



SIMON FRASER UNIVERSITY  
FACULTY OF HEALTH SCIENCES

## Collaboration *and* Change: Evidence Related to Reforming Housing, Mental Health, and Addiction Care in Vancouver

Requested by: the City of Vancouver

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Introduction

In Vancouver, the overlap between substance use, mental disorders, and homelessness has become a civic crisis. The goals of this paper are to quantify and characterize the problems currently faced by Vancouver, and to recommend solutions that are founded on the best available evidence.

This paper is a product of an initiative led by the City of Vancouver titled “Collaboration for Change”. This initiative was launched in January 2008, and over a period of six months has engaged a wide array of stakeholders in the areas of health, housing, and social services. In addition, several Provincial initiatives have stimulated discussion and planning on issues that overlap with the agenda launched by Collaboration for Change, including initiatives to reform public housing, the justice system, and mental health services. Further planning has been stimulated by the Mental Health Commission of Canada, which launched an initiative to reduce homelessness among persons with mental illness in five Canadian cities, including Vancouver. These initiatives include many of the same participants, and despite differing areas of focus have implications for overlapping sub-populations. In this paper we incorporate relevant information drawn from several recent and concurrent initiatives. The purpose of this paper is to provide evidence-based guidance to improve the clinical and public health response to people whose needs substantially involve housing and the treatment of severe addiction and/or another mental illness (SAMI) within Vancouver.

We begin with epidemiological research in order to estimate the number of adults with SAMI in Vancouver. We then describe the subset of this population who are also in need of housing. We define the evidence-based blend of health and housing

services that are required in order to provide care to Vancouver's homeless SAMI population, and highlight those areas of service that are most urgently in need of growth. Equally important, we address the need to ensure coordination and integration of services. We conclude by presenting a model for organizing services that balances the need for growth with the need for integration, and guided by relevant experiences in other jurisdictions.

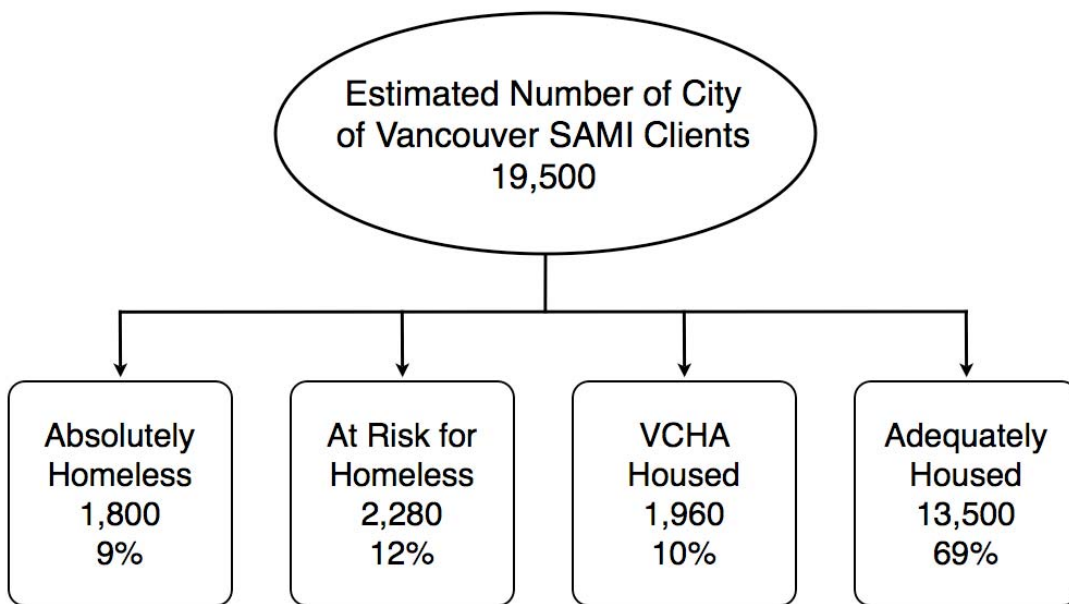
### The Population in Need

Not everyone who is homeless has a substance use or mental disorder. Conversely, not everyone with a substance use or mental disorder requires housing support (CIHI, 2007). Recent research in BC has estimated the number of individuals with SAMI across the Province as well as the proportion of this population that is homeless. Additional research has identified the overall service needs of people with SAMI, including the needs of those who are both homeless and have SAMI. The results of these complementary research initiatives serve as the basis for estimating the number of homeless SAMI individuals within the City of Vancouver, and the evidence-based services and supports required to meet their needs. We present major conclusions and directions in this paper, while the associated methodology and related details are available separately (see References).

