingly present, members of the extended family circle have less contact with family members (Bagby and Purnell, 1993). Even though various studies (Bloss, 1999; Milan and Hamm, 2003) show the importance of the role of grandparents (they are

examples of life, role-models, and it is through them that traditions and family values are transmitted), this results in their isolation (UDAFC, 2006). Thus, we identified as independent variables the number of grand-parents, parents, sibling and cousins practising the same sporting activity.

Control Variables (Gender, Age, Social Status)

Athletes are very different from each other, depending on their gender, age, social status and family status (Lassalle, et al., 2016). Motivations vary according to gender (Andreu, et al., 2005; Boisvert, 2010; Meece et al., 2006). Scientific literature also highlights the impact of age on the motivations of individuals (Mullin et al., 2007). This is a qualitative change in the motivation to perform and to take an interest in sporting events, rather than an overall and quantitative decline of motivation with age. Because of cultural heritage and social reproduction (Bourdieu, 1984), motivations may also vary according to social status and cultural capital. Bourdieu used the notion of habitus to explain this phenomenon. The middle classes, for example, may practise physical activity in an instrumental way: to gain, or to achieve. In a similar direction, the study of Annette Lareau (1987) suggests that the concept of cultural capital can be used fruitfully to understand social class differences in children's experiences. We believed that each of these factors might contribute to the motivations of athletes, and thus, we identified them as control variables.

Research Questions and Hypotheses

What is the influence of family when the same sporting activity is practiced by parents, children, cousins or grandparents? Does it have an impact on sporting involvement (time dedicated), motivations and expertise of participants?

H1: Athletes will be more *motivated* if other family members are practising the same sport.

H1: Athletes will be more *involved* if other family members are practising the same sport.

H3: Athletes will be more *successful* if other family members are practising the same sport.

METHODS

Instruments

A questionnaire was administrated to a group of track and field athletes (licence holders of the FFA). The first section of the questionnaire was related to sociodemographic profiles and athletes' habits. In the second part we assessed the Sports Motivation Scale (SMS-28) which consists of seven subscales measuring three types of intrinsic motivation (intrinsic motivation toward knowledge, accomplishment and stimulation), three types of extrinsic motivation (identification, introjection and external regulation) and amotivation (Brière, et al., 1995). Each subscale consists of four items.

The SMS has adequate levels of validity and reliability. This instrument is also considered to be effective in terms of factor structure (Biddle and Mutrie, 2007; Vallerand, 1997), and has been used widely by researchers to study various populations (e.g., in handball players, tennis players, rugby players, surfers, athletes), in various countries (Canada, USA, Bulgaria, Greece, England, Netherland, France, China), and in various contexts (in elite athletes and physical education).

Pretest of Instrument

Because the SMS is a validated scale, we only tested the first part of the questionnaire on a group of 20 students enrolled in an Athletic Club of Southern France and in the University of Montpellier. The aim was to ensure that all the questions would be easily understood by the target audience. After administration of the questionnaire, the subjects were interviewed in order to get comments on words or misunderstood questions. The new version of the questionnaire was formatted and administered to the sample.

Participants

To question the track and field athletes, we first thought to administer the questionnaire in stadiums, at the place they practiced the sport. However, we felt that group dynamics and sensations or emotions generated by training or competition could influence and bias the results. In addition, we did not want that respondents feeling compelled to respond and complete the questionnaire in a hurry without applying the necessary interest and concentration.

The questionnaire was sent out by email to 700 coaches (out of the 1,500 graduates, referenced by the French Athletics Federation, all categories of age) in five major regions of athletic leagues in France (Languedoc-Roussillon, Pyrénées-Orientales, Britain, Aquitaine, Rhone-Alpes), nine departmental committees (13; 29; 30; 34; 38; 35; 37; 59; 63) and 32 athletic clubs (ASPTT Grenoble; Cevennes Ales Athletics; Athletics Lunel; Carpentras Athletics;. . .). The coaches were asked to forward the email with the survey link to athletes. Regional athletic leagues, Departmental Committees and clubs have aired the survey link on their websites and social networks.

A large number of studies (Hays and McCallum, 2005; Mangunkusumo et al., 2005) show that there is very little difference (if any) between questionnaires administered by computer and those administered on paper. Where ever differences exist, computer studies turn out to be more accurate than paper studies. In fact, electronic administration also helps limit the influence of the researcher or other respondents (whose answers could be cognitively affected in a head-to-head situation), especially if the questions relate to his privacy or he considers his answers confidential (Brener et al., 2003). Therefore, participants completed the study online. We used the Eval & Go platform which allows to restrict respondents to a single answer per IP address, which prevents multiple responses from the same individual. We administered the questionnaire over a period of five weeks. Incomplete answers were removed from the analysis.

