

Sexual Violence Experienced in the Sport Context by a Representative Sample of Quebec Adolescents

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Abstract

This is the first study to report the prevalence of sexual violence perpetrated by a sport coach within a representative sample of the general population of adolescents aged between 14 and 17 years ($N = 6\,450$). The questionnaire administered in high schools includes self-reported measures on a variety of dimensions relevant to the study of victimization, including sexual abuse, sexual contacts perceived as consensual, sexual harassment and involvement in an organized sport context. Descriptive and chi-square analyses were performed. The results show that 0.5% of adolescents experienced sexual abuse involving a coach. When considering all adolescents who experienced sexual abuse in their lifetime (10.2%), it appears that 5.3% of them were victims of sexual abuse by a coach. Participants also reported experiencing sexual harassment from a coach (0.4%) and consensual sexual contacts (1.2%) with a coach in the 12 months preceding the study. Questions are raised on the overrepresentation of boys in situations of sexual victimization experiences in an organized sport context.

Keywords

sexual abuse; sexual harassment; sexual relations; athletes; prevalence

Introduction

For several years now, the scientific community has been trying to better understand the phenomenon of sexual violence. Sexual abuse of children and youth under the age of 18 years and sexual harassment are two forms of sexual violence that have received increasing attention in recent years. In their systematic review and meta-analysis about the prevalence of child sexual abuse worldwide, Barth, Bermetz, Heim, Trelle, and Tonia (2012) concluded that sexual abuse affects between 8 and 31% of girls and between 3 and 17% of boys. In Quebec, the retrospective study of Hébert, Tourigny, Cyr, McDuff, and Joly (2009) shows

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that the prevalence of sexual abuse experienced in childhood (or before the age of 18) is 22.1% for women and 9.7% for men.

Sexual Abuse in Sport

In sport, the prevalence of sexual abuse of minors varies between 2 and 10% (Alexander, Stafford, & Lewis, 2011; Kirby & Greaves, 1997; Leahy, Pretty, & Tenenbaum, 2002; Toftegaard Nielsen, 2001). Estimates appear similar across different countries. Kirby and Greaves (1997) reported that 1.9% of 266 adult male and female Canadian elite athletes were sexually abused in the sport environment before the age of 16 years. In Denmark, Toftegaard Nielsen (2001) concluded that 2% of male and female physical education students were sexually abused by a coach before the age of 18 years. In Great Britain, Alexander et al. (2011) questioned 6 060 athletes aged between 18 and 22 years and reported that 3% experienced sexual abuse before the age of 18 years. In this study, the perpetrators were not only coaches but also athlete peers and others involved in the sport organizations. The prevalence fell to 0.3% if only sexual abuse committed by coaches or other adults involved in the sport organizations was considered. Finally, the study by Leahy et al. (2002) conducted among 370 adult male and female Australian athletes indicated that the prevalence of sexual abuse experienced before the age of 18 years from a member of the sport staff was 9.7%.

In terms of possible gender differences, Alexander et al. (2011) reported that boys (4.7%) were more often victims of sexual abuse than girls (2.1%). However, the authors did not specify whether this difference was statistically significant or not. Furthermore, this prevalence also takes into account abuse perpetrated by athlete peers. If we focus only on sexual abuse committed by coaches or adults involved in the sport organizations, female athletes were most affected by this problem (Kirby & Greaves, 1997; Leahy et al., 2002). However, the observed rates in all these studies remain questionable as they are based on non-representative samples and samples in which boys and men were generally under-represented. In addition, response rates were low, especially for boys. For example, the sample from Alexander et al. (2011) consisted of 73% women and 27% men. That of Kirby and Greaves (1997) consisted of 55.6% women and 44.4% men, but the women were over-represented because in reality, only 30 to 35% of the national team athletes were women. Therefore, the findings in terms of gender are not definitive.

As the research designs were different (perpetrator, sample characteristics, etc.), it is also difficult to compare studies presented above. Moreover, the definition of sexual abuse used is another important methodological issue to consider. Alexander et al. (2011) defined sexual abuse as a sexual activity for which consent is not or cannot be given. Kirby and Graves (1997) report sexual abuse and sexual assault separately. Toftegaard Nielsen (2001) used the continuum of sexual exploitation (Brackenridge, 2001) where sexual abuse was considered the most severe form of sexual harassment. Leahy et al. (2002) used the current Australian legal definition of sexual abuse. The latter seems to cover a wider range of behaviours that are considered sexual abuse. For example, in their study Leahy and al. included sexual abuse without contact, i.e., exposure to sexual acts, which the other studies did not consider.