A Provincial estimate of the SAMI population was prepared in 2007, based on the best available evidence from regional, Provincial, national and international sources. Estimates of the size of the SAMI population were calculated for each Health Authority (HA), adjusting for differences in the age of the population in different regions, as well as for co-morbidity. The estimated number of adults with SAMI in Vancouver Coastal HA was 33,000, with about sixty percent of those (19,500) living in the City of Vancouver. It must be emphasized that the available prevalence rates correspond to select clinical syndromes and severe levels of functional impairment. They do not take into account the prevalence of personality disorders, cognitive

disorders, or less severe forms of clinical syndromes (e.g., mild to moderate mood or anxiety disorders).

Figure 1. Housing Status of Vancouver's SAMI Population (2005)

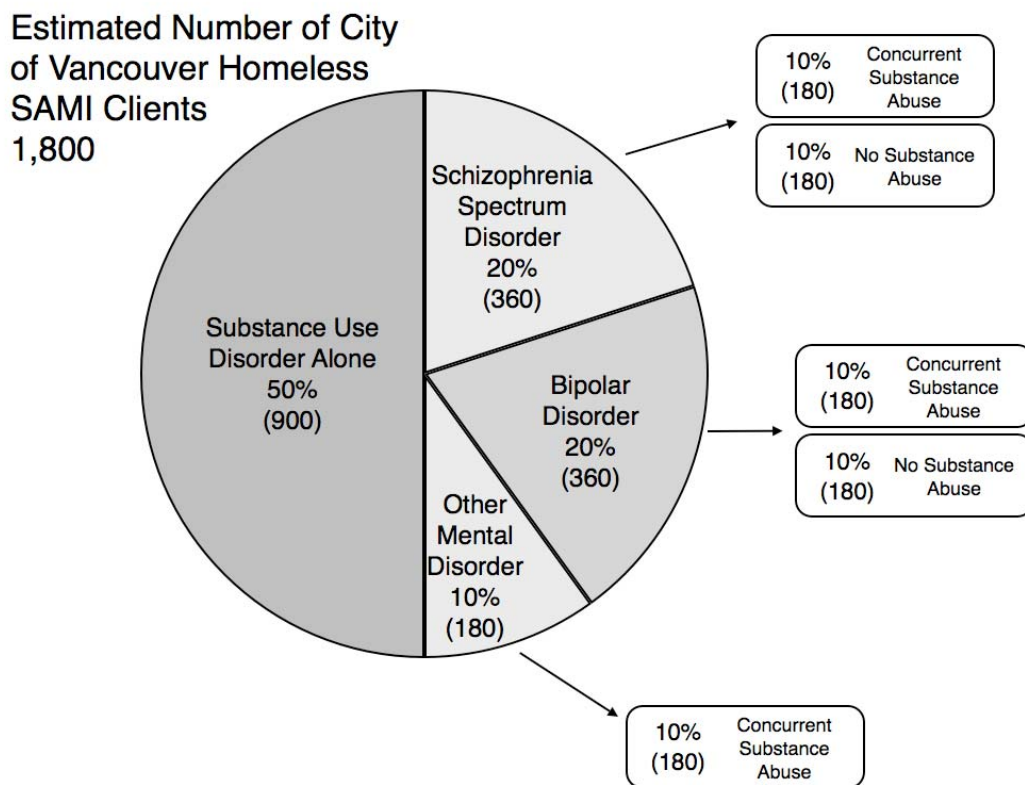


The housing status of the SAMI population varies widely, ranging from adequately housed to absolutely homeless. The condition of absolute homelessness is the focus of this paper. However, it must be emphasized that many people with SAMI are at risk of homelessness, due to the marked inadequacy of their current housing, deficiencies in the levels of support that they receive, and the severity of their individual symptoms. The distribution of Vancouver's SAMI population based on housing status is presented in Figure 1.

