

Connecting youth with health services

Systematic review

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ABSTRACT

OBJECTIVE To identify models of health care delivery that support youth access to health and mental health care.

DATA SOURCES Information was obtained from PubMed, Ovid MEDLINE, Web of Knowledge, and Sociological Abstracts (CSA Illumina).

STUDY SELECTION Studies reviewed in this article provided level I, II, or III evidence.

SYNTHESIS Youth access health care, with the support of parents and family, through families' existing health care providers or family physicians. Youth might be reluctant to involve parents or to consult family physicians for health concerns related to substance use, emotional problems, or reproductive concerns. Primary health care service models need to support youth access to care and ensure that youth feel comfortable seeking care for all of their health concerns. School-based and community-based health care centres might be better positioned to meet the needs of youth than traditional office-based practices are.

CONCLUSION There is a growing body of evidence on health service models that support effective and accessible delivery of health and mental health services for youth. The health needs and challenges of youth are often predictable. Available evidence highlights the importance of including youth experience and voices in planning, delivery, and evaluation of services.

EDITOR'S KEY POINTS

- This article reviews the literature to identify models of health care delivery that provide youth with opportunities to readily access service and to initiate and develop relationships with health and mental health care providers.
- Almost half of teenagers are at moderate to high risk of adverse health outcomes due to high-risk sexual behaviour, psychosocial pressures, substance abuse, and lifestyle choices.
- Youth might not consult their family physicians for matters related to substance use, sexual health, or personal and emotional problems, because of concerns about confidentiality and discomfort with difficult subjects.
- The literature clearly indicates a need for a rational, comprehensive, and integrated approach to health care services for youth.



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Connecter les jeunes avec les services de santé

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RÉSUMÉ

OBJECTIF Identifier des modèles de soins de santé qui favorisent l'accès des jeunes aux soins de santé physique et mentale.

SOURCES DES DONNÉES L'information provient de PubMed, Ovid MEDLINE, Web of Knowledge et Sociological Abstracts (CSA Illumina).

CHOIX DES ÉTUDES Les études retenues présentaient des preuves de niveaux I, II ou III.

SYNTHÈSE Les jeunes ont accès aux soins avec l'aide des parents et de la famille, par l'entremise des intervenants qui soignent déjà leur famille ou de leurs médecins de famille. Ils peuvent hésiter à faire intervenir leurs parents ou à consulter un médecin de famille pour des inquiétudes en lien avec la consommation de drogues, des problèmes d'ordre émotionnel ou la reproduction. Les modèles de soins primaires doivent faciliter l'accès des jeunes aux soins et faire en sorte que les jeunes n'hésitent pas à rechercher de l'aide pour tout problème de santé qui les préoccupe. Les centres de santé des milieux scolaire et communautaire pourraient être mieux placés que les bureaux médicaux traditionnels pour répondre aux besoins des jeunes.

CONCLUSION Il y a de plus en plus de données en faveur de modèles de soins permettant aux jeunes d'avoir un accès facile à des soins de santé physique et mentale efficaces. Les soins dont les jeunes ont besoin et les défis qu'ils rencontrent sont souvent prévisibles. Les données existantes soulignent l'importance de tenir compte de l'expérience et de l'opinion des jeunes dans la planification, la dispensation et l'évaluation des services.

POINTS DE REPÈRE DU RÉDACTEUR

- Cet article fait une revue de la littérature pour identifier des modèles de prestation de soins qui favorisent l'accès des jeunes aux services et leur permettent d'initier et de développer des relations avec les intervenants en santé physique et mentale.
- La moitié environ des adolescents présentent un risque modéré à élevé de problèmes de santé en lien avec des comportements sexuels à haut risque, des pressions psychosociales, la consommation de drogues et un mode de vie particulier.
- Les jeunes pourraient ne pas consulter leur médecin de famille pour des questions de consommation de drogues ou de santé sexuelle, ou pour des problèmes d'ordre personnel ou émotionnel, parce qu'ils craignent pour la confidentialité et qu'ils sont mal à l'aise avec des sujets délicats.
- La littérature indique clairement que les soins de santé des jeunes exigent une approche rationnelle, globale et intégrée.



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In developed countries, mental disorders and behavioural concerns are prevalent among youth aged 15 to 25 years. Youth primarily access health care through their peers, parents, or family physicians.¹⁻³ Many youth report that they would not involve parents or consult their family physicians for concerns about substance use, sexual health, or personal and emotional problems.⁴ Youth need access to health care where they feel comfortable initiating and developing relationships with care providers and are able to raise sensitive issues related to their health and well-being.⁵⁻⁸

Prevention and early treatment of health and mental health problems are widely recognized as protective factors, essential for youth to achieve their full potential.² We reviewed the literature to identify models of health care delivery that provide youth with opportunities to readily access services and initiate and develop relationships with health and mental health care providers.

