Developing and Sustaining Student-Led Clinics: A Toolkit





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Contributing Student-Led Clinics:

CHIUS
SHINE
Calgary SRC
SWITCH
SEARCH
WISH
Compass North
IMAGINE
MacHealth DNA Clinic
OSLER
HOPES
MUN Gateway

The Access Clinic

Foreword by the Editors

This toolkit was created with the intent to help students across Canada develop and sustain interprofessional student-led health initiatives which foster authentic training experiences with underserved and disadvantaged communities. Student-led health initiatives, or Student-Led Clinics (SLCs) provide students with exposure to real clinical environments and team based care early in their curriculum. They allow students to directly contribute to patient health and feel valued for what they can provide during their training.

The information presented in this toolkit was collected through interviews with many isolated SLCs from across Canada and compiled by authors from various clinics and health professions. This document is the result of a collaborative effort of an alliance of health professional students from across Canada, which included physiotherapy, pharmacy and medicine, and is an example of what interprofessional collaboration can achieve.

This toolkit is meant to be the first of many versions, and we hope that it will continue to be expanded to incorporate new clinics and information such that it remains relevant and useful. By making this information available, it is our hope that SLCs spread and expand as a tool for fulfilling the needs of students and training institutions, and most importantly to better the health of our communities.

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Background

1. What is an SLC

A Student-Led Clinic (SLC) is a healthcare environment where students are leading the care under the supervision of licensed health care professionals. The goal is to find areas of need in the existing healthcare system and utilize students to fill in the gaps. With proper training and adequate supervision of student volunteers, and meeting regulatory college requirements, this model may appeal to all stakeholders. SLCs may provide patients with opportunities to receive care at times and locations that are more accessible for them. Patients may appreciate the time and attentiveness that students can afford to provide. This also serves as an opportunity for students to contribute to real patient care and service learning. These types of clinics most often include students in the leadership of the clinic, on the front lines providing care, but also in non-clinical services such as education and outreach.

SLCs may also be known as:

- Faculty-Student Collaborative Clinic
- Student Run Free Clinic
- Student Led Health Initiatives
- Student Led Clinical Environments
- Student-Run Clinic
- Student-Faculty Clinics
- Student-Faculty Collaborative Practice
- Physician-Supervised, Student Initiated Clinic

2. Purpose

- Provide support for students interested in developing SLCs at their institutions by sharing this summary of existing clinics, common issues, different models and non-clinical activities.
- Provide ideas and collect information in one location for active clinics interested in expanding or looking for help in sustaining their clinics, and to support the development of new clinics.
- This document does not replace contacting active clinics, leaders and groups that work with SLCs but does provide the contact info for many.
- This document does not at present discuss in detail day-to-day operational flow of the clinics
- This document does not at present discuss in detail various supervisory models due to the specificity of provincial regulations

3. Partners

This work began following the Canadian Federation of Medical School (**CFMS**) paper on interprofessional medical education (IPE) in Canadian Medical Schools: "...providing medical students with opportunities to work side by side with professionals with diverse types of expertise..." http://www.cfms.org/attachments/article/163/2015 CFMS Interprofessional Education.pdf

Together with the Ontario Medical Students' Association (OMSA), a committee was created to assess the need, scope, and coordinate the work. Connecting with the Student-Led National Clinics of Canada

(SNaCC) was crucial to launching this project, as they had made previous attempts and collected relevant resources from existing clinics in the past. We also collaborated with leadership at the existing clinics and must give special thanks to SWITCH that has created a lot of the resources and templates we've provided herein.

This project has also been supported, reviewed and endorsed by representatives of other national health care professional student associations through an alliance that is developing, which, at the time of publishing included the following organizations: CFMS; Canadian Association of Pharmacy Students and Interns (CAPSI); Canadian Nursing Students' Association (CNSA); Canadian Physiotherapy Association National Student Assembly (CPA NSA); National Health Sciences Students' Association (NaHSSA).

4. Contacts

For any feedback, questions, reprint permissions, or desires to contribute to future editions, contact:

- Vice-President, Education Canadian Federation of Medical Students: vpeducation@cfms.org
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Literature Review

Authors: Dan Burton, Reed Gillanders, Florentina Teoderascu

1. Introduction

Interprofessional collaboration (IPC) is not a novel concept. Nevertheless, its place in the Canadian healthcare system has never been more important. IPC has been demonstrated to improve the efficiency of healthcare delivery as well as patient outcomes (World Health Organization; WHO, 2010). In order for IPC to be successful, healthcare professionals must gain insight into the roles and responsibilities of other healthcare professionals (Dugani & McGuire, 2011). Many undergraduate and professional programs around the country are starting to recognize the importance of IPC and are beginning to implement interprofessional education (IPE) into their core curricula. IPE aims to impart knowledge, skills, and attitudes that will enable future healthcare professionals to function effectively in collaborative care environments (Dugani & McGuire 2011).

In 2000, the first interprofessional Student-Run Clinic (SRC) was opened in Canada in conjunction with the University of British Columbia. Community service involvement with SRCs is an excellent avenue for students to acquire IPE, to enhance their clinical skills, and to provide healthcare services to underserved patient communities. SRCs are focused on comprehensive, holistic, and team-based care. There are 3 fundamental values common to all Canadian SRCs: health equity, interprofessionalism, and student leadership (Holmqvist, et. al., 2012). The unique clinical environment enables students to spend time listening to patients, educating them regarding strategies for managing disease and improving health outcomes, meanwhile learning how to become better clinicians. This enhances patient satisfaction, improves compliance, increases diagnostic accuracy, and results in fewer return visits (Charon, 2001; Gross et al., 1998; Cepeda, et al., 2008; Arntfield et al., 2013). Furthermore, this healthcare model improves access to empathetic primary care for those experiencing homelessness (Campbell et. al., 2013).