The homeless SAMI population in this model is comprised of individuals with diverse clinical syndromes and related health and social service needs. Epidemiological literature and other research suggests that approximately one half of Vancouver's

SAMI population has a primary substance use disorder that produces severe functional impairment. The other half of the SAMI population has other clinical syndromes (e.g., schizophrenia, bipolar disorder), often alongside a substance use disorder. The prevalence of major mental disorders resulting in severe functional impairment (including co-occurring disorders) among the SAMI population in Vancouver is presented in Figure 2

Figure 2. Prevalence of Substance Use and/or Mental Disorders Among Vancouver’s SAMI Population



Clinical, social, and housing service needs vary within the homeless SAMI population. Diverse substance use services are required, ranging from withdrawal management to psychological treatment and drug substitution therapy. Public health measures (e.g., needle exchange, consumption facilities) require expansion in concert with the

advent of treatment. As noted above, substance use problems constitute the primary clinical need among one half of Vancouver's SAMI population. However, an additional 30% require substance use treatment *along with treatment for another major mental disorder*. An additional 20% require treatment for a major mental disorder in the absence of a substance-related disorder. Additional medical and mental healthcare needs will vary on an individual basis.

Patient-centered care is an approach that matches particular services and interventions to the varying needs of individuals. Needs within the homeless SAMI population will vary among individuals at the initiation of treatment and over time, as patients progress from medical stabilization to the management of symptoms and recovery from illness. Healthcare as well as accommodation requirements must be assessed and modified in order to ensure that individuals are receiving adequate care, and also to ensure that they are not made dependent on levels of care or models of accommodation that compromise the continued achievement of physical, mental, and social independence and well-being.

#### Resource Gaps: Evidence-Based Services and Supports

Many high-quality services and supports have been developed in Vancouver and elsewhere in BC for people with severe addictions and/or mental illness. However, a number of significant gaps were highlighted when an evidence-based array of services was compared to existing resources (CARMHA Housing Report, SAMI Gap Analysis, VCHA Gap Analysis). When expressed in financial terms, current expenditures are approximately one-third of the amount required in order to sustain a complete, evidence-based complement of resources for the SAMI population in BC. However, the gap in care is much more complex than simply a lack of overall funding. Under an evidence-based system the majority of funding would be directed towards community-based (66%) versus institutional services (5%). Currently, approximately 53% of funds are directed towards community services, while 17% are allocated for institutional services. We focus below on the resource distributions within three

major service categories: the general health system; community mental health and addiction services; and institutional services.

### General Health System

The general health system is the primary source of care for Canadians with substance use and mental disorders. Evidence-based care recommends a two-to-one ratio of funding between Physician/Specialist Services and Hospital-Based Services. Current allocations are approximately equal in each area of service. Greater emphasis is required on the expansion of general health services that are provided in the community (e.g., primary and shared care, and the provision of evidence-based psychological and psychosocial treatments). Further investments in this sector are needed for the SAMI population, but will also benefit other patients in Vancouver with less severe, but more common, substance use and mental disorders.

### Community Mental Health & Addiction Services

Current investments represent about one quarter of the levels needed within the community mental health and addiction sector. The largest discrepancies were observed in relation to rehabilitation services, therapeutic/supervised residential services and substance-related services. Rehabilitation services include education and employment programs. Therapeutic/supervised residential services substantially consist of residential/high-support care. It is recommended that new residential/high-support care be in the form of independent supported housing rather than residential care facilities. Long-term residential treatment programs, concurrent disorder residential programs, community outpatient services, substitution therapies, and harm reduction services all need to be developed and/or enhanced to meet the needs of individuals with severe addictions. In addition, Assertive Community Treatment (ACT) needs to be implemented in Vancouver as elsewhere in BC. Development of ACT could reduce the need for tertiary, crisis-oriented, and institutionally based services (ACT Standards for BC, 2008).

