

INNOVATE TO STRENGTHEN MULTIDISCIPLINARY WORK IN CHILD ABUSE: THE CONTRIBUTION OF AN INTEGRATED INFORMATION SYSTEM

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Abstract

The assessment and care of sexually or physically abused children and their families require the multidisciplinary collaboration of the medical, psychosocial, police and justice sectors. On the initiative of Youth Protection Agency (YPA) and a university hospital in Quebec City, Canada, a new program named *Services intégrés en abus et maltraitance* (SIAM; Integrated Services in Abuse and Maltreatment) was launched in 2018. Based on the Child Advocacy Centers model, the SIAM provides children, adolescents and their families with on-site integrated clinical assessment, investigation, treatment, support and advocacy services (Alain, Nadeau & al., 2016).

The success of child maltreatment interventions requires evaluation and research activities, but especially the integration of available data and expertise (Alain, Clément & al., 2022). Therefore, the multi-agency representatives involved in the SIAM were mobilized to develop, within the SIAM, an innovative information system. This system meets operation, evaluation and research needs with integrated, compatible and continuous clinical and administrative data.

This communication aims to: 1) present the main characteristics of the SIAM innovative and Integrated Information System (IIS), as well as the issues associated with its creation and exploitation and 2) present the results of the first exploratory study using this IIS and share potential advances in terms of knowledge and practices.

The sample of this exploratory study consists of 1633 situations referred to the SIAM and for which the service trajectory had ended as of December 2021. One of the main advantages of this integrated system is its capacity to follow the entire trajectory of socio-judicial services, from the moment the situation is reported to YPA until the judicial process, including psychosocial and trauma-informed support. Following the initial multidisciplinary triage discussion, 40% (n = 653) of the situations went to the police investigation stage, whereas the other 60% (n = 980) were redirected to YPA only. Charges were laid in 7% (n = 47) of the situations investigated by the police and trauma-informed support services were granted in 4% (n = 73) of all the situations under study (investigated or not). Descriptive and bivariate analyses about the situations and a comparison between the situations in which trauma-informed support services were granted and those without such support will be presented.

Keywords: *Child abuse and maltreatment, integrated information system, multidisciplinary (psycho-socio-judicial) trajectories, trauma-sensitive approach.*

1. Introduction

The assessment and care of sexually or physically abused children and their families require the multidisciplinary collaboration of the medical, psychosocial, police and justice sectors. Since 2001, a socio-judicial protocol has enabled the various professionals involved in the care of child victims of abuse to work together and share information with the aim of ensuring an adequate, continuous and coordinated response to the needs of child support and protection in the province of Quebec, Canada. This protocol

involves children under 18 who are victims of physical abuse, sexual abuse or serious neglect, as well as their families.

On the initiative of a university-based Youth Protection Agency (YPA) and a university hospital, a new program named *Services intégrés en abus et maltraitance* (SIAM; Integrated Services in Abuse and Maltreatment) was launched in 2018. Based on the Child Advocacy Centers model, the SIAM provides children, adolescents and their families with on-site integrated clinical assessment, investigation, treatment, support and advocacy services. The SIAM covers the regions of Quebec City and part of *Chaudière-Appalaches*, Canada. Before its implementation, a needs assessment and feasibility study was conducted to establish a balance between priority needs and the resources required to meet them (Alain, Nadeau & al., 2016).

In 2022, the SIAM brought together nearly 200 professionals, from two YPA, four police forces, the Crown prosecution, a medical team (pediatricians and nurses) specialized in child abuse and three trauma-informed psychosocial support services. The SIAM also benefits from its association with senior researchers, as well as a research center.

The SIAM handles situations of physical abuse, sexual abuse and serious neglect that are reported to the YPA who chooses to disclose to the partners using its discretionary power. This represents more than 1,300 situations per year. In each of these situations, the trajectory of services begins with a multidisciplinary discussion, named the “triage”, that takes place right after the report. The triage aims to determine whether or not a police investigation will be carried out with the aim of filing court charges against the alleged abusers. The triage team involves the SIAM child advocate, a nurse, managers of the YPA and police services, and a district crown attorney. At the time of the triage, the situation is already under the responsibility of YPA, and if a police investigation is not carried out, they continue their work alone. Support services are provided at all stages of the SIAM trajectory according to the needs of the children and their families.

