# Similarities and differences in adolescence-onset versus adulthood-onset sexual abuse incidents

McKillop, N., Brown, S.J., Smallbone, S. and Pritchard, K

McKillop, N, Brown, SJ, Smallbone, S & Pritchard, K 2015, 'Similarities and Differences In Adolescence-Onset Versus Adulthood-Onset Sexual Abuse Incidents' *Child Abuse & Neglect*, vol 46, pp. 37-46. DOI: 10.1016/j.chiabu.2015.02.014

Publisher: ScienceDirect

This is an Accepted Manuscript of an article published by ScienceDirect in Child Abuse & Neglect, 13/03/2015, available online <a href="http://www.sciencedirect.com/science/article/pii/S0145213415000654">http://www.sciencedirect.com/science/article/pii/S0145213415000654</a>

This is the author's version of a work that was accepted for publication in Child Abuse & Neglect. Changes resulting from the publishing process, such as peer review, editing, corrections, structural formatting, and other quality control mechanisms may not be reflected in this document. Changes may have been made to this work since it was submitted for publication. A definitive version was subsequently published in Child Abuse & Neglect [in press (2015)] DOI: 10.1016/j.chiabu.2015.02.014.

Copyright © and Moral Rights are retained by the author(s) and/ or other copyright owners. A copy can be downloaded for personal non-commercial research or study, without prior permission or charge. This item cannot be reproduced or quoted extensively from without first obtaining permission in writing from the copyright holder(s). The content must not be changed in any way or sold commercially in any format or medium without the formal permission of the copyright holders.

Pure is the Institutional Research Repository for Coventry University

# Similarities and differences in adolescence-onset versus adulthood-onset sexual abuse incidents

McKillop, N., Brown, S.J., Smallbone, S. and Pritchard, K. Author post-print (accepted) deposited in CURVE March 2015

### Original citation & hyperlink:

McKillop, N., Brown, S.J., Smallbone, S. and Pritchard, K. (2015) Similarities and differences in adolescence-onset versus adulthood-onset sexual abuse incidents. Child Abuse & Neglect, volume (in press)

http://dx.doi.org/10.1016/j.chiabu.2015.02.014

**Note:** Article in press, full citation details will be updated once available.

**Publisher statement:** NOTICE: this is the author's version of a work that was accepted for publication in Child Abuse & Neglect. Changes resulting from the publishing process, such as peer review, editing, corrections, structural formatting, and other quality control mechanisms may not be reflected in this document. Changes may have been made to this work since it was submitted for publication. A definitive version was subsequently published in Child Abuse & Neglect [in press (2015)] DOI: 10.1016/j.chiabu.2015.02.014.

Copyright © and Moral Rights are retained by the author(s) and/ or other copyright owners. A copy can be downloaded for personal non-commercial research or study, without prior permission or charge. This item cannot be reproduced or quoted extensively from without first obtaining permission in writing from the copyright holder(s). The content must not be changed in any way or sold commercially in any format or medium without the formal permission of the copyright holders.

This document is the author's post-print version, incorporating any revisions agreed during the peer-review process. Some differences between the published version and this version may remain and you are advised to consult the published version if you wish to cite from it.

CURVE is the Institutional Repository for Coventry University

http://curve.coventry.ac.uk/open

### RUNNING HEAD: ADOLESCENCE VERSUS ADULTHOOD ONSET

# Similarities and differences in adolescence-onset versus adulthood-onset sexual abuse incidents

Nadine McKillop<sup>a\*</sup>, Sarah Brown<sup>b</sup>, Stephen Smallbone<sup>a</sup>, Karlyn Pritchard<sup>a</sup>

School of Criminology and Criminal Justice, Griffith University, 176 Messines Ridge Road,

Mt. Gravatt, Queensland 4122, Australia

bCentre for Research in Psychology, Behaviour and Achievement, Coventry University,

Priory Street, Coventry CV1 5FB, UK

\*Corresponding author: nadine.k.mckillop@griffith.edu.au

Please cite this paper as: McKillop, N., Brown, S. J., Smallbone, S. W., & Pritchard, K. (2015). Similarities and differences in adolescence-onset and adult-onset sexual abuse offending. *Child Abuse and Neglect*. http://dx.doi.org/10.1016/j.chiabu.2015.02.014

ADOLESCENCE VERSUS ADULTHOOD ONSET 2

**Abstract** 

A sample of males who had first committed sexual offences against children in either

adolescence (n = 230; M = 14.0 years, SD = 1.5) or adulthood (n = 280; M = 34.4 years, SD = 1.5)

11.7) were compared on measures relating to the circumstances of their first known sexual

abuse incident. Considerable diversity in the circumstances of these first incidents was

observed for both groups. However, adulthood-onset sexual abuse most often occurred

following a long-standing familial relationship with a female victim, and in a home setting.

The first incident for adolescence-onset offenders also tended to occur in the context of a

long-term relationship and against a female child in a home setting, but more commonly

against a nonfamilial victim. Adulthood-onset offenders abused older children, were more

likely to engage in penetrative sexual behaviors, and went on to abuse over a longer duration

than adolescence-onset offenders. Adolescence-onset offences were more likely to be

witnessed by a third party. Findings and their implications for prevention are considered from

a situational crime prevention perspective.

Keywords: adolescence-onset; adulthood-onset; sexual offenders; child sexual abuse;

situational theories

### Introduction

Despite growing evidence to the contrary, adolescent sexual offenders are often assumed to be at high risk of persistent sexual offending into and throughout their adulthood. This assumption was originally fuelled by early clinical studies, which reported that adult sexual offenders typically began sexual offending as adolescents (Abel, Becker, Mittelman, Rouleau, & Murphy, 1987; Groth, Longo & McFadin, 1982). The weight of evidence now indicates instead that most adolescent sexual offenders do not go on to become adult sexual offenders (e.g., Lussier & Blokland, 2014; Nisbet, Wilson & Smallbone, 2004), and that most adult sexual offenders do not begin sexual offending in their adolescence (Marshall, Barbaree, & Eccles, 1991; McKillop, Smallbone, Wortley, & Andjic, 2012; Smallbone & Wortley, 2004). This pattern appears to hold for both adult-victim and child-victim sexual offending.

Three important findings have emerged with respect specifically to sexually abusive behavior (sexual offences against children aged under 16 years). First, unlike for other types of crimes, there appear to be two peak risk periods associated with the perpetration of child sexual abuse - the first in adolescence and the second in the mid- to late-30s (Hanson, 2002). Second, adolescent sexual abusers are at high risk of being subsequently arrested for a range of nonsexual offences, but proportionally few continue sexual offending into adulthood (McCann & Lussier, 2008; Nisbet et al., 2004). Third, those adolescent sexual abusers who do continue to commit sexual offences into adulthood tend to desist by their early-thirties (Lussier & Blokland, 2014). Thus, although there is undoubtedly some overlap, adolescence-onset and adulthood-onset sexual abuse offenders appear to be two largely distinct offender populations (Smallbone & Cale, 2015).