### Institutional Services

With the implementation of empirically supported community services, the need for institutional services is spared to a significant degree. Gaps in institutional care have been identified for specific sub-groups within the SAMI population, including long-term treatment for people with severe concurrent disorders. However, the greatest resource omissions for the SAMI population relate to those housing, health, and human services that enable people to achieve recovery and move forward with their lives in their neighborhoods and communities. The estimate budget to implement required services in Vancouver is \$66,870,000 (Jones & Patterson, 2008).

The observed gaps in services and supports are a major reason for the current crisis in Vancouver. The lack of key components in an evidence-based continuum of care results in preventable harms to individuals, and preventable costs to society. It also compromises the effectiveness of current resources, ranging from police to emergency rooms, by continually challenging them to address needs that exceed the scope of their proficiency and primary mandate. Investments in adequate services are therefore associated with avoidance of costs due to the current burden on the courts, ambulance and emergency services, and police and other first responders. Based on available evidence, annual health and justice system costs for BC's homeless SAMI population are approximately \$55,000 per person, which translates to nearly \$100 million for the City of Vancouver. The implementation of evidence-based services and supports would mitigate current service volumes, reduce mortality and morbidity, improve quality of life, enhance public safety, and confer benefits to tourism, trade, and community businesses.

A major objective of evidence-based care for people with SAMI is to promote community integration and client recovery. Toward this goal, *how* services are delivered must be considered as carefully as *what* services are delivered. Unless services are effectively coordinated, the full value of even current resource



investments is unknown. Given that the needs of people with SAMI fluctuate over time, the intensity of support must vary accordingly.

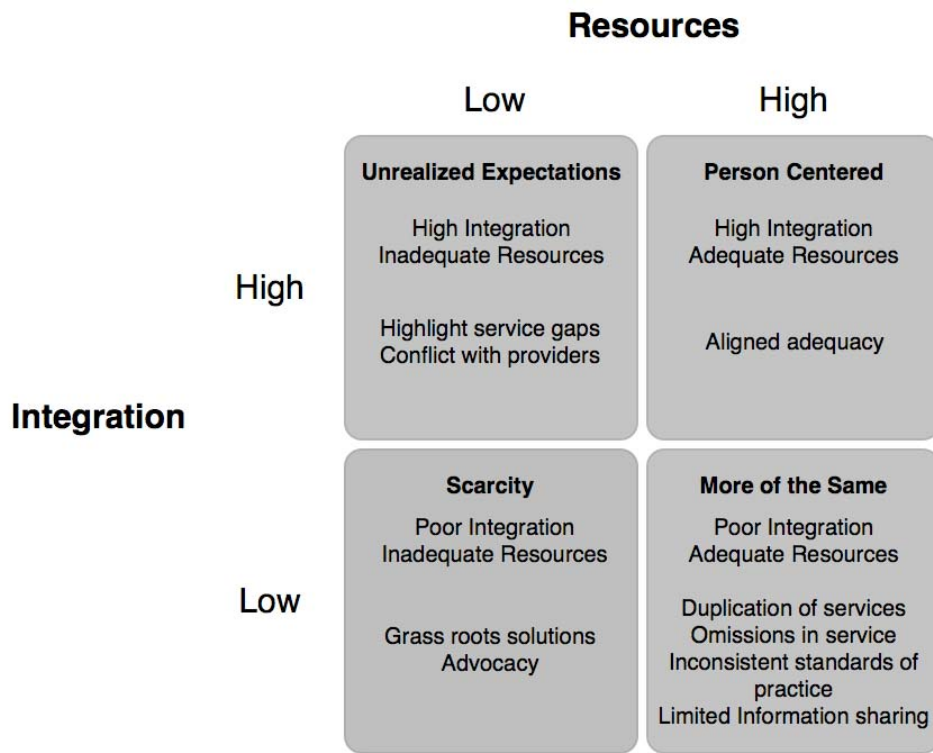
Integration: Coordinating Services and Supports for People

Vancouver's homeless SAMI population is not the sole responsibility of any single service provider. Over ninety agencies provide mental health or addiction services in Vancouver. Additional agencies address broader healthcare as well as housing and social service needs that include the SAMI population. Collectively, these services span across the administrative jurisdictions of several Provincial Ministries, the Provincial Health Services and Vancouver Coastal Health Authorities, numerous not-for-profit societies and foundations, peer support services, and other forms of care.

