The CHAT Project: Paediatricians and Mental Health Clinicians: Working Together for the Sake of the Children

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Abstract

Introduction: The Shared Care model, originally developed to address the paucity of adult mental health resources, has potential applicability to the design and delivery of mental health services for children and youth. With a similar prevalence of mental illness and more difficulty accessing mental health care than adults, Canadian children and youth have been even less well served than their parents. As there is a significant overlap in the types of health concerns for which children and youth are seen by mental health clinicians and paediatricians, building improved collaboration between these groups is an obvious, though under-utilized, method of enhancing mental health care for this population. The CHAT project was a one year collaboration involving three different types of collaborative activities between mental health clinicians and paediatricians. **Methods:** Out-patient mental health clinicians and community paediatricians were surveyed about their educational needs and interests. A community paediatrician joined an outpatient mental health care team, continuing professional educational activities were provided by each group for the other and were evaluated. **Results:** The paediatrician's participation was evaluated positively by team members. Eighty-three percent of mental health clinicians (n=10) rated the educational sessions positively and 77.8% (n=7) noted increased knowledge. Paediatricians expressed strong interest in having more mental health-related educational activities. **Conclusion:** This small project provided opportunities for useful exchanges between mental health clinicians and community paediatricians and preliminary evidence that shared care initiatives for children and youth should be further researched.

Key words: shared care, collaborative mental health care, paediatric mental health, child psychiatry

Résumé

Introduction: Conçu à l'origine pour pallier le manque de ressources en santé mentale pour adultes, le modèle de soins partagés peut s'appliquer à la conception et à la prestation des services en santé mentale destinés aux enfants et aux adolescents. Bien que les enfants et les adolescents canadiens souffrent autant de maladie mentale que les adultes, il leur est plus difficile d'accéder aux soins. Puisque les problèmes de santé mentale de cette population qui sont traités par les cliniciens en santé mentale et les pédiatres se recoupent fréquemment, la meilleure façon d'améliorer ces services – bien que rarement utilisée – est de faire appel à la collaboration de ces deux professions. Dans le cadre du projet CHAT, cliniciens en santé mentale et pédiatres ont collaboré, pendant un an, de trois manières. **Méthodologie:** Les cliniciens et pédiatres de la communauté ont reçu un sondage sur leurs besoins en formation et leurs centres d'intérêt. Un pédiatre s'est joint à l'équipe de santé mentale; chaque groupe a organisé des activités de formation permanente pour l'autre groupe, lequel évaluait la formation. **Résultats:** La participation du pediatre a été jugée positive par les cliniciens. Quatre-vingt-trois pour cent des cliniciens en santé mentale (n = 10) ont attribué une note positive aux séances de formation; 77.8 % d'entre eux (n = 7) ont déclaré avoir acquis des connaissances. Les pédiatres ont exprimé le souhait de suivre davantage de formations en santé mentale. **Conclusion:** Ce modeste projet a permis aux cliniciens en santé mentale et aux pédiatres d'avoir des échanges fructueux; il a confirmé que les programmes de partage des soins devront faire l'objet de futurs travaux de recherche. **Mots clés:** soins partagés, collaboration en santé mentale, santé mentale pédiatrique, psychiatrie de l'enfant

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Rationale

It is estimated that one in five Canadian children and youth suffer from diagnosable mental illness (Offord et al, 1987; Waddell & Shepherd, 2002). Over seventy percent of children and youth with serious mood disorders are undiagnosed or inadequately treated (Coyle et al, 2003). There are very few mental health resources designed specifically for children and youth. Rushton and colleagues (2002) found that most children and youth presenting with mental health issues receive their follow-up care from a family physician or paediatrician. Children with chronic medical illness, who have a higher incidence of mental health concerns than their healthy peers, are more likely to receive their medical care from a paediatrician than from a family physician (Cadman et al, 1987).

Despite the fact that family physicians and paediatricians provide a high proportion of mental health services to children and youth, they consistently report receiving inadequate training in the management of paediatric mental health problems (Davidson et al, 2001, unpublished; Ross et al, 2004; Rushton et al, 2002). The combination of limited services and inadequate professional training mandates development of innovative mental health initiatives to allow more effective screening, diagnosis and treatment (Geist, 2004).

Recent innovations in mental health care delivery in Canada have come from the development of collaborative care initiatives between primary care and mental health service providers. Most research on collaborative care has focused on new approaches to shared care in adult mental health (Lucena & Lesage, 2002) and, in particular, between family physicians and psychiatrists. Shared care is defined as "a process of collaboration between the family physician and the psychiatrist which enables the responsibilities of care to be apportioned according to the treatment needs of the patient at different points in time.... Reflecting the respective skills of the family physician and the psychiatrist" (Craven & Kates, 2000).