Theoretical explanations for this bimodal distribution have focused on possible qualitative differences between the two groups. Adolescence-onset sexual offending has been

conceived of as an extension of existing anti-social or aggressive tendencies, whereby the emergence of sexually aggressive or abusive behavior coincides with the onset of ordinary sexual exploration and peer activities in adolescence (Caldwell, 2002; Finkelhor, Ormrod & Chaffin, 2009; Zimring, 2004). In this regard, adolescence-onset sexual abuse may be partly explained by the psychological, physiological and social changes occurring in adolescence that give impetus to sexual motivations and present new opportunities for sexual interaction, but at the same time limit adolescents' capacities for responsible decision-making (Haigh, 2009). This may be compounded by their immature understanding of sexuality, sexual relationships, and sexual behavior (Rich, 2011). Adolescents are also likely to be subjected to lower levels of supervision and external control than in earlier stages of their development (Calder, 2001).

While individual and psychosocial factors (e.g., attachment problems, poor social skills and intimacy deficits, lack of empathy, limited perceptive-taking, and emotional regulation problems) have been identified as potential precursors to sexually abusive behavior in adulthood (for example, Beech & Ward, 2004; Marshall, 2010; Marshall & Marshall, 2010; Ward & Beech, 2006), adulthood-onset sexual offending behavior has also been conceptualized as coincident with changes in individuals' families, work, and social circumstances (e.g., [step]fatherhood, child-oriented employment) providing unsupervised access to children and opportunities related to their age, status, and guardianship responsibilities (Hanson, 2002; Laub & Sampson, 2003; Thornberry & Krohn, 2005). Sexual abuse incidents, for the most part, occur in the milieus of ordinary social interaction. Thus, more needs to be understood about the situational (physical and social) dynamics of these incidents, at both developmental stages, to establish how such individual vulnerabilities manifest in sexually abusive behavior at particular times and places. This is particularly relevant to the first sexual abuse incident where child-sexual-abuse specific motivations (e.g.,

stable sexual interests in children) are not necessarily yet well-established and where contextual factors may have more a proximal influence at this stage in their sexual offending career.

Despite long-standing calls (e.g., since Kaufman et al., 1996) for more integrated investigations of sexual offences perpetrated by adolescents and adults, empirical research remains limited. Few studies have directly compared the sexual abuse characteristics of adult and adolescent offender populations (Cyr, Wright, McDuff, & Perron, 2002; Finkelhor, Ormrod & Chaffin, 2009; Kaufman et al., 1996; Miranda & Corcoran, 2000; Rudd & Herzberger, 1999) and only Lussier, Blokland, Mathesius, Pardini and Loeber (2015) have investigated childhood risk factors associated with adolescence-onset and adulthood-onset sexual offending.

Miranda and Corcoran (2000) found that adult offenders perpetrated more offences, maintained longer relationships with their victims and engaged in more intrusive sexual acts than adolescents, but that adolescents used more force during abuse incidents. Kaufman et al. (1996) also found that adolescents tended to use more coercive (i.e., threatening) strategies than adults and more frequently used weapons to undermine the victim and gain compliance. Finkelhor and colleagues (2009) found that, compared to adult offenders, adolescents more often offended in groups and abused younger and more male victims. Incidents perpetrated by adolescents tended to occur in the home, but less so than adults, with school-based abuse also common for adolescents (Finkelhor et al., 2009). Whereas Miranda and Corcoran (2000) reported higher levels of familial abuse by adolescents, Finkelhor et al. (2009) reported higher levels of nonfamilial abuse. Cyr et al. (2002) found, with the exception of penetration (perpetrated more by adolescents in their study than adults), there were similarities in the characteristics of sexual abuse perpetrated by adolescent or adult family members. Rudd and Herzberger (1999) identified similarities in the use of force and bribes when comparing

brother-sister incest with father-daughter incest, however the length of sexual abuse tended to be longer for father-daughter incest cases. This appeared to be associated with the brother maturing and leaving the home (Rudd & Herzberger, 1999). They also identified lack of supervision as being particularly important for sibling-incest cases. Lussier et al.'s (2015) findings revealed some similarities and differences between the adolescence-onset and adulthood-onset groups with regard to childhood risk factors. Their findings indicated that a composite of individual, family, and neighborhood risk factors best predict the onset of sexual offending and that childhood risk factors might be more salient for predicting adolescence-onset than adulthood-onset offending. The question as to why some individuals begin sexually offending in adolescence and others in adulthood, however, remains largely unanswered.

We think situational theories may go some way towards answering this question. Despite the successful application of situational theories to crime and delinquency more generally, much less attention has been given to its application for preventing child sexual abuse, where there remains a tendency, both theoretically and empirically, to focus on the dispositional characteristics of offenders. This has meant that, historically, the circumstances and interpersonal contexts within which these offences occur have been inadvertently overlooked (Smallbone, Marshall, & Wortley, 2008; Wortley & Smallbone, 2006). More recent empirical studies show some promise for the utility of situational theories in the explanation of sexual abuse. For example, Wortley and Smallbone (2006) demonstrated that the environmental factors present within situations preceding child sexual abuse provided both the opportunity and the impetus to sexually abuse. Leclerc, Smallbone and Wortley (2013) found that situational factors (e.g., presence of a guardian) have an influence on perpetration characteristics, including the severity and duration of sexual abuse.

Situational theories initially consisted of two predominant schools of thought: rational choice theory (Cornish & Clarke, 1986); and the routine activities approach (including lifestyle exposure theories) (Cohen & Felson, 1979; Hindelang, Gottfredson, & Garofalo, 1978). Both frameworks can be used to explain how factors present within the immediate pre-offence and offence settings can influence the onset of child-sex offending behavior. Focused on the decision-making of offenders, rational choice theory proponents argue that offenders make choices to offend according to the perceived risk and effort involved relative to reward (Cornish & Clarke, 1986). Routine activities theorists view crime events as the "function of the convergence of likely offenders and suitable targets in the absence of capable guardians" (Cohen & Felson 1979, p. 590); all three of these components are necessary for the crime to occur. These perspectives would indicate that offenders evaluate, whether explicitly or implicitly, situational contingencies in their decisions to offend and that offending is most likely to take place where opportunities arise in the context of offenders' social ecologies and everyday routines, where the risk of apprehension is low and effort minimal (Clarke, 1997, 2008; Cornish & Clarke, 2003).

More recently, situational theorists have conceptualized a more dynamic role of situational factors in precipitating sexual abuse, particularly in relation to the onset of this behavior. Wortley (2001; 2008) proposed that situations might serve to pressure, prompt, provoke or permit sexually abusive behavior. In this sense, situations not only provide opportunities for a motivated individual to sexually abuse, they also can serve to induce motivation and precipitate sexual abuse in an otherwise previously unmotivated individual (Wortley, 2001). We were therefore interested to isolate and examine the first known sexual abuse incident during adolescence and adulthood from a situational perspective.