While the benefits of SRCs are becoming increasingly apparent, there are only twelve clinics currently operating across Canada. In comparison, the United States has approximately 110 SRCs as of 2014 (North Compass, Meah, Smith, & Thomas, 2009). Opening a student run clinic requires a great deal of work, dedication and support from educational institutions, host- clinics, and health regions. A survey of 84 SRCs in the United States revealed that their greatest strengths were serving the underserved and contributing towards enhancing education for healthcare students (Smith et. al, 2014). Their biggest challenges included securing sufficient funding and recruiting an adequate number of faculty members (Smith et. al., 2014).

The purpose of this document is to provide students with guidelines for opening, maintaining, and expanding an SRC within a respective community. SRCs can improve access to care, particularly for underserved populations. Furthermore, these clinics contribute towards expanding IPE and enriching educational experiences for healthcare students from all specialties.

2. Impact on Students

The impact of SRCs on students is measured in a variety of different ways. Recent literature suggests that students participating in SRCs demonstrate improved clinical knowledge and skills, improved collaboration skills, improved attitudes towards interprofessionalism, and increased comfort with underserved populations. These students also show increased interest in primary care. A 2015 systematic review of student outcomes suggested that participation in an SRC has a positive effect on student clinical skill set, acquisition of knowledge not taught elsewhere in the curriculum, and that the quality of specific aspects of care delivered by students was comparable to that of regular care (Schutte et. al., 2015). Additionally, students that participated in an SRC in Charleston showed statistically significant improvements in interprofessional perceptions and attitudes, and perceptions of clinical reasoning skills when compared to control groups (Seif et. al., 2014). Medical students that participated in an SRC in San Diego showed improved knowledge, skills, attitudes and self-efficacy with the underserved, interest in work with the underserved after graduation, and interest in primary care (Smith et. al., 2014). Student-run free clinics allow students to develop a sense of clinical autonomy in a controlled environment by allowing them to take on more personal responsibility for patient care with supervision to ensure patient safety (Teherani, 2015).

However, there is still some controversy in the literature over whether clinical learning outcomes for SRC volunteers are improved or equivalent. In a study conducted at Wayne State University in Detroit there were no statistically significant differences in OSCE score between medical students that participated in the SRC and those that did not (Nakamura et. al., 2014), whereas a study of students volunteering at a Southern California SRC showed higher GPA, and Step 1 and 2 CK scores (Vaikunth et. al., 2014).

The literature also shows that participation of non-clinical students in a non-clinical capacity at an SRC leads to increased understanding and favorable perception of underserved populations and primary care. After spending a summer at an SRC in New York, students not currently in a health sciences college showed an improved understanding of the healthcare process and issues faced by underserved populations, more favorable attitudes towards primary care, and more interest in pursuing a career in primary care (Shabbir & Santos, 2015).

Participation in an SRC in a leadership capacity leads to increased understanding of interprofessionalism, while positively impacting their desire to pursue leadership opportunities as part of organizations working to serve underprivileged communities. Students from an SRC affiliated with Yale University SRC reported that their experience improved their attitude towards interprofessional collaboration, fostered their leadership skills, and positively impacted their future career plans to be involved with underserved populations (Scott & Swartz, 2014). At a San Francisco SRC, students taking on leadership positions demonstrated improved understanding of systems based practice (Sheu et. al, 2013). Participation in a leadership role in an SRC is valuable because it augments the professional development of future health care practitioners.

The literature shows that integrating peer-mentorship at SRCs leads to improved outcomes for volunteers. Students at a student-run free clinic in Germany participating in peer- assisted learning had significantly better results in theoretical, practical, and OSCE testing than those that did not (Seifert et. al., 2015). Peer mentorship of first year medical students by fourth year students at SRCs has shown to increase volunteer comfort with patients and satisfaction with mentorship (Choudhury et. al., 2014). SRCs should look at ways of integrating peer- mentorship in their clinical model to enrich the experience for junior students.

3. Impact on the Community

The number of studies evaluating outcomes for patients accessing services at SRCs is limited. Literature demonstrates that clinical services provided at SRCs can be of equal, or even higher, quality than regular care. In some studies, the SRC approach has been shown to create a greater level of patient satisfaction, greater compliance, increased diagnostic accuracy, and fewer return visits (Charon, 2001; Gross et al., 1998; Cepeda, et al., 2008; Arntfield et al., 2013).

However, some studies suggest that there is no difference in the quality of clinical care provided by SRCs. In the 2015 systematic review by Schutte et. al. mentioned above, there was no significant difference in quality of specific aspects of care delivered by students compared to regular primary care. As well, a comparative evaluation of patient satisfaction outcomes between a student-run free clinic and its host walk-in clinic in Cleveland showed statistically equivalent levels of high satisfaction with patient care teams but lower levels of satisfaction with wait times, accessibility, and privacy of health information (Lawrence et. al., 2015). Of course, the quality of health care provided by the SRC depends on many different factors. With proper structure, governance, and resources it is possible to provide care meeting or exceeding the quality of care provided by local primary health care clinics.

The rates at which preventative medicine is discussed with patients has been used as an outcome measure for assessing quality of care. A cross-sectional chart review of a Yale SRC and retrospective chart review of a New Jersey SRC showed provision of preventive medicine counselling to eligible patients at rates comparable to national levels (Butala et. al., 2013; Zucker et. al., 2013). Although it is a positive indicator for the quality of primary care that SRCs are meeting national standards for discussing preventative medicine, there is still a lot of room for improvement (Butala et. al., 2013; Zucker et. al., 2013).