Statistical Analyses

Variables were coded in order to process the data using STATISTICA software. Next, factor analyses, t-test and Anovas were carried out. We included a multiple linear regression analyse to give clearer and more detailed results. The selected significance level for all analyses were $p < 0.05$.

RESULTS

Among the 1651 athletes who responded to the survey, 519 gave partial (they didn't entirely complete the questionnaire) or incoherent responses (for example: "I am training two hours per week" and "I have an International level"). We eliminated these respondents from the study before conducting the analyses to reduce noise and increase the data reliability. As a consequence of this, the analyses resulted in a 68.56 percent (N = 1132) response rate, 1.03% of the total population (aged between 13 and 60 years) of track and field athletes in France.

Descriptive Results and Control Variables

Our sample comprised 420 females (37.01%) and 712 males (62.99%) of all athletic disciplines. The highest age group, with 356 respondents, is that of the under 25s (SD = 3.55), whereas the 56 and overs are the lowest with only 45 individuals (SD = 3.55). The average age is 31.25 years (SD = 13.38). As for the other variables, results are presented in Table 1.

149 respondents (13.36%) have a lower degree than French baccalaureate[1], 211 (18.90%) have a French baccalaureate, 756 (67.74%) have a higher degree than the French baccalaureate (i.e., a university degree). As for the respondents' status, 353 (31.69%) are still in school, 688 (61.75%) salaried employees with an average salary of € 25,740.43 (SD = 36507.92), 48 (4.31%) are retired and 25 (2.25 %) are unemployed. Just over half (613, i.e., 54.15%) of the respondents have no close or extended family member who practices track and field events. For 519 (45.85%) athletes who do have athletes in their families, 225 have at least one athletic parent, 287 a brother or sister, 96 a cousin and 9 have athletic grandparents.

Family Influence on Sports Motivations

All Cronbach's alphas of the Sports Motivation Scale scored between 0.74 and 0.90. This means, items within each dimension were associated but not redundant. The multiple regression analyses (Table 2) revealed that an athlete's motivation to practice a sport (Figure 1) is influenced by athletes present in his/her own family. An athlete from an athletic family will have stronger intrinsic motivations than that of an athlete with no athletic family members: intrinsic motivation toward knowledge [$t(869) = 2.89$, $p < 0.01$], and intrinsic motivation toward accomplishment [$t(868) = 3.99$, $p < 0.01$]. An athlete from a family of athletes has an extrinsic identified regulation [$t(868) = 3.99$, $p < 0.01$] which is much more present.

[1] The equivalence of French baccalaureate in other countries: United Kingdom, A levels; United States of America, High School Diploma; Canada, High School Diploma; Quebec, Diplôme d'Études Collégiales.