Although onset is often used as the cornerstone from which to examine offending trajectories, particularly comparisons of early-versus late-onset offending, the characteristics

of the onset offence itself have seldom been examined. From a theoretical perspective, it represents a rare point of commonality in an otherwise largely heterogeneous group of offenders. For all these individuals the onset offence marks the first time that they have engaged in sexually abusive behavior. It is also possible that the process of sexual offending itself influences offenders' subsequent cognitions, motivations and behavior (Smallbone & Cale, 2015). Examining the offence characteristics of established patterns of sexual offending in persistent offenders might therefore mask important information about how and why an individual engages in sexually abusive behavior for the first time and the context and locations within which this occurs. The literature is dominated by discussions focused on treatment, risk management and relapse prevention of known sexual offenders. Attending to the onset sexual abuse incident in isolation from subsequent sexual abuse incidents might provide different answers and potentially enhance our understanding of why individuals first sexually abuse children. From a prevention standpoint, the first sexual abuse incident is the most important one to prevent. While it may be more challenging to devise, implement and evaluate strategies aimed at preventing sexual abuse from occurring in the first place (rather than preventing recidivism among known offenders), understanding and preventing the first incident offers the most desirable outcomes in terms of reducing the potential harms associated with sexual abuse.

To this end, our study had two aims. First, we were interested to investigate, in the adult group, at what age they began sexually abusing children; and in the adolescent group the number who persisted with sexually abusive behavior into adulthood. Second, we wanted to compare the characteristics of adolescence-onset sexual abuse incidents with the characteristics of adulthood-onset sexual abuse incidents. Specifically, we compared adolescence-onset and adulthood-onset offenders on: (1) their victims' characteristics; (2) the relationship contexts in which the first sexual abuse incidents occurred; and (3) the location

and situational contexts of these first incidents. Given Calder's (2001) observations that the sexual behaviors of adolescent perpetrators are typically less sophisticated and more restricted by situational and opportunity factors when compared to adult perpetrators, we were also interested in comparing adolescents and adults on: (4) the sexual behaviors engaged in during the abuse, (5) whether the first incident was witnessed, and (6) the frequency and duration of sexual abuse against this first victim.

### Method

## **Participants**

Participants (*N* = 510) were drawn from three separate government-funded research project databases that contained detailed self-reported and official data on perpetrators' developmental and offending histories. Sections of the original instrument (Smallbone & Wortley, 2000) designed for examining the characteristics and modus operandi of child sexual abusers were included in the instruments used for the two subsequent research adult and adolescent projects (Smallbone, Wortley, Kebbell, & Rallings, 2005; Smallbone, Leclerc, & Allard, 2010, respectively), enabling direct comparisons to be made between the groups on the characteristics of the onset sexual abuse incident.

The two adult databases contained information on 306 males convicted of sexual offenses against children aged under 16 years. Offenders' ages at the time of participation in these studies ranged from 20 to 84 years (M = 44.6, SD = 12.0). Most (82%) identified as non-Indigenous Australian, 8% as Aboriginal and Torres Strait Islander Peoples, and 11% as *other* ethnic origin. About 15% had completed only their primary education (i.e., at 12-13 years) at the time of their incarceration. Most (65%) had completed some or all of their secondary schooling, and 20% had undertaken post-secondary education. While it was not a prerequisite for participants to be in, or previously have undertaken treatment, about half (n = 169, 55.2%) had attended at least one sexual offender treatment program as part of their

sentence. Most (n = 286, 93.5%) were recruited from custodial correctional centers; the remainder were serving community-based sentences. Twenty-six (9%) of the adult participants reported that they had committed their first child-sex offence in adolescence (aged  $\leq 17$  years) and were therefore removed from the adulthood-onset sample and placed instead in the adolescence-onset group; the remaining 280 participants were retained in the adulthood-onset group.

The adolescence-onset group (n = 230) included the 26 offenders identified from the adult databases and 204 adolescent males drawn from a larger population of forensic clients court-referred to a specialist clinical program for adolescents who had committed sexual offences. Only those adolescent offenders who had committed their first sexual offence against a child aged under 16 years were included in the present study. These young people had been referred to the service between 2000 and 2012 for clinical assessment and/or treatment, and were aged between 11 and 18 years of age (M = 15.5, SD = 1.5) at the time of their referral. Most (76%) identified as non-Indigenous Australian, 23% as Aboriginal and Torres Strait Islander Peoples, and 1% as *other* ethnic descent. About one-quarter (27%) had completed their primary education at the time of referral; most (69%) had completed some secondary school, and 4% had completed secondary schooling. At the time of referral, 11% (n = 22) were serving a custodial sentence; the remainder were living in the community.

The average age at the time of the first sexual abuse incident (onset) for the adulthood-onset group was 34.4 years (SD = 11.7, range = 18 - 79 years). The majority (66%) were aged between 25 and 49; 25% were aged between 18 and 24; and 8% were aged over 50. The average age at onset for the adolescence-onset group was 14 years (SD = 1.5, range = 10-17 years). The majority (47%) of this group was aged 13 or 14 at the time of onset; 14% were aged under 13 years.

### Measures

Information pertaining to the adult offenders was based on their self-reports and official criminal records. Information collated from the adolescent offenders was also sourced from their self-reports, other official reports and records obtained at the time of referral and assessment. Information was obtained specifically about the first (onset) sexual contact with a child (< 16 years). Points of comparison were: (a) victim age at the time of the onset incident; (b) victim gender; (c) victim-offender relationship; (d) offence setting; (e) sexual behaviors; (f) presence of witnesses; and (g) frequency and duration of contact with the onset victim.

*Victim-offender relationship.* Victim-offender relationship was coded as familial, non-familial or stranger. Where information was available, these relationship categories were further divided into specific relationship types (biological daughter, step-child, biological sibling and so on). The length of the relationship prior to the onset sexual abuse incident was ranked 1 (a few minutes), 2 (a few hours), 3 (one day - one week), 4 (one week – one month), 5 (one month – six months), 6 (six months - 1 year) or 7 (more than 1 year).

Offence setting. The offence setting was categorized as domestic, organizational or public. These categories were further divided into specific locations (e.g., perpetrator's home, victim's home, park, school) and, where relevant, specific spaces within the domestic domain (e.g., bedroom, living room and so on).

Sexual behaviors. Sexual behaviors were classified as penetrative (e.g., vaginal, digital, oral or anal penetration) or non-penetrative (e.g., inappropriate touching, masturbation, exposure).

Witnesses. The presence of witnesses during the offence was coded dichotomously as 0 (not witnessed) and 1 (witnessed).

Frequency and duration of contact. The frequency of sexual contact (i.e., the number of times the perpetrator had sexual contact with the onset victim) was ranked 1 (once), 2 (2-10 times), 3 (11-50 times), or 4 (more than 50 times). The duration of sexual contact (i.e., length of time over which the onset victim was sexually abused) was ranked 1 (1 day), 2 (1 day - 1 month), 3 (1 - 6 months), or 4 (more than 6 months).

Recidivism data. Official police arrest records were obtained on the adolescent sample as part of the larger government-funded project to which this study was attached. The police records included information regarding offences for which there was an action taken by police (e.g., arrest, caution, conference). Data extraction occurred in late 2012, with records dating back to 1993.