Sexual Contacts Perceived as Consensual With a Coach

It is impossible at this time to know whether the data regarding sexual abuse in sport is a true reflection of what young athletes experience. Indeed, over the past few years, some authors reported behaviours and perceptions of young athletes that indicate these figures may reflect an underestimation of the problem (Kirby & Greaves, 1997; Toftegaard Nielsen, 2010). These researchers documented the presence of intimate or sexual relationships between young athletes and their coaches and that some athletes did not perceive this kind of relationship as sexual abuse (Kirby & Greaves, 1997; Toftegaard Nielsen, 2001, 2010). Furthermore, many athletes who have experienced sexual abuse do not see themselves as victims as they may consider such behavior to be normal in sport (Stirling & Kerr, 2009). It is therefore possible that these circumstances of sexual abuse would not be self-reported in questionnaires that document the prevalence of this phenomenon among young athletes.

Several authors refer to an important discrepancy between what athletes consider acceptable and unacceptable behaviour on behalf of the coach, leaving a noteworthy amount of ambiguity surrounding this issue. For example, Toftegaard Nielsen (2001) questioned 207 coaches regarding their intimate relationships with athletes. In this study, 20% of coaches admitted to having sexual relations with adult athletes (older than 18 years of age), whereas 2.9% admitted to having such relations with athletes who were minors (less than 18 years of age). In the same study, 19% of coaches felt sexually or emotionally attracted to athletes under their supervision and only 50% of coaches were knowledgeable of the laws in their country regarding the legal age of consent for sexual activity when the relationship is one of authority.

Other studies tend to confirm these findings. Indeed, Toftegaard Nielsen (2010) indicated that 31% of athletes reported having had intimate relations with their coach, some of which occurred during childhood (0.5% before the age of 13 years) and during adolescence (8% between the ages of 13 and 17 years). The author defined intimate relations as “a close emotional/physical relationship with a coach, in which the two parties typically refer to each other as boyfriend or girlfriend” (Toftegaard Nielsen, 2010, p.94). There was no significant difference between boys and girls; however, as the response rate for men was very low in this study (30% for men versus 75% for women), it remains risky to conclude to a lack of gender difference. Toftegaard Nielsen (2010) also lingered to document the perceptions of the young athletes who experienced these relations with their coach. He noted that 56% of the young athletes who experienced this situation during childhood considered it as positive whereas 33% considered it acceptable, depending on the context while only 11% considered it negative. In examining responses from adolescents, the authors report that 26% considered it positive, 53% positive depending on the context while 21% considered it negative. A Canadian study also addressed the issue of coach-athlete sexual relationships (Kirby & Greaves, 1997). According to the authors, 2.3% of the athletes experienced their first sexual relationship with their coach and 21.8% reported having sexual relations with a person in a position of authority in sport. However, in both cases, the age of the athletes was not specified.

In light of these results, Toftegaard Nielsen (2010) and Kirby and Greaves (1997) argued that athletes appear to have a certain degree of tolerance toward intimate relationships with

their coaches. These figures are alarming if we consider the fact that many of these behaviours are clearly criminal acts from the part of the adults. Indeed, under Canadian law, the legal age of consent for sexual intercourse is 16 years (Canadian criminal code, 2013). In the case of sexual relations between an adolescent (16–17 years of age) and an adult in position of authority, the consent cannot be invoked. That means that usually, an 16–17 years old adolescent can consent to sexual relations, but when there is a relation of authority between the adolescent and the adult, this relationship is considered as sexual exploitation of adolescents and as a result, the consent can't be invoked (Canadian criminal code, 2013).

Sexual Harassment by a Coach

Sexual harassment in sport has also received its fair share of attention from the scientific community. However, few studies have documented the phenomenon specifically in minor athletes. Most studies questioned adult athletes or simply did not analyse the results in terms of the age of the participants (eg.: Fasting, Chroni, Hervik, & Knorre, 2011; Gündüz, Sunay, & Koz, 2007). Moreover, perpetrators of sexual harassment were specified in certain cases (Fasting, Chroni, & Knorre, 2014 ; Vanden Auweele et al., 2008), but not in others (Fasting et al., 2011). Alexander et al. (2011) documented the sexual harassment experiences exclusively among minor athletes through a retrospective study. They observed a total prevalence of 29% attributable to various perpetrators, such as peer athletes or adults involved in the sports organization. Six percent (6.2%) of the total sample reported having experienced sexual harassment by a coach. Fasting, Brackenridge, and Sundgot-Borgen (2003) questioned female athletes between 15 and 18 years old and reported that 46% of them were sexually harassed in sport by a man and that 17% were sexually harassed by a man in a position of authority in sport.