Background

In Canada, the adult Shared Care movement formally began in 1996 (Craven & Bland, 2002; Kates et al, 1997). A Collaborative Working Group between the College of Family Physicians and the Canadian Psychiatric Association was formed to "enhance the quality of care for Canadians with mental health problems through better collaboration between family physicians and psychiatrists" (Craven et al, 2000). Strategies for shared care included the creation of a database of evidence, a scan of shared care projects across the country and publication of a directory (Kates & Ackerman, 2002). The directory was disseminated to all member psychiatrists and family physicians.

In 2004, a consortium of national health care professional organizations and consumer groups formed a joint working group to further the mandate of Shared Mental Health Care. Funded by Health Canada, the group's goals included: strengthening liaisons with Ministries and other funding sources to advocate for support of collaborative models; developing a national list of key potential champions for Shared Care; gathering and publishing existing educational initiatives, and expanding mental health training during residency afterwards.

Mental health training was to include "CME dealing with the skills necessary to co-manage

patients with mental health disorders" (Craven & Kates, 2003).

At the end of the two year process, the group released a report (CCMHI, 2006) which included recommendations for future collaborative research, networking and additional training in shared care for family medicine residents. The group also recommended that toolkits outlining suggested methodologies be created for providers and planners serving specific populations, such as children and youth. These toolkits and the final report have subsequently been disseminated through the Shared Care website (Ackerman, 2006).

Despite the gradual development of national resources in shared mental health care for adults, based on a growing body of clinical experience (Kates & Ackerman, 2002), there remain far fewer resources for children and youth. Internationally, there is a much smaller body of paediatric Shared Care literature (Fritz, 2003), and until recently, very little has been written about interdisciplinary educational activities involving psychiatrists and paediatricians (Thomasgard, 1998; Schwam & Maloney, 1997). Because there has been so little research in this area, it is difficult to know if the results and recommendations from the adult shared care experience (Craven & Bland, 2006) are applicable to the paediatric population.

The CHAT project sought to identify and develop opportunities for enhanced collaboration between community paediatricians and mental health clinicians, by exploring three types of shared activity: hiring and integrating a paediatrician within a mental health care team, surveying clinicians about their perceived educational needs and then based on the results, providing mental health-related continuing medical education for paediatricians and paediatric education sessions for mental health clinicians.

CHAT's goal was to increase professional contact and cooperation between clinicians who share a strong investment in the quality of care for children and youth with mental health concerns. The following paper outlines the project's design, outcomes and future directions.

Methods

Setting

The Children's Hospital of Eastern Ontario (CHEO) is a tertiary care university-affiliated

teaching hospital providing a full spectrum of health care services for children and youth in the Champlain Health District (population 1.1 million). During the life of the project (2006-2007), CHEO delivered a variety of outpatient mental health services via six multidisciplinary teams. The setting for the CHAT project was the hospital's community mental health centre located in the urban core.

A common pathway for accessing paediatric mental health care within the District begins with a family physician. The family physician may refer patients directly to CHEO or to a paediatrician, who may manage patients themselves or, in turn, refer children with more complex problems to other specialized care providers, including CHEO. Many paediatricians in the District provide primary and chronic care for children and youth. Some provide mainly consultation services to primary care clinicians. They may therefore also refer their own patients to the hospital's mental health outpatient services.

The CHAT project investigators were based within the General team, a multi-disciplinary team providing mental health services for 6-16 year olds presenting with more than one mental health-related diagnosis. Members of the team included child and adolescent psychiatrists, psychologists, occupational therapists, a social worker and a child and youth worker, as well as trainees in all disciplines.

Participants

Twenty-seven out of forty two (64.3%) active community paediatricians within the Champlain Health District participated in the project. Sixteen out of twenty-seven (59.2%) CHEO outpatient mental health clinicians participated in the educational activities, including seven members of the General team.

Ethics & Funding

The CHEO Research Ethics Board reviewed and approved the CHAT project. The CHEO Psychiatry Associates Research Fund provided funding.

Study design

General Team Collaboration

A community paediatrician (one of the researchers) was hired to join the General Team on a part-time basis. She participated in team meetings, case-based discussions and in joint assessments of children and youth. The paediatrician delivered follow-up mental health and/or paediatric care, where indicated. A child and adolescent psychiatrist (another research partner) shared in clinical supervision, with other team members. After one year, members of the team were surveyed to evaluate the perceived usefulness of the paediatrician's involvement. Using the internal mail system, surveys were sent and returned to the project's research assistant, located off-site. The research assistant reviewed and summarized the findings.