The SIAM partners recognize that the success of child maltreatment interventions requires evaluation and research activities, but especially the integration of available data and expertise (Alain, Clément & al., 2022). However, in the literature, the need to better document the situations and trajectories of victims of abuse is supported by the work of several researchers and government authorities which reveals significant limitations in this area. The limits of information structures and the absence of a common database in Quebec makes it very difficult to know how situations evolve, to assess the quality of the processes involved and understand the impacts of multidisciplinary trajectories on children and their family. Therefore, the multi-agency representatives were mobilized to develop, within the SIAM, an innovative and integrated information system. This system meets operation, evaluation and research needs with integrated, compatible and continuous clinical-administrative data.

This paper aims to: 1) present the main characteristics of the SIAM innovative and Integrated Information System (IIS), as well as the issues associated with its creation and exploitation and 2) present the results of the first exploratory study using this IIS and share potential advances in terms of knowledge and practices.

2. The SIAM information system: characteristics and creation and exploitation issues

The SIAM integrated information system was developed in a concerted effort between researchers and practitioners, using field observations and consultations with each of the partners. Steps were taken with each of the partners to formalize through legal agreements the sharing of information to feed the database. Since the legislative framework is different for each partner, the creation of these legal agreements was considerably challenging and took more than a year with numerous meetings with each of them. Such a common database works insofar as all partners agree to integrate their data into the database to contribute to an overall profile of the entire multidisciplinary trajectory. Problems remain to be solved concerning access to medical data, but agreements were signed for all other partners. Deadlines for destruction of data are also short and strict within the YPA. Since the majority of the data come from these agencies, the SIAM has to follow the same rules so it represents a challenge for conducting longitudinal research projects.

Information has been constantly improved since the creation of the database, and additions and modifications are made retroactively. Many methods of data collection have been developed in order to gather complete information regarding the characteristics of the situations reported, the services rendered throughout the multidisciplinary (psycho-socio-judicial) trajectory, as well as the clinical evaluation of the well-being and needs of children and their families.

First, a case tracking file of the entire multidisciplinary trajectory regarding every situation of child abuse has been built and is updated daily with new situations. Answer choices are predetermined for each variable in the database to ensure standardized input. Given the large volume of situations to keep track of double validation is not achieved systematically. Since the same child can be victim of multiple discrete

abuses in his/her lifetime, it is possible that several trajectories in the database relate to the same child. For multiple trajectories to be created for a single child, the situations must represent distinct judicial processes. For example, a child victim of physical abuse by a parent and sexual abuse by a classmate will be the subject of two distinct multidisciplinary trajectories in the database. However, a child victim of repeated physical abuse by both parents will be the subject of a single trajectory since the multiple events and abusers will be addressed in the same judicial process. The case tracking allows to quickly identify which services have been rendered, by whom and when. The trajectories are updated by consulting youth protection files and by ad hoc transmission of updated case load by police partners and prosecutors. All requests for trauma-informed support from SIAM are centralized and psychosocial workers send back a summary of the interventions when the follow-up is closed. This procedure allows to update the support services information in the case tracking. In view of the large volume of situations disclosed each day, maintaining the case tracking up to date constitutes a great amount of work.

Second, the initial multidisciplinary discussion (triage) is widely documented. Information regarding the socio-demographic (gender, age, residential place, etc.) and factual information about the situation of abuse (frequency, chronicity, child-abuser relationship, etc.) and emergency response before the triage is taken from the disclosure by the YPA. Antecedents (child and alleged abusers), decision-making issues and decision to pursue or not the police investigation are documented following the discussion. Properly documenting the starting point of the multidisciplinary trajectory is essential, since information on the nature of the situation and the surrounding circumstances makes it possible to understand the subsequent interventions.

Third, the *Child and Adolescent Needs and Strengths (CANS)* tool is used by YPA of the SIAM at the time of the psychosocial investigation (Lyons, 2009). Furthermore, a clinical protocol, comprising 11 standardized tools, assesses four elements of child functioning (executive functions, trauma, attachment and problematic sexual behaviors) and five of parents' functioning (adverse experiences during childhood, psychological distress, rearing practices, parental support to disclosure, and violence justification). This protocol makes it possible for the stakeholders to support a sustained clinical intervention in a psychometric and more standardized way. This protocol is used by YPA in the context of follow-ups when the situation of children is compromised and by voluntary support services. This exploratory research project aims to target potential improvements in order to consolidate the database for the long term.