In other studies with samples of either adult and minor athletes or only adult athletes, the prevalence of sexual harassment varies greatly. Indeed, while one study report a rate as low as 3% (Décamps et al., 2009), another reported a much higher rate of 52% (Fasting, Brackenridge, & Sundgot-Borgen, 2004). The study populations could explain these variations. For example, many studies focused only on female athletes (eg.: Chroni & Fasting, 2009; Fasting et al., 2014; Vanden Auweele et al., 2008), while a few others also included male athletes (Alexander and al., 2011; Décamps et al., 2009). Décamps et al. (2009) have shown that 3.4% of boys whereas 4.3% of girls were sexually harassed. This difference was non significant according to the authors, which suggests that boys may experience as much sexual harassment in sport as girls. Importantly, these figures relate to sexual harassment by various perpetrators, not only coaches. In contrast, the study of Alexander et al. (2011) confirmed the endured hypothesis that a greater percent of female athletes than male athletes are victims of sexual harassment, with a prevalence of 34% for the former and 17% for the latter (a significant difference). However, the authors did not provide a gender-stratified analysis in regards to the type of perpetrator.

The Present Study

Despite the growing interest of researching sexual violence in sport, we can observe significant methodological flaws in existing studies, including a lack of statistical representativeness and low response rates (varies between less than 1% to 73% with a mean

of 33.5%), especially with regard to male athletes. In addition, these studies have, in almost all cases, used a retrospective design whereby adults were interviewed about their experience with sexual violence throughout their athletic careers. Few studies questioned the minors directly, and these studies remain scarce. The data also cover a wide variety of populations (e.g., physical education students, elite athletes, recreational athletes), which renders comparisons across studies hazardous. Furthermore, the operational definitions are often inconsistent across studies. For example, some studies include sexual abuse within the concept of sexual harassment whereas others differentiate the two concepts. It is therefore difficult to obtain an accurate picture of the prevalence of sexual violence in sport. Also, some studies identify the perpetrator of the abuse or harassment while others are more general, again limiting the comprehension of the phenomenon. In light of these methodological shortcomings, it seems risky to conclude with certainty as to the prevalence of the phenomenon.

The present study aimed to document the prevalence of sexual violence (sexual abuse and sexual harassment separately) perpetrated by a coach in a representative sample of students aged 14 to 17 years, but also to document the prevalence of this sexual violence specifically among adolescents involved in organized sport. The study also aimed to document the prevalence of sexual contacts perceived as consensual with a coach by the sexually active adolescents of the sample (athletes and non athletes). To our knowledge, this is the first study to focus on the prevalence of sexual victimization in sport in a representative sample of a population of male and female adolescents aged between 14 and 17 years. Our study overcomes some methodological limitations observed in past studies and discussed earlier (eg.: sample representativeness, response rate).

Method

Sample and Procedure

Data for this study was drawn from the first wave of the *Quebec Youths' Romantic Relationships* survey. The research ethic boards of the Université du Québec à Montréal approved this project and written informed consent was obtained from each participant and from the school director. A total of 8 194 teenagers, enrolled in secondary 3 to 5 (Grade 10–11–12) and selected through a one-stage stratified cluster sampling of 34 Province of Quebec high schools responded to a written questionnaire distributed in class by trained assessors. Thirty-six participants were excluded for missing or invalid data. The final sample ($N = 8\,194$) includes 56.3% girls and 43.7% boys, ranging in age from 14 to 19 years ($M = 15.4$ years old). Of the respondents, 88.8% reported French as the main language spoken at home and that 78.9% of their mothers and 87.1% of their fathers were presently employed. Close to half of the participants (50.5%) lived with both parents, while 40.9% lived either in single-parent families or in shared custody and 7.8% described another family arrangement (living with a member of the extended family, in foster care, etc.). Participants were given a sample weight to correct biases in the non-proportionality of the schools sample compared to the target population and a complex sample was used with 9 strata reflecting language (French, English), school size and socio-economic status. In consequence, results with complex sample present decimals. The weighted sample is 6 450 participants. The response

rate was nearly 100% and the rate of partial non-response was less than 3.5%, so no additional adjustment was made. In fact, missing data are less than 5% so biases and loss of power are both likely to be inconsequential (Graham, 2009; Tabachnick & Fidell, 2013), moreover analyses of the nature of partial non-response did not show the presence of a specific pattern of non-response.

Measures

The questionnaire included sociodemographics measures (i.e., age (in years), gender, child and parent educational level, region of residence, immigration status, language spoken at home, parental occupation, family structure) and self-reported measures on a variety of dimensions relevant to the study of victimization, including the measures described below. One part of the questionnaire assessed sexual victimization experiences during lifetime, and the other part assessed sexual victimization in the past 12 months.