DATA SOURCES

We searched PubMed, Ovid MEDLINE, Web of Knowledge, and Sociological Abstracts (CSA Illumina) to find studies published between 1972 and 2007 on access to health and mental health care services for youth. Key word search terms included *health, mental health, adolescents, youth, access, program access, positive youth development, and engagement*. We identified additional relevant studies in the reference lists of selected articles.

Study selection

The search produced 240 articles. Those most relevant to our question were peer-reviewed English-language articles addressing access to health services and programs for youth aged 12 to 25 years, in countries with health systems comparable to the Canadian model (Table 1).¹⁻²⁴ The selected studies provided level I, II, or III evidence.

Our findings fell into 2 main themes: accessible models of youth-friendly care delivery, and engaging service providers in health care relationships with youth. This article focuses on the first theme.

SYNTHESIS

Context

Almost half of teenagers are at moderate to high risk of adverse health outcomes owing to high-risk sexual behaviour, psychosocial pressures, substance abuse, and lifestyle choices.⁹ Seventy percent of adolescent morbidity can be attributed to 7 categories of risk-taking behaviour: drug and alcohol abuse, unsafe sexual activity, violence, injury-related behaviour, tobacco use, inadequate physical activity, and poor dietary habits.¹⁰ More

than 25% of students in grades 7 to 12 are reported to engage in 2 or more types of risk-taking behaviour, putting them at risk of adverse health outcomes.¹⁰

Initial onset of mental illness is highest in adolescence and early adulthood.⁵ Youth aged 15 to 24 years have a higher prevalence of mental health and substance abuse problems¹¹ and more unmet care needs²⁵ than adults older than 25 years of age. Teenagers use mainstream models of health service delivery less than any other age group.⁹ Many children and adolescents with mental health disorders do not seek help^{2,9,12} or are undiagnosed.¹⁰ The strongest predictors of seeking help are case severity, previous help-seeking, and gender differences.¹⁴ Boys are less likely to seek help than girls are.^{13,14} Barriers to help-seeking include concerns about confidentiality,^{3-5,7-9,11,15,16} stigma,^{1-3,15,17} little knowledge of available services,^{3-5,7-9,11,15,16} poor accessibility,^{5,7,9,15,16} and perceived attitudes of health care workers.^{3,7,8,15} For some youth there are also financial barriers to service.^{3,8,9} Several studies have also identified insufficient youth-related training for health care providers as an important barrier. Lack of resources for youth centres is ubiquitous.^{5,9,10,12,16,18}

Primary support: parents and family

Research found that youth were most likely to seek help for mental health problems from friends and family.¹⁻⁴ Although the developmental capacity for self-referral develops during adolescence, parents continue to play an important role in identifying health and mental health problems and in decision making for youth to seek health care.^{2,3}

Role of family physicians

Family physicians are primary access points for youth health and mental health services.^{1,2,9,10} Youth with access to preventive health services through family physician visits have opportunities to increase knowledge and skills and to assume responsibility for their own health.¹⁰ Social, economic, and geographic factors limit access for some youth.¹⁰ In one study, only 7% of teens living in poverty were able to identify regular sources of health care.⁹

Klein and colleagues⁴ found that 68% of youth surveyed (N=259) used the same family physicians as their parents, but only 30% of them reported they would consult their family physicians to obtain birth control or for

Levels of evidence

Level I: At least one properly conducted randomized controlled trial, systematic review, or meta-analysis

Level II: Other comparison trials, non-randomized, cohort, case-control, or epidemiologic studies, and preferably more than one study