### Procedure

Comparable demographic and onset sexual offence data were extracted from the adult and adolescent databases and integrated into a new database for direct analysis. For the adult sample, permissions to utilize these de-identified data were obtained at the time of each separate research study in line with the approved Human Research Ethics protocols. Self-report data for the adult datasets were obtained under conditions of strict confidentiality. Participants were also offered complete anonymity, but were also invited to provide their name for follow-up contact. Participation in these studies was voluntary; participants could withdraw at any time without penalty. Demographic data and offence history information were also extracted by members of the research team (postgraduate research students) from official records held within the participants' relevant Correctional Centre at the time of questionnaire administration. Identifier codes were subsequently used to match self-report to official data to assess discrepancies in offenders' self-reports. These cross-checks did not identify any cases requiring exclusion for this study. The reliability and validity of the self-report data from these two adult databases has been previously reported (McKillop,

Smallbone, Wortley, & Andjic, 2012; Smallbone & Wortley, 2000), indicating moderate to high test-retest stability for the self-report measures used to examine the onset sexual abuse incident.

De-identified data for the adolescent sample were obtained directly from the service's clinical research database in line with approved Human Research Ethics protocols. The same situational measure developed for obtaining data on the onset sexual offence in the adult projects was subsequently used to code the adolescent data. Coding was completed by experienced clinicians (psychologists), as part of a larger government-funded project, and who were blind to the specific aims of this study at the time of coding. Inter-coder reliability checks (n = 20) showed moderate to high levels of concordance between the clinicians on key onset offence measures, indicating that clinicians were coding the same incident as the first known sexual offence (Table 1).

### [TABLE 1 ABOUT HERE]

### Results

Recidivism of adolescent offender group

Recidivism data were available on 187 (92%) individuals drawn from the adolescent offender database. Twenty-four (11.8%) individuals were aged 13 to 17 years at the time of data extraction, so were excluded from the analyses. The overall time at risk for this sample was 12.9 years (SD = 2.9, range = 8.3 - 19.9 years). The average age of participants at follow-up was 22.4 years (SD = 3.5, range = 18 – 29 years). Of the 163 offenders for whom recidivism data was available through into adulthood, 12 (7.4%) came to the attention of police for a subsequent sexual offence. Of these, the sexual offending appeared to desist by the age of 16 for two perpetrators; the remainder continued to sexually offend into (at least) their midtwenties (when data extraction occurred).

Onset sexual abuse incident characteristics

Bivariate (chi-square) and univariate (two-way between groups analysis of variance) tests were conducted to determine differences in first-offence characteristics for the two onset groups. Details of the offence setting and presence of witnesses were not available in one of the adult databases, reducing the *n* for these analyses. The results of the comparisons are presented in Table 2.

### [TABLE 2 ABOUT HERE]

Victim characteristics. A 2 (adolescence/adulthood onset) x 2 (male/female victim) ANOVA was conducted to assess victim characteristics. A significant main effect for offence-onset group was found, F(1,508) = 89.40, p < .001,  $\eta^2 = .15$ , where the adolescence-onset group sexually abused younger-aged children (M = 8.15 years, SD = 3.55) than the adulthood-onset group (M = 11.03 years, SD = 3.04). The main effect for victim gender, F(1,508) = 1.37, p = .24, did not reach statistical significance with almost three-quarters (n = 378) of onset victims being female. While the adulthood-onset group reported sexually abusing girls and boys of similar ages, and the adolescence-onset group to sexually abuse older girls and younger boys, this interaction effect was not statistically significant, F(1,508) = 2.98, p = .09.

Victim-offender relationship. The majority of adulthood-onset (75%) and adolescence-onset (63%) offenders knew their victims for more than a year before their first sexual offence incident. However, a significantly higher proportion of the adulthood-onset group first sexually abused familial victims compared to the adolescence-onset group who sexually abused a greater proportion of non-familial victims,  $\chi^2$  (n = 508, 2) = 8.91, p = .012,  $\phi = 0.13$ . Few individuals from either group (7.2% and 7.0%) first sexually abused a stranger victim.

When looking more specifically at these relationships, in the case of familial-onset, adulthood-onset offenders were most likely to first abuse a stepchild (26%) or biological child (14%). Step-siblings (15%), cousins (14%), or biological siblings (12%) were the most common victims for the adolescence-onset group. In the case of non-familial onset, the adulthood-onset group was most likely to offend against children of friends (11%), neighbors (7%), or children known through work (6%). Adolescence-onset offenders tended to first offend against peers (16%), children of family friends (10%), or neighbors (7%).

Offence setting. Domestic settings were the most common locations to commit the first abuse incidents for both the adulthood-onset and adolescence-onset groups,  $\chi^2$  (n = 303, 2) = 5.20, p = .074,  $\varphi = .13$ . For those offences that occurred in the home, a significantly higher proportion of the adulthood-onset group (80.3%) occurred within their own home compared to the adolescence-onset group (53.1%), who were as likely to offend in either the victim's home (32.6%) or a home of someone else (14.3%),  $\chi^2$  (n = 248, 2) = 17.64, p < .001,  $\varphi = .27$ . Within the domestic setting both adulthood-onset and adolescence-onset offenders most commonly committed their first sexual offence in a bedroom (60% & 58% respectively).

Sexual behaviors. Adulthood-onset offenders were more likely than adolescence-onset offenders to engage in penetrative sexual acts with their first child victims,  $\chi^2$  (n = 496, 1 = 5.42, p = .02,  $\varphi = .11$ .

Presence of a witness. The first sexual offence incident of adolescence-onset offenders (21%) was significantly more likely to be witnessed than was the case with adulthood-onset offenders (4.7%),  $\chi^2$  (n = 300, 1) = 12.04,  $p = .001, \varphi = -.20$ .

Frequency and duration of sexual contact. A significantly higher proportion of adolescence-onset offenders committed sexual offences against the onset victims on a single occasion, compared to the adulthood-onset group, who were significantly more likely to

offend against the onset victim on multiple occasions,  $\chi^2$  (n = 507, 3) = 46.72,  $p < .001, \varphi = .30$ . A significantly higher proportion of the adulthood-onset group sexually abused the onset victims for a duration six months or more, compared to adolescence-onset offenders who were more likely to offend against their victims once only,  $\chi^2$  (n = 502, 3) = 46.82,  $p < .001, \varphi = .31$ .

### **Discussion**

With regard to the first aim of this study, only a small proportion (9%) of the adult offender sample reported first sexually abusing a child in adolescence. Slightly fewer (6%) of the adolescence-onset sample were identified through official arrest records as having committed sexual offences as adults. Our findings are consistent with those found in longitudinal studies of adolescent sexual offenders (e.g., Lussier & Blokland, 2014; Nisbet et al., 2004; Waite et al., 2005) and indicate two things: (1) that the onset of sexually abusive behavior in adulthood can occur in the absence of historical sexually problematic or abusive behavior and (2) that persistence of sexually abusive behavior from adolescence into adulthood is the exception rather than the rule. The findings also correspond with current thinking that, for the most part, there may be two discrete populations of sexual abuse perpetrators. This suggests that different prevention strategies might be required for adolescent and adult sexual perpetrators, especially if other differences between the two groups were to be identified.