Sexual abuse—Two questions derived from measures used in past surveys (Finkelhor, Hotaling, Lewis, & Smith, 1990; Tourigny, Hébert, Joly, Cyr, & Baril, 2008) evaluated the presence of unwanted sexual contacts occurring in the course of their lives. The first assessed contact without penetration (e.g., fondling, touching) “Have you ever been touched sexually when you did not want to, or have you ever been manipulated, blackmailed, or physically forced to touch sexually...” and was responded on a dichotomous scale (1 = *Yes* and 2 = *No*) for each of the following perpetrators: A. a member of your immediate or extended family, B. a sports trainer (e.g., coach, assistant-coach), C. a person outside your family that you knew (other than a boyfriend or girlfriend) and D. a stranger. The second question referred to contact with penetration (i.e. oral, anal or vaginal) “Excluding the sexual touching mentioned in the previous item, has anyone ever used manipulation, blackmail, or physical force, to force or obligate you to have sex (including all sexual activities involving oral, vaginal or anal penetration) with...” and was responded as the first question (questions: E., F., G. and H.). The sexual abuse measure specifically excluded sexual victimization involving a romantic partner. All these items were summed to obtain a score of sexual abuse without consideration to perpetrators and types of sexual contact and answers were coded as 1 for the presence of sexual abuse and 0 for no abuse. Questions B. and F. respectively represent unwanted sexual contact without or with penetration with a coach and these were analysed separately.

Sexual contacts perceived as consensual with a coach—By law, the behaviours considered in this paragraph cannot be interpreted as involving consent. They are thus named ‘perceived’ consensual behaviours because they are reported as such by the adolescent. One question evaluated consenting sexual contacts with a coach among sexually active young in the past 12 months. The general question was “While keeping in mind the last 12 months, please answer the questions in the table below for each category of people with whom you have engaged in consensual sexual contact”. Eight items were assessed the type of partner, e.g. someone met on internet, a friend, a coach. For each of these sexual partners, the participant had to indicate the type of contact (without or with penetration), since when they knew each other (just met, between a couple of days and one month, more than a month), frequency of sexual contacts (only once or more than once) and age

difference with the sexual partner (0 to 2 years, 3 to 4 years and 5 years or more). Only contacts with a coach were considered in this study.

Sexual harassment—Three questions, derived from the *Sexual Experiences Questionnaire* (Fitzgerald et al., 1995) and measures used by Statistique Canada (2007), assessed the presence of sexual harassment in the past 12 months. The general question was “In the past 12 months, approximately how many times...” and items were the following: “A. ... were you personally treated unfairly because of your sexual orientation”, “B. ... have you had unwanted sexual comments, jokes or gestures directed at you” and “C. ... has a person, other than your girlfriend or boyfriend, touched, grabbed, pinched or brushed against you in a sexual way (while knowing you would probably object)”. Participants responded on an ordinal scale ranging from 0 = “Never” and 3 = “6 times or more” and had to indicate the person involved (students, ex-boyfriend or ex-girlfriend, friends, sports trainer (i.e. coach, assistant-coach), other adult, other). Only answers involving a coach were considered and were coded as 1 for “At least one time” and 0 for “Never”. The three questions were summed to obtain a general score of sexual harassment.

Involvement in organized sport—Involvement in organized sports was assessed using the following item: “Currently, do you play sports in an organized sports team (ex. club, league, etc.) which involves participating in competitions, matches or tournaments?”. It was responded on a dichotomous scale (1 = Yes and 2 = No).

Data Analysis

The present analysis will focus on the weighted sample of high school youths aged between 14 and 17 years old due to the topic of sexual abuse by authority figures, which implies participants younger than 18 years old (Canadian criminal code, 2013). Thus, prevalences estimates of sexual abuse in this article are slightly different from those of other publications of this survey, given the selected subsample (14–17 years old). Descriptive and chi-square analyses were performed using SPSS 21.0. The overall sample consists of all participants (aged between 14 and 17 years old) involved or not in organized sports ($N= 6\ 268.17$). They answered questions about presence of sexual abuse occurring in the course of their lives of all sources (interfamilial or extrafamilial excluding romantic partners), and then more exactly sexual abuse involving a coach. This same sample next answered questions about presence of sexual harassment by a coach in the past 12 months. A first subgroup of athletes consists of participants (aged between 14 and 17 years old) involved in organized sport at the time of the survey ($N= 2\ 707.40$). They also reported the presence of sexual abuse, sexual abuse by a coach, and of sexual harassment by a coach. A second subgroup is composed of youths involved or not in organized sport (aged between 14 and 17 years old) and sexually active who reported sexual contacts perceived as consensual in the past 12 months ($N= 2\ 198.55$). They had to point out if a coach was involved. A third subgroup is also composed of youths (aged between 14 and 17 years old) who reported sexual contacts perceived as consensual with a coach in the past 12 months, but were involved in organized sport at the time of the survey ($N= 1014.67$).