The need to coordinate services is underscored by the fact that the health and housing needs of each individual changes over time, requiring adjustments in various inter-dependent resources. It should be noted that there are examples of well-coordinated care within the array of services needed by the SAMI population, such as Assertive Community Treatment (ACT) and the Housing First model of supportive accommodation. However, coordination spanning the broader spectrum of resources is lacking.

The relationship between the expansion and coordination of diverse resources is illustrated in Figure 3. The lower left quadrant defines the circumstance where both resources and coordination are lacking. This is an environment of *scarcity*, and tends to precipitate grass roots solutions and a climate of advocacy on behalf of underserved constituencies. Meanwhile, preventable mortality and morbidity continue. This represents the least preferred environment.

Figure 3. Balancing Resource Expansion with Integration



A shift to the lower right quadrant is associated with the creation of more resources, but no enhancements to the processes that serve to integrate them. This quadrant signifies *more of the same*. Rather than solving complex problems, this approach tends to generate a climate of confusion among clients and service providers, based on the duplication of services, critical omissions in service, inconsistent standards of practice, and limited information sharing between providers. The *more of the same* approach is also confusing to the general public, who witness limited benefits despite significant public expenditures. This represents the second least preferred environment, because the amount invested in resources is not reflected in their performance.

The upper left quadrant represents enhanced integration, but with inadequate resources. This results in *unrealized expectations*, as illustrated in the early stages of Primary Care Trusts in the United Kingdom, where the cost of maintaining existing

required services (e.g., emergency rooms) precluded the development of expected innovations in care. Enhancements to integration, such as centralized referral or system-wide assessment, can serve to highlight service gaps. Other functions, such as a mandate for evaluation, or promoting evidence-based practice, lead to conflict with providers when service levels are inadequate. This approach can constitute a step toward balanced reform, and is therefore the second-best environment.

The upper right quadrant reflects a balance between resource expansion and integration across services. It corresponds to a *person-centered* environment, in which levels of care are matched to a patient's level of need. Relevant information and expertise is shared among diverse providers, avoiding fragmentation and helping to ensure that "every door is the right door".

The necessary introduction of services and integrative mechanisms must minimize disruption to existing resources and clinical services. We envision the implementation of essential but currently absent services alongside the creation of integrative mechanisms. We also emphasize the need for advanced educational positions that provide immediate and long-term support to the reform of British Columbia's health human workforce in the area of addiction. Educational reforms must include revisions to existing curricula, as well as the establishment of new programs. Accredited, high-quality training at the Masters level is urgently needed in order to foster the delivery of evidence-based psychosocial services. Building on experience in other jurisdictions, curricula should be designed to support new practitioners as well as existing professionals, and should be accessible through multiple BC campuses and with the active incorporation of e-learning strategies.

Other jurisdictions have developed organizational frameworks to coordinate resources and care for people with substance use, mental disorders, and other complex needs. This work serves as the basis for a recommended approach to reform in Vancouver. Specific coordinating functions include assessment and

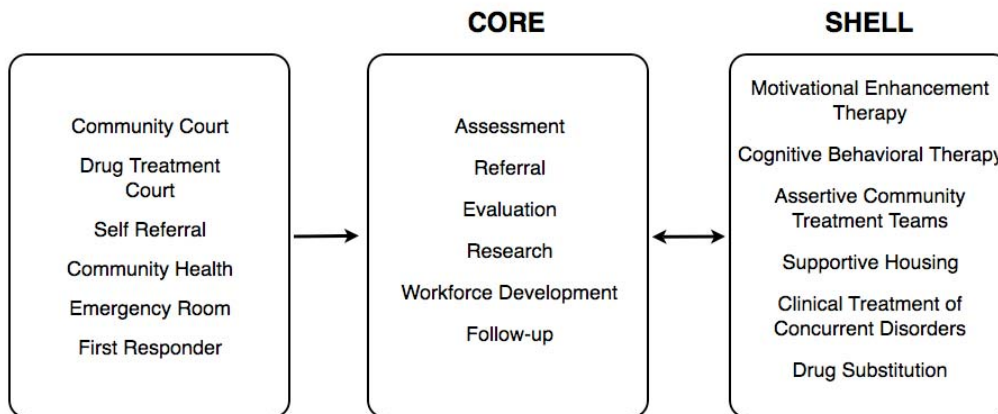
referral to services, promoting evidence-based practices, monitoring patient and client outcomes, systemic evaluation and accountability.