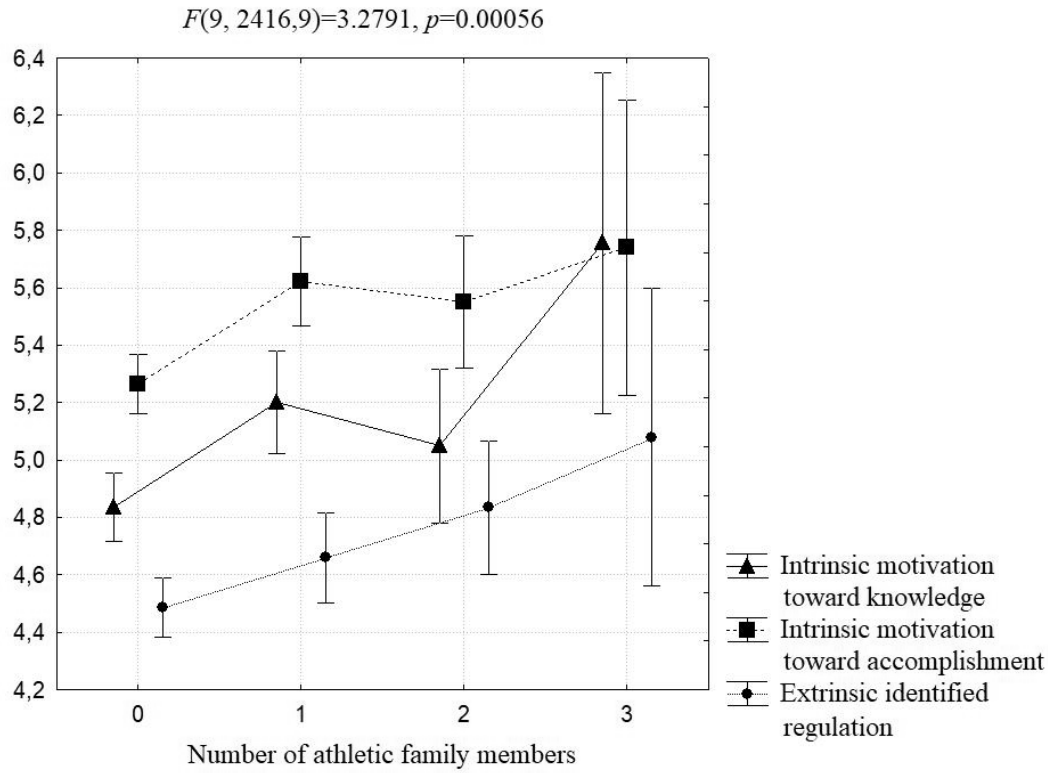
Table 1 : Descriptive results

	Numbers	Percentages
Men	712	62.99%
Women	420	37.01%
Average age	31.25	SD = 13.38
STATUS		
Students	353	31.69%
Artisans / farmers	40	3,59%
Workers / employees	236	21.18%
Intermediates	122	10.95%
Executives	290	26.03%
Retired	48	4.31%
Unemployed	25	2.25%
INCOME		
Average salary / year	25 740.43	SD = 36 507.92
PERSONS WHO HAVE A CLOSE RELATIVE PRACTICING ATHLETICS		
Parents	225	19.88%
Brothers / sisters	287	25.35%
Cousins	96	8.48%
Grand parents	9	0.80%
Other people	613	54.15%
LEVEL OF EXPERTISE		
Not classified	299	26.41%
Departmental level	218	19.26%
Regional level	240	21.20%
Inter-regional level	234	20.67%
National level	131	11.17%
International level	10	0.88%

Table 2 : Multiple Linear Regressions

	Multiple Linear Regression n#1 Intrinsic motivation toward knowledge				**Multiple Linear Regression n#2 Intrinsic motivation toward accomplishment**				**Multiple Linear Regression n#3 Identified regulation**		
	B	*t*(1125)	*P*-Value		*B*	*t*(1125)	*P*-Value		*B*	*t*(1125)	*P*-Value
Intersect of slope 'B'	-8.99	-1.00	0.31		16.15	2.07	**0.03**		12.18	1.55	0.11
Sex	0.08	0.97	0.33		-0.12	-1.72	0.08		-0.11	-1.58	0.11
Social status (profession)	0.05	2.95	**0.00**		0.02	1.46	0.14		0.04	2.80	**0.00**
NB family members	0.18	3.57	**0.00**		0.18	3.57	**0.00**		0.14	3.23	**0.00**
	$R^2 = 0.0193$ R^2 Adjusted = 0.0167 $F(3, 1129) = 7.42$ $p < 0.001$				$R^2 = 0.0159$ R^2 Adjusted = 0.0133 $F(3, 1129) = 6.11$ $p < 0.001$				$R^2 = 0.0193$ R^2 Adjusted = 0.0167 $F(3, 1129) = 7.44$ $p < 0.001$		

Figure 1. Family influence on sport motivations. The number of athletic family members, in addition to the athlete completing the questionnaire, is shown on the x-axis. The y-axis shows the motivations' score on a Likert Scale (from 1=I don't agree at all to 7= I totally agree).



In the nuclear family, the ones who are the more influential are the parents [t(1076) = 4.91, p < 0.001], followed by brothers and sisters [t(1076) = .78, p < 0.01]. In the extended family, results about the influence of cousins [t(1076) = 1.91, p = 0.5] and grandparents [t(1076) = 1.70, p = 0.8] show only tendencies.