Level III: Expert opinion or consensus statements

Table 1. Literature summary

STUDY	LOCATION	LEVEL OF EVIDENCE	N	FINDINGS
Booth et al, ¹ 2004	Australia	II: Qualitative study; purposive sampling (by sex, age, SES, and rural or urban location)	810	Three identified barriers to help-seeking: concerns about confidentiality, knowledge of services and discomfort with disclosing health concerns, and accessibility and characteristics of services
Rickwood et al, ² 2007	Australia	II: Narrative review	48 papers	For mental health problems, engaging in appropriate help is protective; school counselors, GPs, and youth workers are gatekeepers to mental health services for youth; nontraditional access points (eg, Internet) are increasingly useful to engage youth
Tylee et al, ³ 2007	UK, Switzerland	I: Systematic review	90 studies	Assess effects of different service models of health care provision for youth in primary care or community health settings; research provides clear guidance on barriers for young people accessing primary care; evidence has not been translated into comprehensive design of youth-friendly services
Klein et al, ⁴ 1998	US	II: Telephone survey	259, aged 14-19 y	Assess adolescents' use and knowledge of health services, perceived access, and barriers to access; adolescents identified physicians, health centres, and hospital clinics as available services; many did not know where to go for mental health services or reproductive health needs
James, ⁵ 2007	Australia	III: Program review	4	Youth experiences of mental illness and treatment needs are different from those of adults; young people are in the best position to judge what is youth-friendly; barriers to accessing mental health services included concerns about confidentiality, lack of experience with the system, no GP, inadequate understanding of mental health issues
Santor et al, ⁶ 2007	Canada	II: Non-randomized controlled trial	1124 grade 7, 8, and 9 students	Improving pathways to care depends on providing opportunities to seek help and actively promoting their use; benefits of a school-based intervention greatest among students with specific needs, such as high levels of distress
Hobcraft and Baker, ⁷ 2006	Canada, Ghana	III: Interviews	2	Financial, logistical, and emotional challenges to accessing services; role of health care policy and resource allocation in protecting the rights of youth
Rosenfeld et al, ⁸ 1996	US	II: 4 focus groups	20, aged 13-21 y	Pilot survey; urban adolescents wanted dignified, respectful treatment and to be listened to and taken seriously by primary care providers
Oberg et al, ⁹ 2002	US	III: Narrative review	112 studies	Access to care is a socio-organizational complex of health care delivery and multiple covariable parameters; integrated community health care delivery models require collaboration among health care and other professionals
Brindis et al, ¹⁰ 2002	US	III: Review	NA	Access to preventive health services through annual visits to physicians increases adolescents' knowledge and skills and improves their opportunities to assume responsibility for their own health and well-being
CIHI, ¹¹ 2005	Canada	I: Literature review	133 studies	Youth with more assets report better health and higher self-worth and are less likely to engage in potentially harmful practices (eg, substance misuse)
Zachrisson et al, ¹² 2006	Norway	I: Population-based cross-sectional health survey	11 154, aged 15-16 y	Help-seeking passes through several "filters," each excluding some help-seekers; a minority of adolescents with mental health problems seek help; help-seeking in those with the highest symptom load is low; half the help-seekers achieved contact with GPs; few reached other services
Biddle et al, ¹³ 2004	UK	I: Cross-sectional survey	3004, aged 16-24 y	Strongest predictors of help-seeking are case severity and previous help-seeking; boys are less likely to seek help or confide than girls are
Black et al, ¹⁴ 2008	US	II: Convenience sample survey	57	Adolescents who experienced dating violence most often sought help from peers; when violence occurred in isolation, survivors were more likely to receive no support from others; male and female help-seeking differed
Kari et al, ¹⁵ 1997	UK	II: Survey	347, aged 12-18 y	Barriers to adolescents accessing primary care included stigma, service organization, and lack of knowledge
Deane et al, ¹⁶ 2007	Australia	I: Control group survey	506 high school students	Low rates of help-seeking and poor access to health care for adolescents are particular problems in rural locations; intervention resulted in increases in intention to seek professional health care; despite increases, intentions remained relatively low
Chandra and Minkovitz, ¹⁷ 2007	US	II: Purposive sample	57 grade 8 students	Five themes about mental health stigma: personal experience, personal knowledge, family conversations, peer conversations, and perceived social consequences of seeking help
Kang et al, 2005 ¹⁸ and 2006 ¹⁹	Australia	II: Systematic analysis of multiple service models	77 papers	Seven principles of better practice robust across all services and sectors: access facilitation, evidence-based practice, youth participation, collaboration, professional development, sustainability, and evaluation
Edwards et al, ²⁰ 2007	US	II: Review of legislation and literature	NA	Building on assets ameliorates problematic behaviour and develops resiliency; school-based services have a vital role in implementing the Positive Youth Development model
Browne et al, ²¹ 2004	Canada, South Africa	I: Literature review RCTs or quasi-experimental comparison group studies with qualitative studies added	23 reviews	Programs designed to develop protective factors through increased skill or competence are more effective than those aimed at reducing negative behaviour; effective services address individual needs and address the whole child, including clustered emotional behaviour problems; recommend collaborative service delivery with an intersectoral governance structure
Anderson-Butcher and Fink, ²² 2005	US	II: Purposive sample; survey and regression analysis	149 youth program participants	Informal relationships and social norms developed in youth programs make a difference in the lives of youth
Butler Walker et al, ²³ 2008	Canada	III: Report on a planning process involving health resource workers	NA	Establishes frameworks for addressing community health issues from a community perspective; identifies key individuals and agencies, background information, goals, objective, strategies, activities, and indicators for each community health issue addressed
Bruce et al, ²⁴ 2003	Canada	II: Youth-designed survey, focus groups, program evaluation, and documents	152, aged 15-24 y	Three themes in the transition to adulthood: belonging and connectedness vs independence; value and need the support of adults; and meaningful involvement with families, schools, and communities are significant builders of assets, skills, and resilience