Some clinics have chosen to evaluate the quality of care provided at their SRC by comparing outcomes for commonly-encountered chief complaints. A retrospective analysis of hyperlipidemia control data collected at 3 student-run clinic sites in San Diego demonstrated that student-run clinics can effectively manage hyperlipidemia over time and that rates of control can exceed national standards (Rojas et. al., 2015). Another retrospective chart review at an SRC in San Diego demonstrated that student volunteers with faculty supervision can successfully screen, diagnose, and manage depression leading to clinically significant improvement in depression severity for patients (Soltani et. al., 2015). A study of an SRC in New York City found that patients visiting the SRC experienced better mental health outcomes attributed to enhanced physician contact and increased long-term compliance with their management plan as compared to non-SRC clinics (Liberman et al., 2011). A third retrospective chart review of San Diego SRCs showed that diabetic patients received care that met or exceeded national standards for routine diabetic care with the exception of opthalmology screening (Smith et. al., 2014). Additionally, glycemic control, cholesterol levels, and blood pressure improved significantly for their patients (Smith et. al. 2014). Another study of clinical services provided to underserved diabetic patients at an SRC in Nashville showed that SRCs can provide high-quality care with a statistically significant reduction in HbA1c levels after a mean of 12.5 months of care (Gorrindo et. al., 2014). SRCs have shown ability to address common complaints including hyperlipidemia, depression, and diabetes.

4. Impact on Preceptors

We found only one paper in the literature describing the impact of Student-Led Clinics on preceptors. A survey of 45 preceptors participating at the East Harlem Health Outreach Partnership through the Icahn School of Medicine at Mount Sinai provided some insight into the reasons that preceptors volunteer at SLCs. The study suggested that preceptors valued working with students, serving vulnerable populations, ease of precepting, and a well-managed clinic, whereas external incentives were less important (Rubenstein et. al, 2016).

5. Impact on the System

Review of the literature on systemic impacts of SLCs suggested that they are cost effective, decrease hospitalization rates, and decrease ED usage. A group through the University of New England in Australia serving largely Indigenous populations estimated that their SLC had an impact on the health system of \$430,000 in their first year of operations (Stuhlmiller and Tolchard, 2015). A Monte Carlo simulation conducted by the United Community Clinic in Philadelphia found that with an annual operating budget of \$50,000, their SLC saved 6.5 QALYs, corresponding to over \$850,000 (Arenas et. al., 2017). Additionally, multivariate analysis at the Shade Tree Clinic through Vanderbilt University in Tennessee suggested their SLC decreased hospitalization rates in their participants (Trumbo et. al., 2018) and a questionnaire given to participants at the 12 South Community Clinic in Nashville suggested decreased ED utilization (Kramer et. al., 2015).

6. Conclusion

SRCs are increasingly common initiatives striving to target the complex healthcare concerns of marginalized populations. Students from various interprofessional programs benefit from participating in these clinics by learning to better address the needs of marginalized populations, while fostering greater social accountability. A variety of student-run interprofessional health clinics exist across Canada and the United States. Current literature suggests that these clinics can be highly effective at managing primary care patients presenting with symptoms of mental health, such as depression, or metabolic disease including diabetes.

Clinic Models

Authors: Jonathan Reid, Nicol McNiven

There are various models of Student-Led Clinics, each with their own advantages and disadvantages. Certain models may be more appropriate for different settings, depending especially on the clinic's initial financial and institutional support. The three main models are: collaboration with existing clinics, bricks and mortar standalone clinics, and street medicine clinics.

The content below was compiled from a series of interviews with the various active clinics in Canada and one American clinic to introduce the various types of Student-Led Clinic models.

1. Collaboration with an Existing Site

1.1 Description

Many existing clinics (eg. Community Health Centres, Primary Care Clinic) are located within high needs communities and work with disadvantaged populations providing ideal locations for SLCs. A partnership between the SLC and clinics or health centres allows them to share various resources, such as space, staff, and equipment. Currently, most Canadian SLCs use this model to some extent.

Collaborating with an existing clinic seems to be the most feasible model for new SLCs in Canada. Each SLC has a slightly different type of partnership with their host clinic, with many similarities. The terms of the relationship will depend partly on the SLC and partly on the host clinic. A successful collaborative SLC can be mutually beneficial.

1.2 Suggested Approach

- Interview local clinics to determine mutual compatibility.
- Cultivate relationship slowly, allowing equal input from collaborating clinic (e.g. have leadership from the clinic sitting on the board of directors).
- Consult with the clinic about what needs are currently going unmet in the community and how they can be addressed by an SLC.
- Establish a feasible, complete plan that inspires confidence.
- Show good faith to the clinic and patient population through non-clinical activities which often can start earlier than clinical activities such as:
 - Education workshops.
 - If the clinical space is in high demand, consider using a different space for nonclinical activities (e.g. educational initiatives).
 - Consider partnering with other organizations outside the clinic for non-clinical activities (e.g. schools, recreational facilities, local businesses).
- At first, shadow or begin operations during collaborating clinic opening hours to become familiar with the process.
- Determine optimal clinic off-hours when SLC could operate.
- Pilot and continually review SLC with active leadership of the clinic present.

1.3 Advantages of collaborating with an existing clinic

- Helpful for the initial phases of a new SLC:
 - Equipment, space and admin staff already set up.
 - Experience and standard operations of the established clinic.
 - Pre-existing patient population.