3. Method

The study population therefore includes children for whom the situation of abuse or maltreatment has been treated by SIAM multidisciplinary partners. Authorization from the Research Ethics Committee and the Department of Professional Services of the *Centre intégré universitaire en santé et services sociaux de la Capitale-Nationale* was obtained to gain access to the data. The sample consists of 1633 situations referred to the SIAM and for which the service trajectory had ended as of December 2021. No distinction is made in the present study between children who have a single trajectory and those who have several. Descriptive and bivariate analyses were performed regarding multidisciplinary trajectories.

4. Results

4.1. Descriptive analyses

The sample includes 1633 multidisciplinary trajectories that involve 1552 children (1441 children have one trajectory; 111 have 2 to 4 trajectories). The following table presents the characteristics of the situations of abuse (Table 1).

Table 1. Main characteristics of the situations at the time of the triage.

Gender (n = 1633)	Female	980 (60%)
	Male	653 (40%)
Age (n = 1632)	0-2 years old	164 (10%)
	3-5 years old	280 (17%)
	6-11 years old	530 (33%)
	12-17 years old	658 (40%)
Residential location (n = 1583)	Parents together	593 (37%)
	Parents separated	263 (17%)
	Mother only	476 (30%)
	Father only	107 (7%)
	Placement under Youth Protection Law	129 (8%)
	Other	15 (1%)

History of child protection services (n = 1013)	First report	466 (46%)
	At least one previous report	547 (54%)
Type of abuse (n = 1633)	Physical abuse	893 (55%)
	Sexual abuse (includes sexual exploitation and lure)	695 (43%)
	Both physical and sexual abuse	17 (1%)
	Serious neglect	28 (2%)
Frequency of abuse (n = 1037)	Single event	300 (29%)
	Recurring events	737 (71%)
Number of abusers (n = 1561)	Single abuser	1368 (88%)
	Multiple abusers	193 (12%)
Age of the abuser(s) (n = 1489)	Minor abuser(s) only	229 (15%)
	Adult abuser(s) only	1256 (84%)
	At least one minor and one adult abusers	4 (0%)
Child – abuser relationship at the time of the abuse (n = 1589)	Intrafamilial ¹ abuser(s) only	943 (59%)
	Extrafamilial ² abuser(s) only	635 (40%)
	At least one intrafamilial and one extrafamilial abusers	11 (1%)

¹ Includes parents/step-parents, siblings/step-siblings.

² Includes grandparents, uncle/aunt, boyfriend/girlfriend, friend, neighbour, person in authority, other known person, unknown person.

With regard to their degree of urgency, 3% of the situations were deemed to require immediate intervention, 43% to require intervention within 24 hours, and 54% were placed on a waiting list. Following the triage, 60% of the situations were redirected to YPA regular services only, whereas 40% were directed to police investigation. In 47% of these investigations, forensic interview was used as an investigation technique. More than three quarters (79%) of police investigations were closed at the police level and 21% were submitted to the prosecutor for potential filing of court charges. Court charges were laid in 36% of those situations. At least one abuser was convicted in 87% of the situations in which court charges were laid. Thus, very few situations reach the end of the judicial process, but when they do, the vast majority result in a conviction.

Of all the situations discussed at the triage (investigated or not; n = 1633), only 73 (4%) were granted trauma-informed support services. These situations mainly involved teenagers (mean age = 13.09, SD = 4.04), girls (81%), victims of sexual abuse (88%), and victims of extrafamilial abuser(s) (74%). Most of these situations were directed to police investigation (79%), but were closed at the police level rather than submitted to the prosecutor (73%).

The CANS was completed in only 4% of all situations (n = 68). Children who were evaluated were no different from those who were not in terms of gender, age and type of abuse. However, they differed in terms of the relationship with the abuser (more intrafamilial abusers; $X^2(1) = 9.52, p < .01$), as well as the triage decision (more were directed to police investigation; $X^2(1) = 32.20, p < .001$). Therefore, they were not comparable in all respects to the children for whom no CANS was completed. Differences between trajectories with and without CANS may be due to established processes for completing CANS, more than to any real differences between children or situations. Indeed, YPA carries out a psychosocial investigation mainly in cases of intrafamilial abusers and the SIAM social workers who complete the CANS are specialized in pursuing the multidisciplinary trajectory with the police and prosecutors. They are assigned in priority to situations for which a police investigation is conducted.

Children who were evaluated have between 0 and 3 confirmed diagnoses ($M = 0.56, SD = 0.88$). Overall, YPA psychosocial workers identified few needs and difficulties, as well as good child and family strengths, as presented in Table 2. Unfortunately, the clinical protocol was administered in only two situations under study. These clinical results cannot be interpreted in the present study.