CIHI—Canadian Institute for Health Information, NA—not applicable, RCT—randomized controlled trial, SES—socioeconomic status.

suspected pregnancy. Only 5% to 6% of youth surveyed reported consulting their family physicians for alcohol or drug abuse, suspected sexually transmitted infections, or help for personal problems.⁴

In Australia, the "GPs in Schools" model¹⁸ trained general practitioners in "youth-friendly" practice and implemented a school-based, physician-led program to help students understand what family doctors do and how to access them. Evaluations of the program found substantial increases in students' intentions to seek help, decreases in perceived barriers to seeking help, and correlations between reported intention to seek help and actually doing so.^{2,16,18}

Importance of schools

Schools can be key settings for the delivery of health care to youth.^{1,2,9,20} In Australia, school-based services, located on campuses and operating during school hours, were well used by students.¹⁸ School-based programs providing a comfortable, nonthreatening, easily accessible environment where students know and trust the staff encourage youth participation and attendance.^{9,21,22} Clinics located in high schools and middle schools are used by 50% to 70% of students, primarily for acute or chronic problems, and are the most likely place for youth to seek help for personal problems, AIDS information, and alcohol-related problems.^{2,4,9} Students who are served by school-based clinics have fewer hospitalizations and emergency visits.⁹

To operate effectively, clinics located within school buildings require excellent collaboration between school staff and clinic staff.¹⁸ Precarious ongoing funding arrangements were identified as the main threat to the sustainability of such school-based clinics.⁹ Hours of operation, limited to only school hours, restrict access for youth who do not attend school. Services such as mental health, substance abuse counseling, and family planning might not be well integrated into school-based clinics; only about 21% dispensed contraceptives, and some school-based clinics required parental consent for students to access services.⁹

Community-based health care centres

Community-based health care centres and comprehensive adolescent health care centres linked with hospitals, community centres, churches, or businesses have been identified, along with school-based clinics, as better positioned to meet the health care needs of adolescent patients than traditional office-based private practices.^{8,9} These broad-scope multi-service health centres, designed to address diversity, age, and barriers to care of youth, have the potential to offer high-quality, affordable service to a more diverse catchment of youth who do not attend school.^{2,4} More youth reported using such health centres for help with

possible sexually transmitted infections, contraception, suspected pregnancy, and AIDS information.^{2,4} Australian family practice clinics co-located with services youth already used improved marginalized youth's access to care.¹⁸ Limited, tenuous, or discontinuous financial resources limit the advantages of community-based health care services for youth.⁹

The Australian Area-based Youth Health Coordinator model facilitates and supports strategic development of youth health projects in rural areas. Coordinators work collaboratively with stakeholders, agencies, and young people to enhance youth access to services.¹⁸ The model demonstrated a remarkable capacity to link people, resources, training, and funding, and it effectively involved young people in advocacy for change. Rural areas with fragmented and geographically isolated services benefited most from this model.¹⁸

Other access points

There are alternative and emerging strategies to educate and encourage youth to connect with health services. Innovative access points such as the arts, music, the Internet,² and telephone services can be well used by youth and can be effective at engaging hard-to-reach youth and allaying concerns about confidentiality.¹⁸ One study found that telephone counseling services were well used but lacked sufficient counselors to meet the need.¹⁸

A traditional place youth seek help is pharmacies that sell health products.³ A survey of suburban youth also found that 19% of respondents would consider consulting Alcoholics Anonymous.⁴

Planning and evaluation

Community response to youth health needs is a primary determinant of the availability of programs and services for youth. Upon reviewing the literature, a strong argument for rational, comprehensive, and integrated approaches to adolescent health care emerges, along with a need for more research on best practices for implementation.^{9,23} One review of 23 multidisciplinary school-based programs found comprehensive interdisciplinary planning and coordination between health, education, and social services provided clear benefit to children and youth.²¹