- Collaborating clinic may provide services that SLC's patients need but are outside the SLC's scope as well as continuity of care.
 - Patients seen at SLCs of this type often get their chart updated and referrals that the CHC can follow up on.
 - Easier to prevent provision of redundant services by coordinating activities.
- Provides space for SLC's clinical activities, much more financially feasible than acquiring a dedicated clinic space.
- Physicians and other health care professionals at the clinic may become preceptors.
- Share supplies and equipment.
- Clinic may have an existing training program to train student volunteers.
- Clinic may provide services such as electronic medical records, financial services.

1.4 Disadvantages of collaborating with an existing clinic

- The SLC is completely dependent on the clinic. There is a risk of the host clinic's needs changing to the detriment of the SLC's operations (e.g. changing hours of operation, sites, policies).
- The clinic may need to have a solidified partnership with the university that students are coming from which is out of student control.
- Need a leader and constant contacts at the clinic who are supportive.
 - o Clinic may be very busy with their own activities.
 - o Clinic may not have same vision as SLC.
- Clinics must coordinate schedules, available hours may be inconvenient for volunteers.
- SLC must adhere to clinic's policies.

1.5 Examples of collaboration with an existing site

IMAGINE

Medical students from the University of Toronto partner with the Queen West Central Toronto Community Health Centre. By working out of their location, the IMAGINE students have access to space, equipment, a secure EMR (mandatory for liability/insurance), some pharmaceutical samples, and an administrative staff from the Community Health Centre who helps coordinate patient intake and continuity of care. IMAGINE pays for cleaning of the space after each clinic and pays the admin staff member. IMAGINE operates on Saturdays when the CHC is closed.

SWITCH

Students from the University of Saskatchewan partner with the Westside Community Clinic. Westside has deeply rooted connections with the community and established trust with clients that SWITCH works with. The Clinic provides clinical, office and outreach activity space, supplies like gloves and needles, computer access with EMR as well as some paper charts that can be scanned in. SWITCH operates on certain weekday evenings and Saturdays.

ACCESS Clinic

Medical students and staff from Memorial University of Newfoundland partner with Clinic 215 and The Gathering Place to provide a student-facilitated physician-mentored walk in clinic in downtown St. John's. Access walk-in clinics currently operate out of The Gathering Place once per month, with Access pap clinics operating out of Clinic 215 once every three to six months. Access aims to provide respectful, comprehensive healthcare to individuals who feel that their needs have not been met by traditional healthcare services in St. John's, and also to provide medical students an opportunity to engage in anti-oppressive service learning.

Clinic 215 and The Gathering Place both provide physician supervision and mentoring, clinical space, disposable supplies, and access to computer/EMR. Access Clinic Inc. has purchased some clinic equipment used at Clinic 215 (exam tables, diagnostic tools, etc.) through sustainable community development grants awarded to the Access project. Access volunteers also support The Gathering Place in non-clinical services including its brunch services.

Clinic 215 is a family medicine clinic in downtown St. John's that offers specialized services, such as full-scope reproductive care and care for LGBTQ2+ patients. The Gathering Place is a service centre in downtown St. John's that offers a variety of services to people aged 25 or older who are homeless, living in poor housing conditions, or people who lack social supports and/or employment (http://www.gatheringstjohns.ca).

2. Stand Alone Clinics

2.1 Description

Though there are no examples of this model in Canada, stand-alone clinics are developed without collaboration with existing clinics and therefore do not "piggyback" upon their resources. The main barrier for stand-alone clinics in Canada is the lack of resources and infrastructure for Student-Led Clinics to function independently, especially rent and equipment. By collaborating with other clinics (as discussed above), Student-Led Clinics are able to attain self- sufficient status to support both students running the clinics and patients accessing their services. Unlike clinics in Canada, the United States has a national organization to help support these clinical models, making them much more feasible (Holmqvist et al., 2012) as well as different funding (grants, foundations, government) sources for underserved populations due to the structure of the American healthcare system.

2.2 Advantages of stand-alone clinics

- Self-directed SLC that does not depend on an existing clinic.
- Flexibility in clinic hours.
- Independence in programing.
- Sustainability not affected by partner clinic priorities.

2.3 Disadvantages of stand-alone clinics

- Cost to maintain a freestanding clinic.
- Lack of up-front administrative resources, electronic resources, and human resources.
- Absence of readily available preceptors and clinical administrative staff.

2.4 Examples:

None currently that we know of in Canada.

3. Street Medicine

3.1 Description

A street medicine model for Student-Led Clinics is an outreach model of care, where students go into the community to provide services for clients. Often, this model focuses on the homeless population, a high needs area, or reaches those that could not or do not otherwise attend a clinic for services. These models of Student-Led Clinics have the flexibility of running based on availability of its members and needs of its population. In a needs assessment done by Detroit Street Medicine, it was found that those who do not use regular health care services often stated that they mistrusted the healthcare system, had a poor past experience with a health care provider, or had difficulty with transportation resources. The conclusion was that there is a stigmatization towards the health care services. This population becomes the main focus for a street medicine model.

Potential partnerships for a Street Medicine SLC model are crucial as they may already exist in the community and can provide the infrastructure, equipment and have a regular services students can enhance. Another option is bringing street medicine to access different shelters, thus providing space and clientele. There are also programs that include Street Navigators, who are social workers that already have contacts and regular meeting sites where they operate in the community. Finally, safe injection sites may be a site where the street medicine model can operate. In these settings students are used not only to run the clinic and provide services, but also fundraising for the existing services, which can be a key aspect to keeping a good working relationship with partners.