Results

Sexual Abuse

Without considering the source of the abuse (family member, coach, etc.) or the type of contact (penetration or not), 623.25 adolescents in the overall sample have been sexually abused (10.2%). The prevalence of sexual abuse among 14–17 years old Quebec students is thus 14.6% for girls and 3.9% for boys (see Table 1). Results indicate a significant difference between gender for sexual abuse ($p < .001$). The general odds of being sexually abused are 4.25 times higher for girls than boys. Prevalences for each gender are presented in Table 1. When analyzing the data for the athlete population, the prevalence (8.8%) is almost the same with 236.09 adolescents sexually abused (13.8% for girls and 3.2% for boys), with an odds of 4.78 times higher for girls than boys ($p < .001$).

Sexual Abuse by a Coach

In the overall sample, 32.75 adolescents have been sexually abused by a coach, therefore the prevalence of sexual abuse by a coach is 0.5% among Quebec adolescents (0.4% for girls and 0.7% for boys). Among them, 28.44 (0.5%) experienced fondling and 13.84 (0.2%) had intercourse. No significant difference was found for gender, neither on sexual abuse in general ($p = .40$) nor on each type of contact ($p = .50$; $p = .30$). Results are similar for athletes with prevalence for sexual abuse by a coach of 0.8% (0.7% for girls and 0.9% for boys) (fondling : $n = 17.38$, penetration: $n = 8.64$) with no gender differences ($p = .71$; $p = .67$; $p = .91$). In conclusion, in the overall sample, 32.75 cases of abuse are imputable to a coach on a total of 623.25, a ratio of 5.3%.

Sexual Contacts Perceived as Consensual With a Coach

Analyses were also conducted to examine sexual contacts perceived as consensual with a coach among adolescents involved or not in organized sports reporting consenting sexual acts in the past 12 months. The prevalence of sexual contacts perceived as consensual with a coach is 1.2% among 14–17 years old Quebec adolescents. In all, 27.02 reported such contacts and 18.29 were boys (67.7%) (see Figure 1). This difference is significant ($p = .002$), meaning that the odds of having sexual contacts perceived as consensual are 2.09 higher for boys than girls. The majority experienced fondling ($n = 19.94$; 61.9%) and a third, penetration ($n = 8.58$; 38.1%). Half had known the coach more than one month ($n = 10.30$; 52.5%), while a minority only ($n = 2.16$; 11.0%) had sexual contact with a coach they just met. Half had contact with the coach only once ($n = 7.91$; 46.2%) and half, more than once ($n = 9.29$; 53.8%). For most, age difference with the coach was more than five years ($n = 14.53$; 70.9%).

Analyses were also conducted to examine sexual contacts perceived as consensual with a coach among adolescents reporting consenting sexual contacts in the past 12 months and who were involved in organized sport. The prevalence of sexual contacts perceived as consensual with a coach is 1.6% among 14–17 years old Quebec adolescents involved in organized sport. In all, 16.25 reported such contacts and 9.66 were boys (59.4%) (see Figure 1). This difference is not significant ($p = .255$), meaning that the odds of having sexual contacts perceived as consensual are not higher for boys than girls, for those who are

involved in competitive sports. The majority experienced fondling ($n = 6.98$; 56.4%) and 43.6% penetration ($n = 5.40$). Two third had known the coach more than one month ($n = 7.56$; 65.2%), while a minority only had sexual contact with a coach they just met ($n = .423$; 3.6%). Half had contact with the coach only once ($n = 4.85$; 53.7%) and half, more than once ($n = 4.19$; 46.3%). For most, age difference with the coach was more than five years ($n = 8.66$; 73.6%). Finally, among those who experienced sexual contacts perceived as consensual in the last 12 months and who are involved in organized sport, 28.1% were 14 years old, 22.9% were 15 years old, 34.2% were 16 years old and 14.9% were 17 years old at the time of the survey (not shown in table).

Sexual Harassment by a Coach

In the overall sample, sexual harassment by a coach has been experienced by 24.45 adolescents during the last year, the prevalence being 0.4% among Quebec adolescents (0.2% for girls and 0.6% for boys), as shown in Table 1. There is a significant difference between gender for sexual harassment ($p = .04$). The odds of experiencing sexual harassment by a coach are 2.56 times higher for boys ($n = 15.72$) than for girls ($n = 8.73$). Analysis on the subsample of athletes showed the same prevalence (0.4%) of sexual harassment ($n = 11.31$) but no significant gender differences (0.2% for girls and 0.7% for boys) ($p = .07$). Among those who had experienced sexual harassment in the last 12 months and who are involved in organized sport, 24.8% were 14 years old, 20.2% were 15 years old, 51.2% were 16 years old and, finally, 3.7% were 17 years old at the time of the survey.

Comparing Athletes and Non-athletes on Each Victimization Type

Chi-square analyses (not shown in tables) assessed if there was a significant difference between athletes and non-athletes for each victimization type. There was a significant difference between athletes and non-athletes on sexual abuse ($p = .003$). Based on the odds ratio, the odds of being sexually abused is 1.32 times higher for adolescents not involved in organized sports than those involved in organized sport. There was no difference on other victimization types: sexual abuse by a coach ($p = .13$), sexual contacts perceived as consensual with a coach ($p = .14$) and sexual harassment by a coach ($p = .45$).