With regard to our second aim, both similarities and differences were found between the adolescence and adulthood onset groups. Similarities of note were the relationship contexts and settings in which these incidents first occurred. Although the adolescence-onset group offended more commonly against non-familial victims, and adulthood-onset offenders against familial victims, for both groups these incidents typically occurred within the context of long-standing nonsexual relationships between the perpetrators and victims; stranger abuse was atypical. Consistent with previous research (e.g., Elliott, Browne & Kilcoyne, 1995)

many of these relationships had been established for more than a year before the first sexual abuse incidents occurred. Nonetheless, the differences in nonfamilial versus familial onset might be explained from a developmental perspective. During adolescence, as independence from family increases, peer relationships tend to dominate individuals' lives. This increase in interactions outside of the family may, in part, explain the patterns found here, including offending in homes other than their own. For both groups, these incidents most often took place in private (i.e., domestic) settings. These similarities can be explained, to some extent, using rational choice and routine activities approaches.

Both the relationship contexts and offence settings shared common features (e.g., familiarity, trust, authority, power) that make them conducive to sexually abusive behavior. From a rational choice perspective, domestic settings provide (potential) offenders with several advantages over other contexts in terms of minimizing risks and maximizing gains. Familiarity with these spaces means offenders can more adequately manage the risks of detection, particularly if they are offending in their own homes (Leclerc, Wortley & Smallbone, 2011). Manipulation of such contexts is also easier, leading to increased opportunities to be (legitimately) alone with victims (Beauregard, Rossmo & Proulx, 2007; Leclerc, Beuregard & Proulx, 2008). Bedrooms in particular were identified as common areas for sexual abuse; the privacy of such contexts more readily permits concealment. Similarly, the dynamics of trust, authority, power and familiarity of established relationships may facilitate sexual abuse by enabling the offender to more readily manipulate interpersonal interactions, in order to engage the child in sexual contact, to overcome the child's resistance and maintain secrecy (Kaufman et al., 1996). From a cost-benefit perspective, both established relationships and domestic settings typically pose the lowest risk for discovery and apprehension and require minimal effort for abuse to occur (Elliott et al., 1995; Snyder, 2000).

From a routine activities perspective, the domestic setting is also the setting where (potential) victims and (potential) offenders most frequently converge in the context of every day routines (Clarke & Felson, 1993). The opportunity structures that exist in these settings allow for greater access to, and exploitation of, potential victims than is the case in other contexts. Certainly, the victims chosen by perpetrators in this sample suggest that they did not deviate far from their normal routine-based activities, instead choosing victims within close physical proximity to them. The nature and dynamics (i.e., close physical and emotional proximity, intimacy) of the relationships that exist between individuals within these settings may also serve as precursors to sexually abusive behavior (Wortley, 2001). It may be routine intimate caretaking duties themselves (e.g., bathing child, babysitting, sleeping together and so on) that not only lead to increased opportunities for sexual abuse but may also serve to prompt such behavior (Wortley, 2001). Routine-based exposure to victims might also help explain why adult offenders were more likely to victimize familial children and adolescents nonfamilial children. As aforementioned, whereas adults might, in their everyday interactions, be more exposed to familial victims, adolescence is a time where connections with peers dominate over familial relationships making peer interactions as commonplace as familial relationships.

Within this broader context, however, some differences were evident. The adulthood-onset group abused older children than the adolescence-onset group and, similar to Miranda and Corcoran's (2000) findings, a higher proportion of the adulthood-onset group engaged their victims in penetrative sexual behaviors and more frequent abuse over longer durations than the adolescence-onset group. Adolescents were significantly more likely to be witnessed than adults. Rational choice and routine activities approaches again offer some explanation for these differences.

From both rational choice and routines activities approaches, the differences (i.e., frequency and duration of abuse; presence of witnesses) may be partly explained in terms of situational constraints (e.g., level of supervision, accessibility to the victim, authority and power) relevant to the developmental stages of adolescence and adulthood. These situational contingencies may restrict opportunities and timeframes for sexual abuse in adolescence; the daily routines of adolescents are more likely to be monitored than adults, making them more restricted in access to victims, and more vulnerable to exposure, than adults (Calder, 2001). For adults, on the other hand, more sustained offending might be related to the continued and frequent accessibility that comes from sharing close personal bonds to victims, thereby increasing opportunities to offend. This is supported with the findings that a higher proportion of the adulthood-onset offenders abused family members, within their own homes. From a rational choice perspective, adolescents might simply also be less-skilled at concealing their offences, instead capitalizing impulsively on lapses in supervision rather than thinking through the risks (Caldwell, 2010). Indeed, while both groups tended to have established relationships with the victims, the findings suggest that adolescence-onset groups were more likely to offend against nonfamilial victims and within less familiar contexts (victim's home or someone else's home) than the adulthood-onset offenders. Thus, their access to victims and opportunity to offend are, by nature of this relationship, likely to occur on a less frequent basis. The lower proportion of adolescence-onset offenders engaging in penetrative acts with victims might also reflect differences in their stage of cognitive and sexual development (e.g., impulsivity, sexual curiosity and experimentation) or perhaps lack of sexual awareness and knowledge compared to adults. It may also indicate that adolescents were more cognizant of their restricted time to abuse thus limiting the range of sexual behaviors. These differences reflect a greater reliance on opportunity structures for adolescents than adults (Hunter, Hazelwood, & Slesinger, 2000) and points to potential ways

in which adolescent and adult behavior may be differentially influenced by factors present within their social ecologies. In this sense, some prevention efforts may be more effective when implemented with adolescents than adults.

Consistent with previous research, females were disproportionately represented as victims in this study, by both groups. However, there appeared to be some targeting by the adolescence-onset group with regard to choice of victim; male victims tended to be younger and female victims older in the adolescence-onset group. These patterns have been found elsewhere (Davis & Leitenberg, 1987; Finkelhor et al., 2009; Worling, 1995) and from a rational choice perspective, suggests that although adults - by virtue of their developmental status – might be more able to manipulate (physically and emotionally) younger and older children alike, adolescents may seek out younger male children, who are likely to be more physically and emotionally vulnerable than older males, to sexually abuse.

## **Implications**

Situational perspectives have long been overlooked in the sexual violence and abuse field. However, our findings, in line with other recent studies, point to the potential utility for these theories in the explanation of sexual offending behavior generally and more specifically for identifying situational factors that might enable or constrain sexually abusive behavior in adolescence and adulthood. Whilst not directly tested in this study, the findings also suggest that the dynamics of these relationships and offence settings might create precipitating conditions for sexually abusive behavior, in addition to creating opportunity (Wortley, 2001). This more recent dimension to the situational framework warrants more direct empirical investigation.

These findings also have implications for formulating primary- and secondary-level prevention initiatives, especially with regard to the relationship contexts and general settings within which these incidents typically occur. Prevention efforts need to focus more generally

on establishing safer relationships in the first instance and safer environments in the second instance. General prevention messages need to reinforce the point that child sexual abuse typically occurs within the context of existing (and well-known) relationships and within more private (domestic) settings. Targeting parents in these prevention forums will promote the notion of joint responsibility for safety; rather than the traditional approach on educating potential child victims to protect themselves. For potential offenders, prevention forums need to target adolescent audiences through media that increase the likelihood of reception and dissemination (e.g., social media messages, internet sites; recreational and other youth-oriented organizations; Finkelhor et al. 2009). School-based personal safety and sexual ethics programs and bystander intervention programs may help to forestall sexual abuse in adolescence. For potential adulthood-onset offenders, awareness and deterrence campaigns that identify potential signs for sexual abuse and offer referral to self-help programs are recommended.