3.2 Advantages

- Flexible schedule.
- High needs, untapped clientele in the healthcare system.
 - Minimize those patients that get lost within the healthcare system.
- Possibility for regular clientele, increasing consistency of services.
 - More continuous care for patients.
 - More opportunities for students to provide care.
- Follow-ups with discharging often more frequent than the patient may normally receive.
- Easy to implement a multidisciplinary team, including medical students, nursing students, social work, etc.
- Possibility for co-curricular incentives/involvement.

3.3 Disadvantages:

- May be difficult to access these individuals for a needs assessment; therefore, results may not reflect actual population.
- It may be difficult to find the individuals, particularly during the winter when individuals are spending more time indoors.
- There may be a question of safety for students if proper planning and training is not in place.
- Dependent on strong partnerships.

3.4 Examples

Street Medicine Detroit

This structure for Student-Led Clinics is most often found in the United States such as Street Medicine Detroit. The Street Medicine Detroit uses a model where first and second year student volunteers go to homeless shelters, through the support of social workers, to provide healthcare services and discharge planning for their target population. The street medicine initiatives started with going out every other week and is now going every week, demonstrating the room for growth with these initiatives. With Detroit Street Medicine, student involvement is encouraged using a curricular incentive: participation during 1st and 2nd year of medicine counts for elective time allowing students to have a free block during 4th year.

The Alex Bus

In Canada, the Alex Bus has a partnership with the University of Calgary SLC. The Alex bus is a standalone physical clinic on a bus that has two rooms for patient visits, and travels to regular sites to provide services to clients, usually the homeless. Medical students are paired with a physician supervisor for one shift per week. This model uses shelters, word of mouth and consistency of sites as a means for advertising itself.

Summary Chart of Active Canadian Clinics

Authors: Harrison Lee, Charles Yin, Michael-Roy Durr

OT = occupational therapy PT = physiotherapy SW = social work

British Columbia

Clinic Name/Location	Clinic Model	Students and Preceptors	Schedule	Clientele and Services	Contact Info
CHIUS (Community Health Initiative for University Students) Vancouver Campus #400 - 2194 Health Sciences Mall University of British Columbia	Students seeing patients by appointment at an existing clinic	Medicine, nursing, occupational therapy, pharmacy, and social work Clinic staff	Scheduled through course curriculum	Patients from inner city, marginalized populations Community-based clinical services, health education and social initiatives	http://www.chius.ubc.ca chius.secretary@gmail.com https://www.facebook.com/CHIUS- 567286249973966/
Vancouver BC					

Alberta

Clinic Name/Location	Clinic Model	Students and Preceptors	Schedule	Clientele and Services	Contact Info
SHINE (Student Health Initiative for the Needs of Edmonton)	Health promotion and outreach only	Medicine, nursing, nutrition, pharmacy	Weekly program	Homeless, immigrant, indigenous youth Health education programming	http://www.shineclinic.ca directors@shineclinic.ca
Armoury Resource Centre 10310 - 85		Medicine, nursing, pharmacy, nutrition, or public health Faculty		Support group focused on sobriety, helping clients access community resources	

Avenue Edmonton, AB		Advisor		"Cookin' With SHINE": help inner-city youth develop life skills through meal planning, prepping, and cooking	
Calgary Student Run Clinic Health Sciences Building Foothills Campus University of Calgary	Multidisciplinary clinic with 3 sites: Refugee health, Alex Bus (mobile site)	Students: Medicine Physician, registered nurse, massage therapist	Alex bus, Wednesday 6-10 Refugee clinic, once per month as needed. (4hr)	Children: Histories, physical exams, patient education, referrals, follow-up as required Students provide childcare while parents are in appointments Clients from the local homeless community Histories, physical exams, patient education, referrals Recent immigrants to the area Histories, physical exams, patient education, referrals	http://www.calgarysrc.com calgarysrc@gmail.com

Saskatchewan

Clinic Name/Location	Clinic Model	Students and Preceptors	Schedule	Clientele and Services	Contact Info
SWITCH (Student Wellness Initiative Towards Community Health)	Students seeing drop- in patients at an existing clinic	Medicine, nursing, PT, pharmacy, SW, nutrition, clinical psych, kinesiology, arts and sciences Preceptors: physician or nurse practitioner, SW, nutrition, childcare supervisor,	Mon/Wed evenings Saturday afternoons	Patients from inner city, marginalized populations Traditional clinical services, counseling, speech language pathology, physical therapy, chiropractic, complementary medicine, cultural supports, gynecology, nutritional education	http://www.switchclinic.com switchdirector@gmail.com

West, Saskatoon SK		cultural support worker		Food and childcare available	
				Educational programming focusing on health literacy, culture, relationship building, homework help, healthy living, legal matters	
SEARCH (Student Energy in Action for Regina Community Health) 3510 5 th avenue, Regina SK	Drop-in	Medicine, nursing, SW, psychology, sciences, kinesiology, education Physicians, nurse practitioners, nurses, SW, PT, personal trainers, cultural support workers, dieticians, marriage and family counselors	Sept-Dec: Mon evenings, and Sat afternoons Jan-April: Sat afternoons May-Aug: Mon evenings	Community members in Regina lacking after-hours clinical service Clinical assessment, treatment, patient education/counselling, referral Free hot meals and childcare Women's health and cultural support	http://searchhealthclinic.com reginastudentclinic@gmail.com
				Health-related presentations	