Development of effective, accessible, and responsive services that youth will use benefits from the inclusion and engagement of youth in the design process.^{18,24} Australian researchers argued for valuing and acknowledging youth as "experts on being youth," and remunerated them as expert colleagues. They found, however, that many services did not engage well-developed youth participation.¹⁹ Effective programs employed principles and methods facilitating participation of marginalized youth.¹⁸ Kang and colleagues recommended 7 such principles to improve access and quality of primary health care for youth (**Box 1**).^{18,19}

Box 1. Seven principles for better practices in youth health

- **Access facilitation:** Services should be flexible, affordable, relevant, and responsive to the needs of all young people (regardless of age, sex, race, cultural background, religion, socioeconomic status, or any other factor).
- **Evidence-based practice:** Services and their programs should be developed and regularly reviewed according to evidence of best practice from the most reliable and appropriate local, national, or international sources.
- **Youth participation:** Young people should be involved in the development, implementation, review, and evaluation of services and programs in ways that create a sense of mutual respect and a sense of ownership of, importance to, influence within, and belonging to that service or program.
- **Collaboration:** Service providers within a service, as well as different services within and across sectors, who share common service goals and target groups, should network, communicate, and work together to plan, deliver, review, and evaluate their service provision to young people with a clear delineation of responsibilities.
- **Professional development:** Appropriate, adequate, and ongoing professional development, support, and supervision should be available to health service providers working with young people.
- **Sustainability:** Services should develop and implement strategies to optimize funding for the service or program, where appropriate.
- **Evaluation:** Services should regularly examine the relevance, quality, and results of their programs using appropriate evaluation methods, which should include measuring the outcomes of the service for young people and service providers against program goals, objectives, and indicators.

Data from Kang et al.¹⁹

DISCUSSION

Youth might be less likely to have regular health care needs or chronic health problems and less likely to have ongoing trusting relationships with service providers than adults are. Adolescent development involves increasing independence and separation from their families of origin, developing peer bonds and networks, and developing the capacity to make independent choices. Connecting with help and support is a protective factor for youth. Prevention and early treatment of health and mental health problems are essential for youth to achieve their full potential.² Prevention requires engagement with care providers well before the onset of risk-taking behaviour.

We found little systematic integration, application, and evaluation of existing knowledge on adolescent health and mental health practice. Interdisciplinary collaboration

in planning, service delivery, and evaluation among health, education, and social services, families, and youth themselves is complex and time-consuming. Service providers need to step outside their professional disciplines and engage with other professional cultures, languages, and power differences. More community-based research in the Canadian context is needed to explore the gaps in care and service, and the essential elements for effective integration and coordination of comprehensive youth health and mental health services.

The social determinants of health affecting youth well-being are inextricably connected with families, peers, and communities. Youth are subject to developmental changes and social pressures poorly addressed by the existing health care system and its practitioners. Decision makers, communities, and health, education, and social service providers need to prioritize support for predictable health and social challenges of adolescent-to-adult transitions. Family physicians are connected to the education system, social services, mental health services, families, and youth in their communities, and can therefore play an important role in fostering these connections, providing leadership, bringing disciplines together, and modifying clinical practice to be accessible and responsive to youth health care needs.

Conclusion

Numerous Canadian program descriptions, internal evaluations, and government reports exist on this topic, but peer-reviewed literature is sparse. It is unclear how widely best practice models for delivery of youth health services are implemented in the Canadian context.

Families and family physicians are primary access points for youth to connect with health and mental health services. Youth might not consult their family physicians for matters related to substance abuse, sexual health, or personal or emotional problems, owing to concerns about confidentiality and discomfort with difficult subjects. Access to family doctors is not universal. Rural youth and youth who live in poverty are less likely to have access to family physicians. Clinics located in school and community-based settings can be situated to address the unique needs of adolescents. Services with flexible service hours might serve more diverse populations. All services might be limited by unstable or short-term resources. Emerging alternative strategies using arts, music, the Internet, and telephone services provide potential options for connecting youth with services.

The literature clearly indicates a need for a rational, comprehensive, and integrated approach to health care services for youth. Sustainable resources and youth involvement in design and development of services are necessary to ensure care is both available and accessible to young people.^{2,3,7,8,18} Family physicians need to play a key role in supporting development of youth-friendly health care.

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Contributors

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Competing interests

None declared

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