Discussion

This study aimed to document the prevalence of sexual violence experienced by adolescent boys and girls in sport and the prevalence of sexual contacts perceived as consensual with a coach in the same sample. We also examined whether adolescents involved in organized sport at the time of the study experienced these types of sexual violence and if differences existed between athletes and non-athletes. Finally, we wanted to obtain a portrait of the gender differences regarding the prevalence of sexual violence in sport. The investigation has addressed these various facets.

Sexual Abuse

Regardless of the type of perpetrator, the prevalence of sexual abuse in the total sample was 10.2%. Focusing exclusively on athletes, the prevalence was 8.8%. Similarly, Toftegaard Nielson (2010) reported that 5% of athletes reported having experienced sexual abuse before

the age of 18 years. Leahy et al. (2002) obtained a much higher prevalence. Indeed, in their study, 26.8% of the surveyed athletes were victims of sexual abuse during their lives. Maybe these results could again be explained by the fact that Leahy et al. used a broader definition of sexual abuse. Our study showed a significant difference between the prevalence obtained in the total sample (10.2%) and that obtained in the sample of athletes (8.8%). Thus, adolescents involved in organized sport experience less sexual abuse during their life than adolescents who are not involved in organized sport.

In terms of gender differences, girls experienced significantly more sexual abuse than boys, whether in the total sample or in the sample of athletes when we consider all types of perpetrators. The results obtained in the sample of athletes also confirm the gender differences observed in other studies. Indeed, Toftegaard Nielsen (2010) and Leahy et al. (2002) noted that female athletes experienced significantly more sexual abuse during their lifetime (respectively 6.3% and 31%) than male athletes (respectively 3% and 21.3%).

Sexual Abuse by a Coach

When we focus specifically on sexual abuse experienced in the sport context, the picture is somewhat different and raises several questions. Indeed, 0.5% of the population of Québécois adolescents aged 14–17 years were sexually abused by a coach during their lifetime. It is not possible to compare these results with other studies because of the lack of such data in the literature (to our knowledge). Within the group of athletes, the prevalence was 0.8%. Alexander et al. (2011), and Toftegaard Nielsen (2001, 2010) all obtained similar prevalence in athletes (0.2%, 0.3% and 0.4%, respectively). However, Leahy et al. (2002) obtained a prevalence of 10%, which was relatively higher compared to the prevalence obtained in other studies and in ours. A likely explanation for this difference is that, unlike in the present study, Leahy et al. (2002) included non-contact sexual abuse (e.g., exhibitionism, exposure to sexual acts) in their definition of sexual abuse.

There was no significant difference in the prevalence of sexual abuse between the total sample (0.5%) and the subsample of athletes (0.8%), suggesting that athletes at the time of the study were not at greater risk of experiencing sexual abuse by a coach than non-athletes. This finding raises different hypotheses. It is possible that the adolescents who experienced sexual abuse by a coach have now left sport, which means that an unknown proportion of the 0.8% is possibly comprised of former athletes. We already know that some athletes abandon sport following such traumatic events (Fasting, Brackenridge, & Walseth, 2002). Given the lack of difference between the groups, we could also postulate that having been sexually abused by a coach does not necessarily deter a youth from participating in sport. These questions merit further exploration and are interesting avenues of future research.

When considering all adolescents who experienced sexual abuse in their lifetime, it appears that 5.3% of them were victims of sexual abuse by a coach. This is comparable to the 7% of sexual abuse by an authority figure in recent statistics of the Gouvernement du Québec on victims reporting sexual abuse (2013). When considering only the group of athletes, the percent attributable to a coach was 8%. The difference between athletes and non-athletes was non-significant. However, these rates are much lower than those obtained by Leahy et al. (2002). Indeed, these authors reported that in athletes who experienced sexual abuse in

their lifetime, 37.4% were abused by a member of the sport staff. Toftegaard Nielsen (2010) obtained a result of 6%, which is similar to us.

There were no significant gender differences in the prevalence of sexual abuse by a coach in the total sample or in the subgroup of current athletes. This finding contradicts previous results that girls are more often victims of sexual abuse than boys in sport (Leahy et al. 2002). Only Alexander et al. (2011) reported similar rates of sexual abuse by a coach between boys and girls (0.2% for both genders). Hartill (2009) and Parent and Bannon (2012) have both hypothesized that the problem of sexual abuse in sport is underestimated in boys. Several authors believe that the underestimation in boys could be because of their reluctance to disclose abuse (Alaggia & Millington, 2008; O'Leary & Barber, 2008). Interestingly, the significant difference observed in our study between genders regarding lifetime sexual abuse (regardless of the context) was no longer present when considered only sexual abuse in the context of sport. It is therefore important to better understand the specific experiences of boys and girls regarding sexual abuse in sport to better study and contribute to the prevention of sexual abuse in general.