Table 2. Descriptive analyses of the CANS.

	N	Min.	Max.	Mean	SD
Child difficulties – Mental health (0-24)	70	0	15	3,83	4,072
Child difficulties – Risky behaviors (0-21)	74	0	11	0,77	2,174
Child difficulties – Daily functioning (0-12)	22	0	8	1,77	2,506
Child difficulties – Developmental risk factors (0-6)	73	0	1	0,06	0,229
Child difficulties – Sleep (0-3)	74	0	3	0,24	0,637
Child strengths (0-15) *	73	0	15	3,97	4,187
Family strengths (0-9) *	75	0	9	2,61	2,640

* For this scale, a higher the score is indicative of fewer strengths.

4.2. Bivariate analyses

With regard to the nature of the situations, knowing the gender of the child improved the ability to predict the type of abuse by 26% ($X^2(1) = 267.12, p < .001; \lambda = 0.261, p < .001$); 58% of the physical abuses involved boys, while 82% of sexual abuses and 94% of concomitant physical and sexual abuses involved girls. The age of sexual abuse victims ($M_{age} = 12.47, SD = 4.15$), at the moment of the triage, was significantly higher than the age of physical abuse victims ($M_{age} = 8.02, SD = 4.46$). Children reported for serious neglect ($M_{age} = 3.98, SD = 2.66$) were significantly younger than children reported for other types of abuse (KWT $p < .001$). There were strong associations between the type of abuse and having at least one intrafamilial abuser ($X^2(1) = 491.03, p < .001$), as well as the type of abuse and having at least one extrafamilial abuser ($X^2(1) = 473.59, p < .001$). In situations with at least one intrafamilial abuser, versus none, the more prevalent type of abuse was physical abuse (77%), In situations with at least one extrafamilial abuser, versus none, the more prevalent type was sexual abuse (75%).

With regard to the multidisciplinary services, situations placed on a waiting list involved significantly older children ($M_{age} = 11.66, SD = 4.36$) than situations handled immediately ($M_{age} = 8.35, SD = 5.39$) or within 24 hours ($M_{age} = 7.76, SD = 4.58$; KWT $p < .001$). A weak to moderate association was found between the degree of urgency of the situation and the type of abuse (Cramer's $V = 0.304, p < .001$). In situations requiring immediate or within-24h intervention, physical abuse was represented in higher proportions (57% and 74% of situations, respectively), while situations placed on a waiting list involved more sexual abuse (60%). Regarding triage decision, cases that returned to YPA services alone were more often cases of physical abuse (66%), while cases investigated by the police were more often cases of sexual abuse (60%) ($X^2(1) = 140.83, p < .001$). Only one-third (33%) of situations involving at least one intrafamilial abuser were directed to a police investigation following triage ($X^2(1) = 55.55, p < .001$). One reason for this may be that the judicial process is generally not in the best interest of children in these situations and psychosocial intervention is preferred. Thus, court charges were laid in more situations of sexual abuse (75%) than physical abuse (25%). Almost all (93%) situations for which court charges were laid resulted in the conviction of at least one abuser, regardless of the type of abuse ($X^2(1) = 2.52, ns$).

5. Discussion / Conclusion

One of the main advantages of the SIAM innovative and integrated information system is its capacity to follow the entire trajectory of socio-judicial services, from YPA services to the judicial process, including psychosocial trauma-informed support. It is the first intersectoral database regarding situations disclosed in the context of the Quebec socio-judicial protocol. This information system helps child advocates exercise their function, which includes defending children's rights and making sure they have the appropriate services at the proper time. However, feeding the database represents a constant, but necessary, heavy workload. The relatively small number of situations involving judicial process and trauma-informed support services may be due to the fact that the SIAM was only in its third year of operation at the time of data extraction. Since the judicial process and support services take more time, it is possible that a significant number of situations that were disclosed in 2020-2021 were still ongoing at the moment of extraction in December 2021.

Further analyses should explore a sample of ongoing and completed trajectories in order to document, in a more comprehensive and representative manner, the trajectories of the judicial process and trauma-informed support services. Such a sample would also make it possible to compare children victimized once to those polyvictimized. Future analyses of the clinical protocol will allow a better understanding of the well-being of children and their families, its evolution over time, as well as how it is associated with different characteristics of situations and services.

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