Manitoba

Clinic Name/Location	Clinic Model	Students and Preceptors	Schedule	Clientele and Services	Contact Info
WISH (Winnipeg Interprofessional Student-run Health clinic) 886 Main Street, Winnipeg MB	Students seeing walk- in patients	Medicine, nursing, OT, pharmacy, PT, nutrition, dental hygiene. Physician, nursing, pharmacy, OT, PT.	Sunday afternoons	Mainly indigenous, low socioeconomic status Clinic offers a gathering place, use of computers, phone, harm reduction supplies, healthy snack, childcare, clinical services and health promotion activities organized and led by WISH volunteers. Influenza immunization clinics	https://wishclinic.ca wishclinic.cochairs@gmail.com

Ontario

Clinic Name/Location	Clinic Model	Students and Preceptors	Schedule	Clientele and Services	Contact Info
IMAGINE (Interprofessional Medical and Allied Groups for Improving Neighbourhood Environment) 168 Bathurst Street, Toronto ON	Students from professional health programs from the University of Toronto paired with licensed HCPs from the community to provide care to marginalized community members.	Medicine, Nursing, Pharmacy, Social Work, Physiotherapy	Saturdays 10 - 2	Marginalized community members, (homeless, no permanent address, visitor status, refugee status, low income) Medical care, pharmaceutical care, nursing care, physiotherapy, social work services, physical exams, referrals Community engagement through health promotion seminars at nearby shelters, games nights, holiday dinners Health promotion lecture series Advocacy efforts at local rallies Annual IMAGINE conference Anti-oppression training for student volunteers	http://imagine-clinic.squarespace.com/ imagine.clinic@gmail.com
Compass North Thunder Bay ON	Non-clinical; focused on health promotion activities Student-led health outreach	Medicine, nursing, social work, kinesiology Psychiatry, OT, kinesiology, PT, SW, dentistry, family med, psychology	n/a	Aboriginal, marginalized and underserved populations from the Thunder Bay area Workshops focusing on health promotion, including mindfulness, meditation, anger management, navigating healthcare system. Vaccination clinic. Promotion of a resource map at community agencies. Research activities and presentations	https://www.facebook.com/compassnorthclinic/ https://compassnorthclinic.wixsite.com/compassnorth compassnorthclinic@gmail.com
MacHealth DNA Clinic Hamiltion Urban	Community health clinic	Medicine students and physicians	Tuesdays and Thursday 6- 9pm Every	Clientele: Newcomers, refugees, patients with unstable housing, IV drug users, and other vulnerable populations	machealth.dna@gmail.com

Core Health Centre, 71 Rebecca St. Hamilton, ON			3rd Saturday of the month from 9- 3pm	Services: Health and wellness programs, counselling, population health programs (e.g. cross cultural healthcare program), parenting and family support, personal development programs (e.g. anger management), and client education and support programs (e.g. health card kiosk)	
OSLER (Outreach, Service, Learning, Education, Relationship- building) 263 Weller Ave. Kingston ON K7K 2V4	Community health clinic partnership	Medicine, nursing, social work, rehabilitative sciences, pharmacy, nutrition, and psychology students Health centre staff	Weekly	Educational cooking classes; Development of nutrition-related educational handouts; Smoking cessation counseling groups (facilitated in English and Arabic); Multicultural children and youth groups; Newcomer youth soccer league Street health through harm reduction kit distribution Multicultural children's group and youth group to develop skills Backpack distribution program	oslerkingston@gmail.com https://www.facebook.com/OS LERKingston/ https://www.oslerkingston.ca/

Nova Scotia

Clinic Name/Location	Clinic Model	Students and Preceptors	Schedule	Clientele and Services	Contact Info
HOPES (Halifax Outreach Prevention Education and Support) St. Andrew's United (Junior): 1390 Robie St, Halifax, NS	Junior locations: outreach; building relationships; health education, navigation and promotion Senior location: work as an interprofessional	Dietetics, dentistry, health administration, health promotion, medicine, nursing, occupational therapy, paramedicine, pharmacy, social work	Sunday afternoon at all locations	Marginalized populations within the local community, including those individuals attending Coffee Time and Sunday Suppers at the church Services: select dental services; dental referrals; full medical history and physical exams; blood pressure and heart rate	http://www.hopeshealthcentre.com hopessrc@gmail.com https://www.facebook.com/HOPESSRC/
Spencer House Seniors' Centre	team to provide basic walk-in services within students' scope of	Preceptors: as above		monitoring; wound care; medication reviews; nutrition counselling; occupational therapy assessments; social work;	

(Junior): 5596 Morris St, Halifax, NS	practice	development of care plans	
HOPES Health Centre (Senior): 1246 LeMarchant St, 2 nd floor, Halifax, NS			

Newfoundland

Clinic Name/Location	Clinic Model	Students and Preceptors	Schedule	Clientele and Services	Contact Info
MUN Gateway Health Sciences Centre, Room 2830, Memorial University of Newfoundland, 230 Elizabeth Avenue, St. John's, NL	Students seeing patients by appointment at an existing clinic in the Faculty of Medicine	Medicine Preceptors: Physicians	Weekly	Refugee population in St. John's Pre-medical services like histories Match refugees with family physicians and provide support with translation services and arranging transportation	http://www.med.mun.ca/ MUNmedgateway/Home.aspx kate.duff@med.mun.ca
Access Clinic Clinic 215, 215 Lemarchant Road, St. John's	Student-facilitated, physician mentored Walk-in patients	Medicine Preceptors: Physicians	Wednesdays, once a month	Women who feel that their needs have not been met by traditional health care services; inclusive definition of "female" Provide safe space for patients to receive comprehensive/respectful medical care Medical students can engage in antioppressive service learning to facilitate professional development	http://www.med.mun.ca/Student-Affairs/Student-Interest-Groups/ACCESS-Women-s-Clinic-Inc.aspx accesswomensclinic@mun.ca