To date, few sexual abuse prevention approaches have employed strategies to modify high risk environments (Kenny & Wurtele, 2012). Our findings reinforce the importance of creating safer environments, in addition to creating safer individuals. Practical situational crime prevention techniques that design-out abuse by minimizing potential risk factors and maximizing protective factors in common convergence settings is recommended. That said, our findings also suggest that some approaches might be more readily implemented with adolescents than adults, who are not subject to the same levels of supervision and scrutiny as adolescents. For example, communal play areas where line-of-sight can be maintained, open door policies in bedrooms and privacy in bathrooms are effective mechanisms for reducing opportunities for sexual abuse. However, these restrictions may be more difficult to enforce, and may be effectively challenged by, adults. In this sense then prevention messages must emphasize, above all, the importance of open communication within families, and of

identifying and communicating unsafe behavior when it does occur. Further to this, prevention education on how to be vigilant and responsive to these risks needs to extend beyond the potential individuals (victims or offenders) involved to strengthen formal and informal systems within their social ecology (peers, schools, employment and the community).

As this study was concerned with the onset of child sexual abuse, recommendations for tertiary prevention are therefore somewhat limited. That said, these findings highlight the potential advantages of assessment methods that are both offender-focused and offence-focused and for using systemic approaches to prevention that target these common contexts and circumstances of sexual abuse not only *before* these incidents occur, but *after*, so that the risk for reoffending is also reduced. Multi-systemic approaches are demonstrating success in this area with adolescent sexual offenders (e.g., Borduin, Shaeffer, & Heiblum, 2009) we suspect for these reasons. However, such approaches are given less attention in the treatment of adult sexual offenders. Existing adult offender-centered approaches might therefore benefit from incorporating these broader situational and ecological risk factors into the treatment and transitioning programs.

### **Limitations and Future Directions**

Few studies have directly compared adolescence-onset and adulthood-onset child sexual abuse, and none to our knowledge have examined this from a situational perspective. That said there were some limitations to the study. First, data were combined from three larger databases. Whilst this enables direct comparisons to be made, sampled from the same region, the circumstances in which the data were collected differed somewhat for the adolescence and adult samples; the adolescent sample was comprised mainly of community-based participants, whilst the adult sample was primarily custodial-based. Second, the data sourced for the adolescent sample was collated from several sources, whilst the data for the

adult sample was more reliant on retrospective, self-report information cross-referenced against official data available to the research team. While the reliability of our self-report data has been established, this raises some potential issues in this regard, a challenge faced in all offender research where self-report methods are employed. Third, as is common with sex offender research, the participants in this sample were all identified (detected) males offenders. Therefore findings may not be generalizable to other sexual offenders who have not yet come to the attention of the criminal justice system and no assumptions can be made about the context and circumstances in which females first sexually abuse children. Fourth, we are aware of the debates regarding conducting multiple comparisons without adjusting significance thresholds. Due to both the exploratory nature of this research, and that we had planned tests, we were reluctant to employ these methods to this study (Rothman, 1990). However, we remain mindful that these findings are therefore best considered as a starting point from which to further explore the onset of sexual abuse in adolescence and adulthood. Finally, while the recidivism data helps to provide some indication of the persistence of sexual offending from adolescence into adulthood, data was not available on the whole adolescent sample and the follow-up timeframe did not extend beyond the early to midtwenties. We also recognise that, being official data, this may be an underestimation of true number of sexual offences committed by the adolescent group. These limitations, nonetheless, present opportunities for future research, which we encourage.

In terms of theoretical and practical significance, these results indicate that the onset of child sexual abuse during adolescence and adulthood is a promising line of enquiry that needs to be pursued further, particularly as our results (and those of others) are pointing to the possibility of these being two discrete sexual abuse offender populations. Overall, these findings demonstrate the potential utility of situational theories for explaining and preventing sexually abusive behavior at these two life-stages, but also highlight that some practical

strategies might be more effective for preventing sexually abusive behavior in adolescence than in adulthood. Like dispositional theories, however, the application of situational theories only helps to explain part of the equation. This highlights the importance of incorporating situational crime prevention approaches with other offender-based prevention modalities to provide a holistic response that spans the prevention (i.e., primary, secondary and tertiary) spectrum. Hence, the next step in this enquiry should be to directly compare adolescence-onset and adulthood-onset sexual offending from a person-situation framework (Mischel, 1968), incorporating individual, situational and ecological factors associated with the onset of child sexual abuse to allow for a more theoretically sophisticated examination of how these incidents first occur during adolescence and adulthood. This will enable firmer conclusions to be made about how we should be conceptualizing and responding to child sexual abuse incidents during these two risk-periods. Continued longitudinal research that follows offending trajectories of these two groups beyond onset will add another important dimension to the issue that will help to answer tertiary-level questions regarding re-offense risk for these two groups.

This research was supported under a Criminology Research Council, Australian

Institute of Criminology Grant (CRG 51/98-99) with support from the Queensland Crime

Commission; Australian Research Council's Linkage Grant (LP0668287) in partnership with

Queensland Corrective Services; and Australian Research Council's Discovery Projects

Funding Scheme (Project: DP110102126) with the support and assistance of the Griffith

Youth Forensic Service. The views expressed herein are solely those of the authors, and do

not necessarily reflect the views or policies of these organizations.

### References

- Abel, G.G., Becker, J.V., Mittelman, M.S., Rouleau, J.L., & Murphy, W. (1987). Self-reported sex crime of non-incarcerated paraphiliacs. *Journal of Interpersonal Violence*, 2, 3-25. doi: 10.1177/088626087002001001
- Beauregard, E., Rossmo, D.K., & Proulx, J.A. (2007). Descriptive model of the hunting process of serial sex offenders: A rational choice perspective. *Journal of Family Violence*, 22(6), 449-463. doi: 10.1007/s10896-007-9101-3
- Beech, A. R., & Ward, T. (2004). The integration of etiology and risk in sex offenders: A theoretical model. *Aggression and Violent Behavior*, 10, 31 63.
- Borduin, C. M., Schaeffer, C. M., & Heiblum, N. (2009). A randomized clinical trial of multisystemic therapy with juvenile sexual offenders: Effects on youth social ecology and criminal activity. *Journal of Consulting and Clinical Psychology*, 77, 26-37. doi: 10.1037/a0013035
- Calder, M.C. (2001). *Juveniles and children who sexually abuse: Frameworks for assessment* (3<sup>rd</sup> ed.). Dorset, UK: Russell House Publishing.
- Caldwell, M. F. (2002). What we do not know about juvenile sexual reoffense risk. *Child Maltreatment*, 7, 291-302. doi: 10.1177/107755902237260
- Caldwell, M. F. (2010). Study characteristics and recidivism base rates in juvenile sex offender recidivism. *International Journal of Offender Therapy and Comparative Criminology*, 54(2), 197-212. doi:10.1177/0306624X08330016
- Clarke, R.V. (1997). Situational crime prevention: Successful case studies (2<sup>nd</sup> ed.).Guilderland, New York: Harrow & Heston.
- Clarke, R.V. (2008). Situational crime prevention. In R. Wortley & L. Mazerolle (Eds.), *Environmental criminology and crime analysis* (pp. 178 – 194). Cullompton, UK: Willan Publishing.