### Organization and Governance

Authorities in the area of SAMI and homelessness have long recognized the inherent challenges posed by the traditional health and human service systems when trying to arrange care for people. The needs of SAMI individuals commonly transcend several areas simultaneously (e.g., concurrent mental and/or physical health problems, housing and employment needs, social service requirements). Moreover, services are often needed in a step-up (an initial intervention followed by more intensive treatment) or step-down manner (e.g., detoxification followed by outpatient treatment). These common features of client needs have stimulated the creation of organizational models that bring cohesion to diverse levels of care and resources (e.g., American Society of Addiction Medicine, Patient Placement Criteria).

One influential scheme for accomplishing these objectives is known as the Core-Shell Model (Glaser, 1974). Applied to the present context, the model (illustrated in Figure 4) identifies a “shell” of evidence-based community resources to serve the needs of Vancouver’s homeless SAMI population. Services at the “shell” may or may not be deliberately integrated with one another, falling under different administrative authorities. The “core” operates at arms’ length from service providers, and provides support to clients, service providers, and administrators by generating referrals, evaluating system performance, and providing educational support. In this model, referrals are person-centered, matching client needs to the broad environment of relevant clinical and social services. The use of evidence-based matching guidelines can strengthen the accuracy and efficiency of referrals (e.g., Merckx et al., 2006).

Figure 4. An Integrative Framework for Vancouver



The core-shell model was incorporated into a landmark report developed by the Institutes of Medicine, as part of a strategy to revitalize community based alcohol treatment services in the United States (IOM, 1990). Characteristics of the core-shell model are reflected in the operations of drug treatment courts (DTCs), which have grown in number from one court in 1989 to more than two thousand courts in 2007. DTCs are the most frequent single referral source to addiction treatment services in many parts of the US. Courts are also a common source of referrals in other countries, including Canada and the Netherlands. Vancouver's DTC is one of several potential sources of referral, alongside community court, primary healthcare providers, emergency rooms, housing service providers, and stabilization services for concurrent disorders.

The Dutch government instituted the core-shell model in 2002, in order to bring greater coherence and efficiency to a large number of scattered and diverse service

organizations (Schippers, 2008). In addition to the need for arms' length referral and evaluation, objectives of the Dutch government included the promotion of evidence based care and continuous quality assurance. These goals were addressed by instituting partnerships with academic centers, which drew upon their established expertise in order to address "core" functions such as evaluation, patient assessment, workforce development and professional training. A similar partnership model could provide much needed integrative and evaluative mechanism for persons in Vancouver. Significant longstanding collaborations are in place linking academic centers with service providers to address the needs of BC's SAMI population. Both SFU and UBC have established clinical and research units that are based in Vancouver, contributing expertise to civic, provincial, and national initiatives. The complementary strengths of UBC and SFU could be marshaled, and applied the development of professional development, evaluation, and person-centered referral processes. The operating principles of the core-shell model could be implemented, with assessment, client placement, evaluation, and clinical education taking place at arms' length from client services. In order to institute this vision, a governance coalition would need to be convened, with the authority to implement the following agenda:

- a) Introduce patient placement criteria, matching patient needs to available resources in Vancouver
- b) Fill the identified critical gaps in services
- c) Implement clinical training programs for new practitioners in Vancouver and throughout BC
- d) Conduct follow-up assessment of referred individuals
- e) Implement continuing professional development programs for the existing health human workforce
- f) Provide timely evaluations of services and supports of relevance to providers, funders, and clients, reflecting the highest level of research and accountability