Continuing Education Activities (paediatric topics for mental health clinicians)

Outpatient mental health clinicians were surveyed to identify the most common mental health/behavioural problems and the most challenging paediatric health issues seen in their clinical practices. They were asked how confident they felt dealing with paediatric medical issues when they are part of the clinical presentation. In particular, they were asked to assess their understanding of the interplay of organic and psychological factors in mental illness, as well as their confidence in deciding when to refer to a medical specialist. They were invited to identify paediatric health-related topics of educational interest. Based on the results, seven hourlong 'learn at lunch' talks (given by paediatricians) were offered to the mental health clinicians, on the following topics: sleep problems, encopresis, child abuse and physical punishment, failure to thrive, the approach to adolescents with medically unexplained symptoms and "paediatric grab-bag" (case vignettes). Each interactive session included a complimentary lunch. Following each session, attendees were asked to complete a short evaluation form. Subsequently, a survey was mailed to all members of the outpatient mental health team to evaluate the perceived usefulness of the educational sessions. Results were anonymously compiled off-site by the research assistant.

Continuing Education Activities (mental healthrelated topics for paediatricians)

Community paediatricians were anonymously surveyed about many aspects of mental health care. These included: their mental health training; the most common psychiatric/behavioural problems seen in practice; their confidence, skills and knowledge dealing with a variety of mental health concerns; their experience with referral to other health-care services, including CHEO's centralized mental health intake service and their felt needs for mental health education.

Based on the compiled survey results, paediatricians preferred a single, (weekend) daylong continuing medical education (CME) event, to a series of individual sessions. A full-day CME, accredited by the Royal College of Physicians and Surgeons, was offered. Three child and adolescent psychiatrists presented participatory sessions on aspects of developmental psychopharmacology, paediatric anxiety and depression. Participants were asked to evaluate the session. Results were anonymously compiled by the research assistant.

Data analysis

Data were analysed using SPSS 14.1 for Windows. Descriptive statistics were obtained by frequency analysis, and measures of central tendency. Not all questions were answered by each participant. However, all available responses have been included, accounting for variation in sample sizes.

Results

General Team Participation There was full agreement (n = 5, 100%) on the general team that having a paediatrician on the team was perceived by clinicians to have a positive effect on patient care. Representative comments included: "great opportunity to share views, great teaching method," "more comprehensive diagnostic assessment and better overall care" and "helped clinicians learn to incorporate a paediatric medicine angle into their overall perspective."

Continuing education (mental health clinicians)

The demographic and descriptive characteristics of the mental health clinicians who responded to the survey are presented in Table 1. Survey results showed that the top three medical problems posing challenges for responding mental health clinicians are sleep problems (n = 5, 27.8%), seizures (n = 4, 22.2%) and obesity (n = 4, 22.2%). The most requested topic for a paediatric educational talk was sleep problems (n = 15, 78.9%).

The talks rated as most useful were sleep problems (n = 3, 25.0%), encopresis (n = 3, 25.0%) and child abuse and physical punishment (n = 3, 25.0%). Over eighty percent (n = 10, 83.3%) stated that the sessions had made a positive difference and 77.8% (n = 7) noted that they had contributed to an increase in knowledge and perspective. A sampling of respondents' comments included, "new and widened perspective in understanding child/ family difficulties, presenting symptoms, etc."

Table 1. Demographic and descriptive characteristics of mental health clinicians

Variables	Frequency
Gender Female Male	14 (77.8) 4 (22.2)
Years in Practice 0-5 11-15 16-20 21-25 26-30 31+	$\begin{array}{c} 4 \ (21.1) \\ 2 \ (10.5) \\ 4 \ (21.1) \\ 4 \ (21.1) \\ 1 \ (5.3) \\ 4 \ (21.1) \end{array}$
Percentage of Patients in each Age Bracket (<i>M</i> ± SD) 0-5 6-10 11-14 15-18	$\begin{array}{c} 2.5 \% \pm 3.9 \\ 33.8 \% \pm 19.5 \\ 43.3 \% \pm 17.2 \\ 20.4 \% \pm 12.4 \end{array}$
Referred a Patient to a Paediatrician in the Past Year Yes No	4 (21.1) 15 (78.9)

a. Data are n (%) unless otherwise marked

and "highlighted the importance of working as a team to support patients (and their families) when dealing with medically unexplained symptoms." Respondents were asked to identify other topics of interest for future paediatric educational sessions. Puberty-related disorders were of most interest (n= 12, 44.4%).