- Clarke, R. V. & M. Felson (1993). Routine activity and rational choice: Advances in criminological theory, Vol 5 (Eds.). New Brunswick, New Jersey: Transaction Books.
- Cohen, L. E., & Felson, M. (1979). Social change and crime rate trends: A routine activity approach. *American Sociological Review*, 44, 588-608.
- Cornish, D., & Clarke, R.V. (1986). Introduction. In D. Cornish & R. Clarke (Eds.), *The Reasoning Criminal* (pp. 1-16) New York: Springer-Verlag.
- Cornish, D.B., & Clarke, R.V. (2003). Opportunities, precipitators and criminal dispositions:

  A reply to Wortley's critique of situational crime prevention. In M.J. Smith & D.B.

  Cornish (Eds.), *Theory for practice in situational crime prevention* (pp. 41-96).

  Monsey, New Jersey: Criminal Justice Press.
- Cyr, M., Wright, J., McDuff, P., & Perron, A. (2002). Intrafamilial sexual abuse: Brother-sister incest does not differ from father-daughter and stepfather-stepdaughter incest.

  Child Abuse & Neglect, 26 (9), 957-973.
- Davis, G. E., & Leitenberg, H. (1987). Adolescent sex offenders. *Psychological Bulletin*, 101(3), 417 427
- Elliott, M., Browne, K., & Kilcoyne, J. (1995). Child sexual abuse prevention: What offenders tell us. *Child Abuse and Neglect*, *19*, 579-594. doi:10.1016/01452134(95)00017-3
- Finkelhor, D., Ormrod, R., & Chaffin, M. (2009). *Juveniles who commit sex offenses against minors*, Retrieved from Juvenile Justice Bulletin, U.S. Department of Justice, May 7<sup>th</sup> 2013, from https://www.ncjrs.gov/pdffiles1/ojjdp/227763.pdf.
- Groth, A. N., Longo, R. E., & McFadin, J. B. (1982). Undetected recidivism among rapists and child molesters. *Crime and Delinquency*, 28, 450 458.

  doi: 10.1177/001112878202800305

- Haigh, Y. (2009). Desistance from crime: Reflections on the transitional experiences of young people with a history of offending. *Journal of Youth Studies*, 12(3), 307-322. doi: 10.1080/13676260902775077
- Hanson, K. R. (2002). Recidivism and age: Follow-up data from 4,673 sexual offenders. *Journal of Interpersonal Violence*, 17, 1046-1062. doi: 10.1177/088626002236659
- Hindelang, M.J., Gottfredson, M.R., & Garofalo, J. (1978). Victims of personal crime: An empirical foundation for a theory of personal victimisation. Cambridge, UK: Ballinger Publishing Co.
- Hunter, J.A., Hazelwood, R.R., & Slesinger, D. (2000). Juvenile-perpetrated sex crimes:

  Patterns of offending and predictors of violence. *Journal of Family Violence*, *15*(1), 81-93. doi: 10.1023/A:1007553504805
- Kaufman, K.L., Orts, K., Holmberg, J., McCrady, F., Daleiden, E., Hilliker, D., Rotzien, A.,
  & Cravens, S. (1996). Contrasting adult and adolescent sexual offenders' modus
  operandi: A developmental process? Paper presented at the 15<sup>th</sup> Annual Research and
  Treatment Conference of the Association for the Treatment of Sexual Abusers,
  Chicago, Illinois.
- Kenny, M.C., & Wurtele, S.K. (2012). Preventing childhood sexual abuse: An ecological approach. *Journal of Child Sexual Abuse*, 21(4), 361-367. doi: 10.1080/10538712.2012.675567
- Laub, J. H., & Sampson, R. J. (2003). Shared beginnings, divergent lives: Delinquent boys to age 70. Cambridge, Massachusetts: Harvard University Press.
- Leclerc, B., Beauregard, E., & Proulx, J. (2008). Modus operandi and situational aspects in adolescent sexual offenses against children: A further examination. *International Journal of Offender Therapy and Comparative Criminology*, 52(1), 46-61. doi: 10.1177/0306624X07300271

- Leclerc, B., Smallbone, S., & Wortley, R. (2013). Prevention nearby: The influence of the presence of a potential guardian on the severity of child sexual abuse. *Sexual Abuse:*A Journal of Research and Treatment. Published online

  http://dx.doi.org/10.1177/1079063213504594
- Leclerc, B., Wortley, R., & Smallbone, S. (2011). Getting into the script of adult child sex offenders and mapping out situational prevention measures. *Journal of Research in Crime and Delinquency*, 48, 209-237. doi: 10.1177/0022427810391540
- Lussier, P., & Blokland, A. (2014). The adolescence-adulthood transition and Robin's continuity paradox: Criminal career patterns of juvenile and adult sex offenders in a prospective longitudinal birth cohort study. *Journal of Criminal Justice*, 42, 153-163. doi: 10.1016/j.jcrimjus.2013.07.004
- Lussier, P., Blokland, A., Mathesius, J., Pardini, D., & Loeber, R. (2015). The childhood risk factors of adolescent-onset and adult-onset of sex offending: Evidence from a prospective longitudinal study. In P. Lussier & A. Blokland (Eds.) *Sex offenders: A criminal careers approach.* New York: Wiley.
- Marshall, W.L. (2010). The role of attachments, intimacy, and lonliness in the etiology and maintenance of sexual offending. *Sexual and Relationship Therapy*, 25(1), 73-85. doi: 10.1080/14681990903550191
- Marshall, W. L., Barbaree, H. E., & Eccles, A. (1991). Early onset and deviant sexuality in child molesters. *Journal of Interpersonal Violence*, 6, 323 336. doi: 10.1177/088626091006003005
- Marshall, W. L. & Marshall, L. E. (2010). Attachment and intimacy in sexual offenders: an update. *Sexual and Relationship Therapy*, 25(1), 86-90. doi:10.1080/14681991003589568

- McCann, K., & Lussier, P. (2008). Antisociality, sexual deviance, and sexual reoffending in juvenile sex offenders: A meta-analytic investigation. *Youth Violence and Juvenile Justice*, 6(4), 363-385. doi:10.1177/1541204008320260
- McKillop, N., Smallbone, S., Wortley, R., & Andjic, I. (2012). Offenders' attachment and sexual abuse onset: A test of theoretical propositions. *Sexual Abuse: A Journal of Research and Treatment*, 24(6), 591-610. doi: 10.1177/1079063212445571
- Miranda, A. O., & Corcoran, C. L. (2000). Comparison of perpetration characteristics between male juvenile and adult sexual offenders: Preliminary results. *Sexual Abuse: A Journal of Research and Treatment, 12*(3), 179-188. doi: 10.1023/A:1009582025086
- Nisbet, I.A., Wilson, P.H., & Smallbone, S. W. (2004). A prospective longitudinal study of sexual recidivism among adolescent sex offenders. *Sexual Abuse: A Journal of Research and Treatment*, *16*(3), 223-233. doi: 10.1177/107906320401600304

Mischel, W. (1968). Personality and assessment. New York: Wiley.