Prior research, including papers cited in this document, has identified the critical gaps in services, as well as the need for person-centered, longitudinal coordination of resources. Significant investments are being made, and others will be required, in order to fill these gaps. The task of the proposed governance coalition would be to build on this established base of knowledge, and to manage the transformation of services for the SAMI population, ensuring that investments are coordinated, and balanced across a continuum of evidence-based care. To be successful, governance would need to represent the parties with major responsibility for SAMI services, professional education, evaluation, and policies in Vancouver, including: Community members, VCHA, PHSA, Provincial Ministries of Health, Housing and Social Development, Public Safety and Solicitor General, BC Housing, SFU and UBC. The governance coalition could be given a mandate to develop the business plan for major reforms related to the above tasks, followed by the implementation of the plan. Provincial support for the coalition's plan would be essential, subject to a full and regular reporting on results.

Important progress is being made to address the needs of Vancouver's SAMI homeless population. Additional reforms are urgently needed, which must be guided by a long-term vision of person-centered health. This vision requires the balanced cultivation of collaboration and change.

## References

1. Canadian Institute for Health Information (2007). Improving the health of Canadians: Mental health and homelessness. Ottawa: CIHI.
2. Committee of the Treatment of Alcohol Problems (1990). Broadening the Base of Treatment for Alcohol Problems, National Academy Press, Washington DC.
3. Glaser, FB (1974). The treatment of drug abuse in the rural South: application of the core-shell treatment system model, Southern Medical Journal, 67, 580-586.
4. Jones, W. (2008). BC Mental Health and Addictions Continuum of Care Need Estimation: Rationale for the Epidemiology of Selected Disorder Estimates Used in the Modeling Process. Prepared for CARMHA SAMI Project and the Ministry of Health September, 2007
5. Jones, W & Patterson, M. (2008). Estimated Service Needs for Homeless Individuals with Severe Addictions and/or Mental Illness in VCHA and CoV. Prepared for CARMHA June, 2008
6. Jones, W, Patterson, M, & Somers, J. (2008). BC Mental Health and Addictions Continuum of Care Need Estimation: Potential Refinement of Current Service Utilization Data. Prepared for CARMHA SAMI Project and the Ministry of Health February, 2008
7. Merkx, MJM, Schippers, GM, Koeter, MJW, Vuijk, PJ, Oudejans, S, dr Vries, CCQ, van den Brink, W (2006). Allocation of substance use disorder patients to appropriate levels of care: feasibility of matching guidelines in routine practice in Dutch treatment centres. Addiction, 102, 466-474.
8. Patterson, M, Jones, W, Somers, J & Khamisa, H. (2008). Estimating Service Needs for British Columbians with Severe Addictions and/or Mental Illness. Prepared for CARMHA SAMI Project and the Ministry of Health March, 2008
9. Patterson, M, Jones, W, Somers, J & Khamisa, H. (2008). Estimating Service Needs For British Columbians With Severe Addictions And/Or Mental Illness



Chapter 2: Literature Review. Prepared for CARMHA SAMI Project and the Ministry of Health March, 2008

10. Patterson, M, Jones, W, Somers, J & Khamisa, H. (2008). Estimating Service Needs For British Columbians With Severe Addictions And/Or Mental Illness Chapter 3: Appendicies And References. Prepared for CARMHA SAMI Project and the Ministry of Health March, 2008
11. Patterson M, Somers JM, Mcintosh K, Shiell A, & Frankish CJ. (2008). Housing and Support for Adults with Severe Addictions and/or Mental Illness in British Columbia. Centre for Applied Research in Mental Health and Addiction, Faculty of Health Sciences, Simon Fraser University. Available at: [http://www.carmha.ca/publications/resources/pub\\_hsami/Housing\\_SAMI\\_BC\\_FINAL\\_\(pre-desk\).pdf](http://www.carmha.ca/publications/resources/pub_hsami/Housing_SAMI_BC_FINAL_(pre-desk).pdf) (accessed April 24, 2008)
12. Schippers, GM (2008). Feasibility and predictive validity of guidelines for allocation to levels of care in routine practice substance use disorder treatment. Paper presented at: International Symposium on Needs-Based Planning for Addiction Services, Toronto, June 2008.