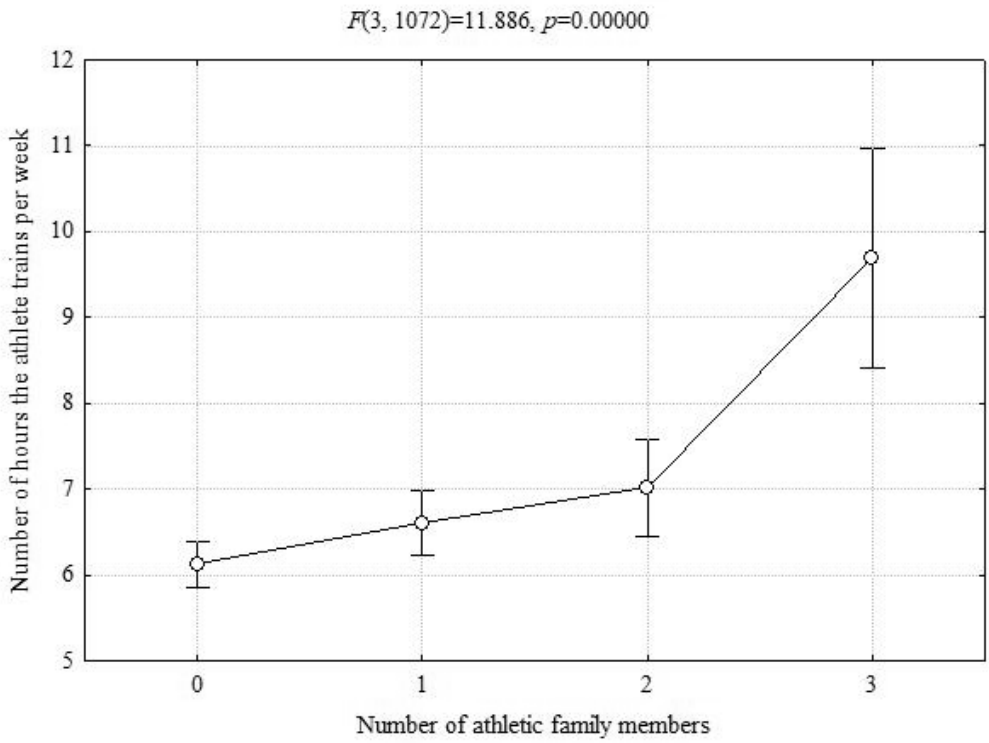
Being in the centre of a family of athletes helps maintain a certain amount of motivation in training. An athlete by himself has a tendency towards amotivation [t(868) = -1.65, p < 0.1]. He does not detect the links between actions and outcomes. He/she doubts his reasons for training and no longer sets himself objectives towards his/her results.

Family Influence on the Number of Hours Dedicated

The higher the number of athletic family members, the higher the number of hours the athletes dedicate to the sport increases [F(3, 1072) = 11.886, p < 0.001]. In fact, individuals who are

the only athletes in their families, train on average 6hrs20min, whereas athletes who have three or more athletic family members train much more with an average of 10hrs05min per week (Figure 2).

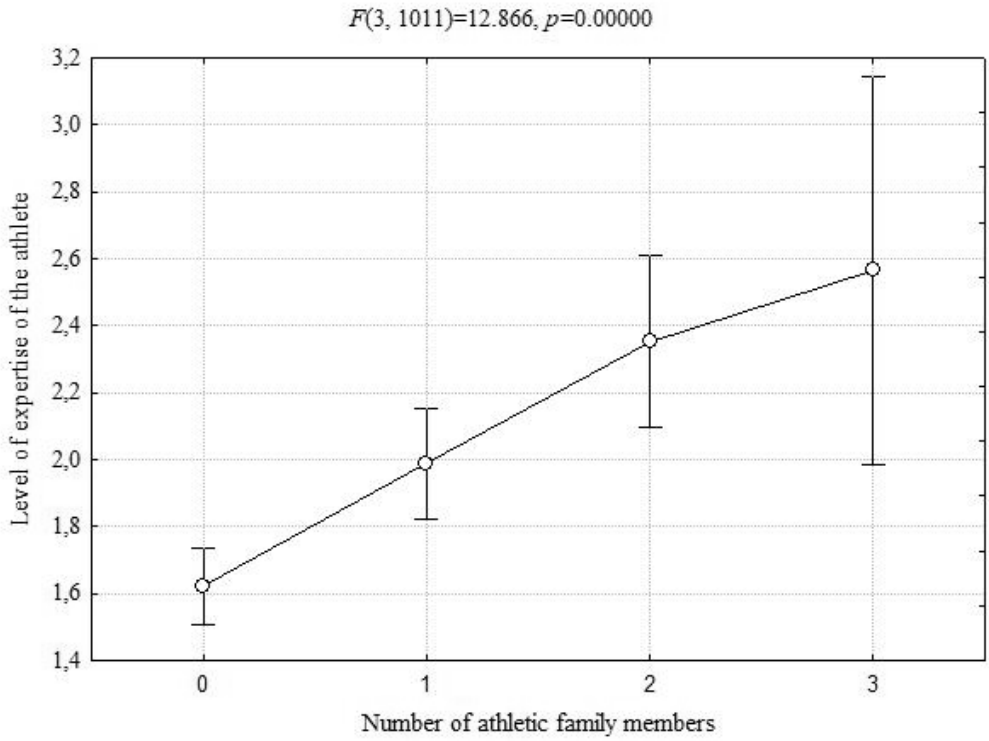
Figure 2. Family influence on the number of hours of training. The number of athletic family members, in addition to the athlete completing the questionnaire, is shown on the x-axis. The y-axis shows the number of hours the athlete trains per week.