- Rich, P. (2011). *Understanding, assessing and rehabilitating juvenile sex offenders* (2<sup>nd</sup> ed.).

  New York: Wiley.
- Rothman, K. J. (1990). No adjustments are needed for multiple comparisons. *Epidemiology*, 1, 43-46.
- Rudd, J. M., & Herzberger, S. D. (1999). Brother-sister incest --father-daughter incest: A comparison of characteristics and consequences. *Child Abuse & Neglect*, 23 (9), 915-928.
- Smallbone, S., & Cale, J. (2015). An integrated life course developmental theory of sexual offending. In A.Blockland & P.Lussier (Eds.). *Sex offenders: A criminal careers approach*. New York: Wiley.

- Smallbone, S., Leclerc., B., & Allard, T. (2010). Understanding and preventing youth sexual violence and abuse: An investigation of offender development, offending onset and progression. Australian Research Council Discovery Project (DP110102126).
- Smallbone, S. W., Marshall, W. L., & Wortley, R. (2008). Explaining child sexual abuse: A new integrated theory. In S.W. Smallbone, W.L., Marshall, and R. Wortley (Eds.), 

  \*Preventing child sexual abuse: Evidence, policy and practice (pp. 21-45).

  \*Cullompton, U.K.: Willan Press.
- Smallbone, S., & Wortley, R. (2000). Child sexual abuse in Queensland: Offender characteristics and modus operandi. Brisbane: Queensland Crime Commission.
- Smallbone, S.W., & Wortley, R.K. (2004). Onset, persistence and versatility of offending among adult males convicted of sexual offenses against children. *Sexual Abuse: A Journal of Research and Treatment, 16*, 285-298. doi: 10.1177/107906320401600403
- Smallbone, S. Wortley, R., Kebbell, M., & Rallings. (2005). A prospective longitudinal study of sexual offender recidivism. Australian Research Council LinkageProject (LP0668287).
- Snyder, H. N. (2000). Sexual assault of young children as reported to law enforcement:

  Victim, incident and offender characteristics, Retrieved from U.S. Department of

  Justice, Bureau of Justice Statistics March 22, 2013, from

  http://bjs.gov/content/pub/pdf/saycrle.pdf
- Thornberry, T.P., & Krohn, M.D. (2005). Applying interactional theory in the explanation of continuity and change in antisocial behavior. In *Advances in Criminological Theory* (Vol. 14, pp. 183–210). New Brunswick, New Jersey: Transaction.
- Waite, D., Keller, A., McGarvey, E.L., Wieckowski, E., Pinkerton, R., & Brown, G.L. (2005). Juvenile sex offender re-arrest rates for sexual, violent nonsexual and property

- crimes: A ten-year follow-up. *Sexual Abuse: A Journal of Research and Treatment,* 17(3), 313-331. doi:10.1177/107906320501700305
- Ward, T., & Beech, A. (2006). An integrated theory of sexual offending. *Aggression and Violent Behavior*, 11 (1), 44-63.
- Worling, J. R. (1995). Sexual abuse histories of adolescent male sex offenders: differences on the basis of the age and gender of their victims. *Journal of Abnormal Psychology*, 104 (4), 610 613
- Wortley, R. (2001). A classification of techniques for controlling situational precipitators of crime. *Security Journal*, *14*(4), 63-82. doi: 10.1057/palgrave.sj.8340098
- Wortley, R. (2008). Situational precipitators of crime. In R. Wortley & L. Mazerolle (Eds.), *Environmental criminology and crime analysis* (pp. 48-66). Cullompton, UK: Willan.
- Wortley, R. & Smallbone, S. (2006). Applying situational principles to sexual offenses against children. In R. Wortley, & S. Smallbone (Eds), *Situational prevention of child sexual abuse, Crime Prevention Studies*, 19 (pp. 7-35). Monsey, New York: Criminal Justice Press.
- Zimring, F. E. (2004). An American travesty: Legal responses to adolescent sexual offending. Chicago, Illinois.: University of Chicago Press.

# ADOLESCENCE VERSUS ADULTHOOD ONSET 32

Table 1. Inter-coder reliability of onset offense variables

(Pearson r and Kappa)

	Inter-coder reliability $n = 20$		
Victim gender	$1.00^{\mathrm{a}}$		
Victim age	1.00		
Victim-offender relationship	$0.93^{a}$		
Relationship length	$1.00^{a}$		
Offender age	0.99		
Offence setting	$1.00^{\mathrm{a}}$		

<sup>&</sup>lt;sup>a</sup>Kappa coefficients used for categorical variables

# ADOLESCENCE VERSUS ADULTHOOD ONSET 33

Table 2. Onset sexual abuse incident characteristics by adolescence-onset and adulthood-onset groups

	Onset Group			Test	
	Adolescence $n = 230$	Adult $n = 280$	– Total <i>N</i> = 510	Chi-square/F	<i>p</i> -value
Victim characteristics					
Age	8.15 (3.55)	11.03 (3.03)	9.73 (3.57)	89.40 <sup>a,b</sup>	<.001
Gender				0.83	.364
Female	72.2%	75.7%	74.1%		
Male	27.8%	24.3%	25.9%		
Victim-offender relationship				8.91 <sup>b</sup>	.012
Familial	43.5%	56.1%	50.4%		
Nonfamilial	49.6%	36.7%	42.5%		
Stranger	7.0%	7.2%	7.1%		
Offence setting				5.20°	.074
Domestic	82.3%	80.7%	81.8%	2.20	.07.1
Organizational	7.4%	2.3%	5.9%		
Public	10.2%	17.0%	12.2%		
Sexual behaviours				5.42 <sup>b</sup>	.020
Penetrative	47.4%	57.8%	53.0%	01.12	.020
Non-penetrative	52.6%	42.2%	47.0%		
Frequency of contact				46.72 <sup>b</sup>	<.001
Once	47.8%	25.6%	35.7%	10.72	1.001
2 -10 times	43.5%	44.0%	43.8%		
11- 50 times	7.8%	24.2%	16.8%		
More than 50 times	0.9%	6.1%	3.7%		
Duration of contact				46.82 <sup>b</sup>	<.001
One day	53.5%	26.6%	38.8%	10.02	\.UU1
Between 1 day & 1 month	8.3%	9.9%	9.2%		
Between 1 & 6 months	17.1%	16.8%	16.9%		
More than 6 months	21.1%	46.7%	35.1%		
			-		
Offence witnessed	21.0%	4.7%	16.3%	12.04 <sup>b,c</sup>	.001

<sup>&</sup>lt;sup>a</sup>Mean, standard deviation (in brackets) are presented <sup>b</sup>Values were missing (2-14 missing depending on cell) <sup>c</sup>Data available on a smaller subset of adult offenders (n = 88) and adolescence offenders (n = 215)