Sexual Contacts Perceived as Consensual With a Coach

In total, 1.2% of sexually active Quebecois adolescents reported having had consensual sexual contacts with a coach during the last year. In athletes, the rate was similar (1.6%). These results confirm the hypothesis raised by Toftegaard Nielsen (2010) that a substantial number of respondents may explain their sexual contacts with coaches as consensual rather than as sexual abuse. Thus, it is legitimate to postulate that the prevalence of sexual abuse obtained in our study may be an underestimation of the real problem. The prevalence of sexual contacts perceived as consensual with a coach during the last year (1.2%) was also higher than the prevalence of lifetime non-consensual sexual contacts (sexual abuse), which was 0.5%. What would be the prevalence of sexual contacts perceived as consensual if we asked young people about the occurrence of such an event in their entire life? Sport researchers agree that there is a normalisation of inappropriate behaviours in sport, especially with regard to sexual violence (Stirling & Kerr, 2009). Leahy et al. (2002) raised interesting points regarding this issue. Indeed, the authors note that among the athletes who reported not having experienced sexual abuse, 7.5% of males and 6.7% of females reported experiences during interviews that met the definition of sexual abuse.

In the current study, similar proportions of non-athletes and athletes reported consensual sexual contacts with a coach. We can hypothesize that non-athlete adolescents who experienced these contacts possibly practiced a recreational sport or physical activity rather than an organized sport. For future research, it is therefore important to consider all levels and types of sport practice, including recreational sports.

We found disparities between boys and girls regarding sexual contacts perceived as consensual with a coach. Indeed, 67.7% of the adolescents who reported this were boys and the difference between genders was significant. These results are all the more surprising given that these situations are considered sexual abuse under the law (Canadian criminal code, 2013) and that studies tend to show that girls experience more sexual abuse than boys in sport (eg.: Leahy et al., 2002). Could it be that more boys perceive sexual contacts with a

coach as consensual rather than as abuse? It is therefore essential to rethink how we formulate questions when investigating the prevalence of sexual abuse in sport and to add aspects of sexual contacts perceived as consensual with an adult in a situation of authority. It is also important to pay special attention to how to question boys. It would be interesting, in the sport context at least, to use gender-specific follow-up questions to better understand the perception of each one and refine our current questionnaires. To do this, we still must understand the phenomenon of sexual abuse of boys in sport, which remains understudied (Parent & Bannon, 2012). Qualitative analyse may offer relevant data in this regard. In contrast with the findings observed in the total sample, in the subsample of athletes, there was no longer a significant difference between girls (40.6%) and boys (59.4%) on sexual contacts perceived as consensual with a coach. Does this mean that boys who play sports recreationally are more likely to experience this kind of contact with their coach than boys involved in organized sport? This hypothesis remains to be confirmed.

Sexual Harassment by a Coach

When asked about the past 12 months, 0.4% of Quebecois adolescents reported being sexually harassed by a coach. In athletes, the rate was the same at 0.4%. As these results reflect sexual harassment experienced only during the last year, and that the past studies report sexual harassment experienced throughout the careers of athletes (eg. Gündüz et al, 2007; Vanden Auweele et al., 2008), it is not possible to compare these data. Given that the rates of sexual harassment were the same in the total sample and among athletes, this raises the hypothesis that adolescents (non-athletes) who have experienced sexual harassment in the past year from a coach were possibly practicing a sport or physical activity recreationally and that these adolescents experienced as much sexual harassment as those involved in organized sport.

Within the total sample, we observed a significant difference between boys and girls regarding sexual harassment committed by a coach. Thus, regardless of the sport status, adolescent boys are victims of sexual harassment more often than girls. These results are difficult to explain because of the lack of studies that compare girls and boys regarding this issue. In contrast, there was no gender difference in the subgroup of athletes. Thus, female and male athletes have experienced similar rates of sexual harassment by a coach. At first, this finding was surprising but not when we consider that the literature has focused almost exclusively on female athletes (Fasting et al., 2014). Indeed, our study was the first (to our knowledge) to differentiate between genders on this specific issue. On a second note, why was the difference that was observed in the total sample no longer present in the group of athletes? Could it be that the recreational sport environment is a higher risk environment for boys than the environment of organized sport? This hypothesis remains to be confirmed.

Limitations of the Present Study

Our study focussed on sexual victimization involving a coach. Yet we know that sexual violence experienced in sport may not only be perpetrated by coaches, but also by peer athletes or other adults working in this context, e.g. medical team (Alexander et al, 2011; Décamps et al., 2009). Moreover, we were unable to investigate the issue as a function of the coach's gender, which could have clarified the differences observed between boys and girls.