Family Influence on the Level of Expertise

Similarly, the more athletic family members, the more the level of expertise increases [$F(3, 1011) = 12.866$, $p < 0.001$]. Actually, individuals who are the only athletes in their families, usually have a Departmental level of expertise. While athletes who have three or more athletes in their family have a level of expertise close to an Inter-Regional level (Figure 3).

Figure 3. Family influence on the level of expertise. The number of athletic family members, in addition to the athlete completing the questionnaire, is shown on the x-axis. The y-axis shows the level of expertise of the athlete (0 = No rated; 1 = Departmental; 2 = Regional; 3 = Inter-regional; 4 = National; and 5 = International).



DISCUSSION

If the size of the sample is relatively important in this study, descriptive results do not match up to the general French population. For example, two-thirds of this sample are male. Nevertheless, this result is consistent with recent studies showing that men enter competitions more than women (Muller, 2006; FFA, 2014). Furthermore, two-thirds of the sample are highly educated. This is also consistent with studies (Lassalle et al., 2018) showing that if sprint and middle-distance races are associated with the dominated classes, long-distance races are associated with the dominant classes (in the French Athletic Federation, long-distance runners are overrepresented). If links between gender/status/family and motivations are significant ($p < 0.05$), the adjusted R^2 of the multiple linear regressions are low (between 0.01 and 0.02). This latter result is due to the important dispersion generated by the control variables (sex and profession).

The Influence of the Nuclear Athletic Family

Quantitatively, practicing a sport in a nuclear family circle allows for a higher level of expertise. According to Boudon (1973) an individual tries to optimize his social position, in other words, to withdraw benefit. Behaviour and decisions of an individual are modified by social background. The concept of transmission or cultural heritage highlighted by Bourdieu and Passeron (1964) towards academic and professional success also exists in athletics and has a significant impact on the level of athletes. Many researchers show that: 1) families have a role in the development of sport expertise; 2) as well as the fact that elite athletes are often from "athletic" families; and 3) that an athlete in the family or someone practicing the same sport is a factor favouring the development of sporting excellence (Collins and Buller, 2003; Kay, 2000; Roderick, 2006). Therefore, the results of this study are in the same line.

Qualitatively, the results show that practicing the same sport as a family member affects motivations towards doing it (H1). Indeed, in addition to having an influence on the level of training (H2), the nuclear family circle (when other members practice the same physical activity) has a strong impact on motivation especially on intrinsic motivations of athletes that are defined by just doing the activity, for the pleasure of taking part, for the satisfaction felt and in the absence of external contingencies. An athlete will practice athletics for the fun and satisfaction he feels when he learns something new, for example, a technical gesture. He/she is more eager for knowledge than other athletes. This is due to the curiosity that develops within an athletic family.

Piaget (1980) already showed that the family sphere is a place conducive to the development of curiosity, and that doing activities and projects related to a common interest plays a positive role in children. For example, an athlete from a family circle practicing the same activity could seek accomplishment by launching new challenges like trying out shot putting: the athlete is focused on the process and not on the result of this achievement. The shot putter trains towards throwing in rotation for the simple pleasure of doing so. Family background plays an important role since it is a beneficial environment in which the athlete wants to fulfil himself. The urge is passed down to him by family circle practicing the same activity, and to which he belongs.

These qualitative differences may in turn influence the quantitative aspect seen above. Self-determined intrinsic motivations are important towards the number of hours of training. Athletes from a family circle practicing the same activity train more. This can be explained by motivation / the desire of athletes to learn, to improve or to learn more about their sport.