^{**}This summary may not be exhaustive and may not include all clinics that are still in the pre- operational stages

Common Challenges and How to Approach Them

Authors: Jonathan Reid, Reed Gillanders

1. Introduction

All clinics and charities experience many common challenges associated with opening and operating. These challenges will include human resources issues (hiring, firing, staffing, conflict resolution, evaluations), public relations and marketing issues (volunteer recruitment, branding, media relations, promotional material development), development and maintenance of governance structure and organizational procedures, development of organizational documentation (policies, constitution), management of personal health information and adherence to the Health Information Protection Act, adherence to the conditions of the non- profit and charity acts, financial planning and other financial duties (budgets, audits, payroll), capacity building and business planning (strategic planning, evaluation, reporting), and many others. Many of these important parts of running an SLC are outlined in the SWITCH How to Run a Student-Led Clinic Handout in the appendix.

The purpose of this section is to outline some of the unique challenges faced by SLCs that are typically not seen in other organizations. These challenges arise because not all charities provide clinical services and not all clinics operate as a non-profit or charitable organization. Additionally, unique conflicts of interest arise when trying to balance the interests of the health region, partnering educational institution, host clinic, and other stakeholders.

Furthermore, in the mission of most SLC's there is an inherent conflict between their two major goals: the provision of high-quality services to underserved populations and the enrichment of the education of future health professionals. Finally, existence within a publicly funded, universal health care system means that Canadian SLCs face the challenge of needing to provide services that go above and beyond those provided by the public system. Canadian SLCs must prove that they provide a service not provided by the public system to justify their existence and garner support from the community and stakeholders other than their university partner. A few common problems for SLC's that arise as a result of these conflicts are described in this section as well as strategies that existing Canadian SLCs have implemented to address them.

Establishing and operating a Student-Led Clinic is a rewarding but challenging endeavour. One of the most valuable resources available to SLCs is the past experience of other SLCs, especially in Canada where most SLCs are relatively new with few precedents and many clinics are learning and innovating as they go. This chapter discusses issues that established SLCs have identified as particularly challenging to navigate.

Many of these issues presented here are worth thinking about as early as possible in the process of establishing and operating an SLC. Being proactive and making early preparations to address these issues will help minimize setbacks, delays, and discouragement.

2. Insurance

Insurance coverage is an important precursor to any student activity and must be set up prior to opening the SLC. Students must have at minimum two different types of coverage: general liability (protection against claims for bodily injury and property damage arising from the premises, and operations) and malpractice liability (protection against claims for injury or disability arising from clinical operations).

2.1 Approaches to insurance:

Shadowing

SLCs such as the Calgary SLC have adopted a strategy where students sign-up for physician shadowing prior to participating in an SLC clinical experience, which allows them to treat this experience as any other clinical experience. At Memorial University, volunteers are insured under the "service learning" umbrella of coverage offered by the university. Shadowing extends general and malpractice insurance equivalent to non-SLC clinical work. CHIUS at the University of British Columbia formerly used the shadowing approach for extending coverage but have modified it to become part of an online Interprofessional Passport Stamp program within the IPE curriculum that includes insurance coverage for students. Through this program the University's Health Science Provost can track student participation in endorsed activities including participation in the SLC.

Course Code

At SWITCH and SEARCH students enroll annually in a zero-credit course, ie. SWITCH 400, that endorses participation in the SLC as an academic activity and therefore extends general and malpractice liability to the SLC. Students enroll in SWITCH 400 by submitting a signed registration form to the College of Medicine registrar. The generic registration form states that the student has met all prerequisites to participating in the SLC. The registration form is written and signed by each college. All colleges from the university can enroll students in SWITCH 400. Coverage is defined by the scope of practice for each student. The scope of practice of each college and each year is written by the college from which students volunteer. Students from U of R are covered under a similar course called EHE 001.

Curricular Integration

Optional clinical experience at the SLC can be integrated directly into the curriculum extending general and malpractice liability to students volunteering at the host clinic as takes place at the Compass North SLC.

Placement, Practicum, or Project

Student volunteerism at the SLC can be endorsed as part of a curricular placement, practicum, or project. Usually these activities are administered by a specific college and can be seen in combination with other models for liability coverage. For the IMAGINE Clinic in Toronto students apply to participate in the SLC as a practicum and receive IPE credits for their experience.

Negotiations with Risk Management

Coverage can be negotiated directly with risk management through the university partner. SHINE is the only SLC that follows this model but readers should note that SHINE does not currently offer clinical services or handle patient data and therefore is a low-risk initiative. Further liability will need to be acquired before SHINE starts offering clinical services.

2.2 Issues to Consider:

Host-Clinic Liability

General liability can be provided for students by the host clinic. SWITCH's host clinic has general liability that covers everyone that enters their clinic including the students and patients that attend SWITCH after-hours.

Student Club Certification

Calgary SLC is certified as a student-club with their student union which provides coverage for general liability only. Malpractice liability is provided by applying as a shadowing activity.

Compass North

Compass North is currently in the process of negotiating with the university to determine the best approach for liability coverage. Options that have been considered are registration as an observership, elective, short term placement, integration into the curriculum, and creation of a course code.

Volunteer and Clinical Orientations

Orientations for new volunteers and volunteers wanting to participate on the clinical team should cover risk management topics. These topics should be defined through collaboration with the University and/or risk management division providing the liability.