Another limitation concerned differentiation of the levels of sport practice. We only have investigated organized sport. As we can see, our results suggest that recreational sport is not free of sexual violence. Indeed, Leahy et al. (2002) showed that there was a significant difference between the prevalence of sexual abuse experienced by elite athletes and athletes of a lower level whereas Chroni and Fasting (2009) reported no significant difference between the various levels of sports of women in terms of sexual harassment in sport. Finally, another limitation is the absence of some adolescents such as school drop-outs in the sample.

Conclusion

This study contributes to the understanding of the phenomenon of sexual violence experienced by adolescents in sport. Indeed, it was the first study to be conducted in a representative sample of a population of adolescents aged between 14–17 years. We can therefore say that the results presented here are an accurate picture of sexual violence perpetrated by a sport coach and experienced by adolescent boys and girls. Also, this study focused not only on organized sport, but on adolescents in general, regardless of their athletic status. A novel aspect of this study was that it questioned the adolescents directly, a research design infrequently used in the field of sexual violence in sport. Because of the high response rate, the study was also able to investigate gender-effects of this issue. We believe that future studies on the prevalence of these issues should pay particular attention to the representativeness of the sample, to the inclusion of sexual contacts perceived as consensual with an authority figure in sport as well as to gender-effects. Finally, data from this study provide important information for the prevention of sexual abuse in sport, particularly concerning consenting sexual contacts between young people and coaches. It is desirable that coaches and sports leaders know that this kind of relationship in a context of authority constitutes sexual abuse under the law.

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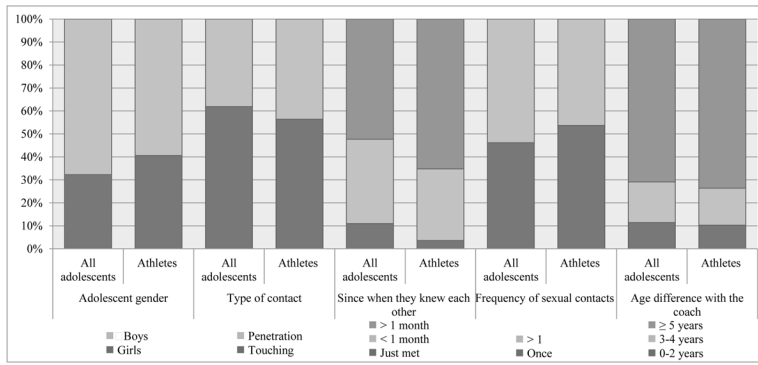


Figure 1. Characteristics of sexual contacts perceived as consensual with a coach, among 14–17 years old Quebecois reporting such contacts

Table 1

Prevalence (in %) of sexual abuse and sexual harassment by gender among 14–17 years old Quebecois.

Victimization type	Overall sample N = 6 268.17			Athletes N = 2 707.40			$\chi^2(1)$	$\chi^2(1)$
	Total % (CI)	Girls n = 3 647.27 % (CI)	Boys n = 2 618.55 % (CI)	Total % (CI)	Girls n = 1 425.58 % (CI)	Boys n = 1 281.18 % (CI)		
Sexual abuse	10.2 (8.8–11.7)	14.6 (12.8–16.6)	3.9 (3.1–5.0)	8.8 (7.3–10.6)	13.8 (11.4–16.6)	3.2 (2.3–4.6)	232.30**	115.67**
Sexual abuse by a coach	0.5 (0.3–0.9)	0.4 (0.2–0.9)	0.7 (0.3–1.3)	0.8 (0.4–1.6)	0.7 (0.1–1.3)	0.9 (0.2–1.1)	1.63	0.54
without penetration	0.5 (0.3–0.8)	0.4 (0.2–0.7)	0.6 (0.3–1.2)	0.6 (0.3–1.3)	0.5 (0.2–1.7)	0.8 (0.3–2.2)	0.94	0.65
with penetration	0.2 (0.1–0.3)	0.1 (0.0–0.3)	0.4 (0.1–0.6)	0.3 (0.1–0.5)	0.3 (0.0–0.5)	0.3 (0.0–0.6)	3.00 ^a	0.03 ^a
Sexual harassment by a coach	0.4 (0.3–0.6)	0.2 (0.1–0.5)	0.6 (0.4–1.0)	0.4 (0.2–0.7)	0.2 (0.0–0.4)	0.7 (0.2–1.1)	6.66*	3.79 ^a

Note. χ^2 for gender differences, CI = confidence interval (lower - higher limit).

The N and n vary for each variable due to missing data.

^aFisher test isn't available in Complex samples, so these results were analyzed using weights only.

* $p < .05$.

** $p < .001$.