Continuing education (paediatricians)

The demographic and descriptive characteristics of the responding paediatricians are presented in Table 2. For almost half of respondents (n = 12, 46.2%), over 20% of clinical activity is focused on mental health issues. The most common mental health problems seen in practice are Attention Deficit/Hyperactivity Disorder (n = 28, 26.4%), behaviour problems (n = 24, 22.6%), and anxiety (n = 15, 14.2%). Over ninety percent (n = 26, 96.3%) said they were interested in participating in continuing medical education related to mental health issues and 52.9% (n = 9) rated mental healthrelated issues as their highest priority relative to all other continuing education needs. The majority of paediatricians identified their preferred learning format as small group teaching by a child and adolescent psychiatrist and 54.2% (n = 13) identified weekends as the most convenient time for continuing medical education.

Based on the survey responses, a day long CME event was held on a weekend. Seven paediatricians attended. Respondents' comments included "the access to people there that day was very, very helpful," "learnt a lot of practical information," and "I am more comfortable in diagnosing anxiety and depression and using different medications." All participants felt that the event's educational objectives were met. There was strong support for carrying out other mental health-related educational activities: "we need more CME sessions on similar topics especially about ADHD and co-morbid conditions, Bipolar disorders, behavioural and school problems as well as available community resources." There is no information about the paediatricians who did not respond to the survey or attend the CME event.

 Table 2. Demographic and descriptive characteristics of paediatricians

Variables	Frequency
Gender Female Male	11 (40.7) 16 (59.3)
Years in Practice 0-5 6-10 11-15 16-20 21-25 26-30 31+	7 (25.9) 1 (3.7) 1 (3.7) 5 (18.5) 4 (14.8) 3 (11.1) 6 (22.2)
Percentage of Patients in each Age Bracket (<i>M</i> ± SD) 0-5 6-10 11-14 15-18	$\begin{array}{c} 45.1 \% \pm 21.9 \\ 26.9 \% \pm 8.8 \\ 19.2 \% \pm 12.4 \\ 9.0 \% \pm 8.7 \end{array}$
Refer Patients to CHEO Mental Health Intake Services Yes No	25 (96.2) 1 (3.8)
Refer Patients to Community Psychiatrists Yes No	22 (84.6) 4 (15.4)
Received Formal Training in Child Psychiatry Yes No	9 (34.6) 17 (65.4)
Satisfied with the Amount of Mental Health-Related Training Yes No	5 (19.2) 21 (80.8)

a. Data are n (%) unless otherwise marked

Discussion

Participants involved in the CHAT project's educational activities generally agreed that they benefited from their involvement and viewed their participation as having a positive impact on their ability to provide effective care for children and youth. Members of the General team viewed the paediatrician's participation as a positive addition to team functioning.

A limitation of the current project is that the views of consumers of mental health care were not taken into consideration. This should be addressed in future research. In the current study, families receiving care from the paediatric member of the general team were not specifically approached to evaluate their satisfaction with this approach. As a shared care pilot project, this study involved only one paediatrician, limited educational interventions and a short time frame. Only limited conclusions can be drawn about the efficacy and effectiveness of this approach, based on such a smallscale collaboration.

To ensure the most effective deployment of scarce resources and to justify the additional costs of bringing more professionals onto a team, future research should also identify measurable performance indicators such as reduced waiting times and more effective use of specialist resources and to demonstrate more timely and effective care for children and youth.

Historically, there has been a powerful tendency for health care providers to become isolated within separate silos created by professional identity and networks, organizational cultures, philosophies of care and funding mechanisms. The current project provided some small but tangible opportunities to break down communication barriers. These opportunities must continue to be created regularly, in order to promote the development of more formal models of collaboration.

Conclusion

It has been suggested that the future of child and youth mental health services will largely depend on enhanced collaboration between mental health care professionals and paediatricians. The CHAT project created several opportunities for improved communication and collaboration between mental health and paediatric care providers within the Champlain Health

District. The clinical collaboration allowed for an immediate interdisciplinary response to the combination of paediatric medical and mental health questions, which often arise in the outpatient mental health setting. It also allowed the paediatrician to gain new skills in the management of common mental health problems. The personal contact between paediatricians and child and adolescent psychiatrists was seen by participants as a step towards a closer, more collegial relationship. The educational sessions were perceived to increase participants' knowledge, broaden perspectives and provide the opportunity for interdisciplinary discussion. Overall, the CHAT project is felt to have encouraged both the mental health clinicians and paediatricians involved to continue to strive for ways to work together to improve the quality of care for children and youth.

On a broader scale, in order for Shared mental health care for children and youth to be developed significantly in Canada, professional groups such as the Canadian Academy of Child and Adolescent Psychiatry, the Canadian Paediatric Society, provincial Ministries, child and youth-serving organizations and other stakeholders, will need to strengthen links and secure sustainable funding to support similar initiatives, test and evaluate new models of care.

Acknowledgements/Conflict of Interest

The authors have no financial relationships or conflicts to disclose.

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