In the world of sport, athletes and coaches are engaged in an activity of uncertain outcome in which they have a great deal of emotional investment. Secure relationships among family members foster exploration, learning, self-efficacy, and social development in a host of ways delineated in developmental theory (e.g., Bandura, 1997; Bowlby, 1969,1982; Cassidy and Shaver, 2008) and family theory (Goldenberg and Goldenberg, 2013; Walsh, 2006, 2011).

Secure attachment relationships serve to regulate arousal and stress in children. Biological stress responses of young children to a frightening stimulus will be attenuated by proximity to

the secure-base figure (Gunnar and Quevedo, 2007). Mental confidence and feelings of assurance often makes the difference between success and failure at the highest levels of athletic competitions.

If athletes with athletic parents train more and reach a higher level (H3), it is maybe because through those close to them, they get through moments of doubt and inherent second guessing towards the difficult progression in athletics much easier. Parents, brothers who have been there, done that, know that you must get through these moments to excel. They maybe find the right words, better than if they were inexperienced or naive regarding athletics, and therefore avoid amotivation in their children. These results are in line with Bourdieu (1980): here we find the notion of habitus that the family circle participates in moulding. More scholarly research is needed to better understand the effects of familial networks on motivation.

The Influence of Extended Family Circle

Unlike the close family circle, the extended family circle has very little influence on athletes. This is due to social mobility of its members, as well as family pluralism with new family models manufactured by contemporary society. Due to the increase in divorces in France, new forms of family have created new types of families such as single-parent, step-families and LGBT families (Dechaux, 2009; Roy, 2011). This family pluralism means that everyone - including athletes - is less and less in contact with their extended family circle. Distance, along with not having or having very little relationship with that family circle less influences on motivations to engage in activities.

Our results are in line with those of other authors (Cloutier, 1999; Saint-Jacques et al., 2005). Athletes from such families may experience more difficulties having contact with their extended family circle than athletes from a close, traditional or tight-knit family. It must be more difficult for athletes from these new family situations to have a person of the extended family circle (or not close) practicing the same sport as them.

However, the trial does not allow us to affirm with certainty, that there is no influence at all from the extended family circle on sport motivation. This study has two limitations to be taken into account in the interpretation of our results. First of all, where the size of the trial is relatively large (1132 respondents), the proportion of athletic grandparents is too small, preventing any generalizable results regarding the extended family circle. Then, although our study reveals the frequency of training frequency and makes it possible to link the influence that family can have on the sports motivation of an athlete, a qualitative study would enable a better understanding of the mechanisms that make a career in the sports world possible (Lévy and Wacquant, 2002). Further research should focus on these queries.

CONCLUSION

This study led us to look into the influence of family circles practicing the same sport on the performance and motivation of the track and field athletes. These athletes have continuous cultural heritage. The close family circle plays an important role in the intrinsic motivation

towards athletics. Athletes from those families tend to take to the activity as a game. In a way, they seem to have learned, from an early age, to practice athletics for fun. They gain more enjoyment on an intrinsic level, than other athletes. This specific feature is beneficial to them since they train more and therefore their levels of expertise are higher. Values regarding brotherhood, sharing and solidarity obviously stem from family relations. The spirit of athletics is consistent with these family ethics.

These results contradict those who, with a more individualistic approach, defend the idea that the best athletes are built alone and in adversity. In his two books, "Les vilains petits canards" and "Un merveilleux malheur", Cyrulnik (2001) states (in particular taking the example of Marcel Desailly, former defender of the French football team) that these are the cracks of life that make a champion. Examples such as Marcel Desailly exist but are not standard. Imagination builds reality while pulling away from it. This is what Recours (2006) explains through the image "la fleur et le fumier" when he evokes the picture that adolescents have of football player Pelé. They often think that Pelé built himself up, in a favela in Brazil, while the reality refutes this hypothesis: his father was, just as himself, a professional footballer.

The cross-sectional data is not able to show whether athletes with participating family become stronger athletes, or whether families of stronger athletes are pulled into participation. Nevertheless, if athletes are often incorrectly described by the media and seen by the public as "lone rangers," their success is probably related to many social factors. African tales and legends say that "the more a tree is high, the more its roots are deep." Since Renaud Lavillenie built a vaulting pit in the family garden (seen on Facebook, Youtube and Google Images), we can imagine that the day he has a child of his own, the close family circle will offer him a jumping pole to perpetuate the tradition of the elders. Further research could be made on other sports to confirm the parental influences on their children's sports careers.

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