2.3 Discussion:

At the root of each model for liability coverage the SLC student experience is endorsed as an academic activity by the university which extends the same liability that students receive when participating in cocurricular clinical activity to their clinical volunteerism at the SLC. SLCs will need to negotiate the scope of practice that defines the extent of coverage for the volunteers from each college that has students participating in the SLC. Having a strong general and malpractice liability model established is of utmost importance. Uncertainty regarding liability is attributed as one of the reasons for the hiatus of service for CHIUS and SHINE. Unfortunately, detailed specific information regarding the hiatus was lost due to turnover of staff. Although a tedious process, developing a strong liability model with risk management and all key partners prior to opening the clinic is important to avoid conflict with governing bodies in the long term.

3. Needs Assessment

A Student-Led Clinic should address the needs of the community and its participants. They should not compete with other local clinics or offer redundant services. A Needs Assessment is a study that aims to discern the needs of the community that the SLC will serve. It is often conducted early in the development of an SLC.

3.1 Approaches:

Literature Review

Underserved populations may suffer from "survey fatigue"; i.e. they are overwhelmed by frequent requests to participate in research. In this case, it may be advisable to start with a review of the existing literature concerning the population the clinic will serve, such as the reviews conducted by SWITCH and Calgary SLC. A literature review can also help to strategically direct further investigation if it is needed.

Surveys

The stakeholders in an SLC include the patients and the community it serves, as well as donors, staff, preceptors, and the student volunteers involved. An SLC must consider the needs of all stakeholders. Design surveys and distribute them to educators, people in the community, people involved in existing clinics, and other stakeholders. CHIUS had success with simply consulting existing clinics in the community, which may be particularly helpful since such organizations often already have a sense of the needs of various other stakeholders.

Research Projects

Students from graduate (e.g. Harvard CCC's needs assessment conducted by School of Public Health), undergraduate, or professional programs (e.g. SWITCH's needs assessment conducted by medical students) may be able to conduct a needs assessment as part of the curriculum or as an extracurricular research project. An SLC's Research Committee can also be responsible for this project (e.g. COMPASS North).

3.2 Issues to Consider:

Clinic Location

Consider the location of the clinic, the population that it serves, and what the target population is. Factors such as age distribution, gender distribution, ethnic distribution, and socioeconomic status of the target population and desired clinic location should align. Also, research what health conditions are prevalent in the community such as diabetes, obesity, addiction and mental illness as this will help determine and tailor the services that the SLC will provide. Another important factor to consider is how patients will access the clinic; barriers to access include whether the location is convenient to access by bus or by foot (SWITCH/SEARCH/ Compass North/Access Clinic provide bus tickets), language differences (ECHO in New York, NY offers translation services), the presence or absence of elevators, hours of the clinic and whether childcare is offered for parents. The Access Clinic is wheelchair accessible, with a power-automated exam table, which enables patients with impaired mobility to better access care.

Based on the needs identified, consider what types of providers and what types of students the SLC needs to recruit (e.g. Nursing, Physical Therapy, Social Work). Currently all SLCs in Canada are interprofessional, but the specific professional programs involved differ based on what programs exist in the community and what services the SLC provides. Also consider how the SLC can meet the needs of the students and preceptors that work there; for example, does it provide a valuable learning experience for students?

3.3 Discussion:

The needs assessment compiles information that will be helpful in recruiting supporters and volunteers, deciding on clinics to partner with, and directing the formation of an SLC. The needs assessment is especially important in Canada. Since many health services are already covered by provincial health systems, an SLC must have a strategy to add to, and not compete with, services that are already available. Beyond the approaches mentioned here, consider contacting other SLCs for advice on conducting a needs assessment.

4. Billing

The discussion of whether or not to bill is, on a broader scale, a discussion of how, if at all, an SLC receives funding from the government and provides financial incentives to its mentors. Each province has their own regulations on billings, in addition funding contracts between SLCs and health ministries or regions may dictate the methods in which preceptors can be renumerated for their time.

4.1 Approaches:

Mentors Bill

At some clinics mentors bill the ministry for the patients that they see. This provides financial incentive for physicians to participate as a mentor at the SLC. Provincial regulations and agreements will dictate if this is a possibility for your clinic.

Clinic Bills

At other clinics the SLC bills the Ministry of Health as a source of revenue. In this case, if the SLC chooses to offer financial incentive for mentors it must be from their own revenues (physicians and SLCs can't double bill for the same patients).

<u>Honorariums</u>

An honorarium can be offered to mentors as incentive to supervise clinical students. SLCs typically encourage mentors to donate their honorarium back or forgo remuneration. If the SLC is a registered charity the mentor can receive a tax receipt for choosing to donate the honorarium; however, acceptance of the honorarium can affect their level of taxation. SWITCH offers their MD mentors an honorarium of \$400/4hr shift and other clinical mentors \$100/4hr shift and receives ½- of honorarium expenditures as revenues through forgone payments or return donations.

Ministry of Health Contract

Some SLCs establish funding contracts with their health region instead of billing for patients. These contracts outline the limitations imposed upon the SLC by the health region and the assistance that the health region is willing to provide to the SLC. SWITCH receives funding from the Ministry of Health through Saskatoon Health Region - Primary Health.

None of the Above

CHIUS chooses to not to bill for patients or offer honorariums to their mentors and does not have a formalized funding contract established with their health region.

4.2 Issues to Consider:

Shadow Billing

Neither SWITCH nor its mentors can bill for patients seen at the clinic as described within the funding contract that they have signed with the Saskatoon Health Region. Part of this agreement states that SWITCH must submit a copy of the billing information for the patients they see to the Saskatoon Health Region on an annual basis. This allows the health region to document the patients seen at the clinic.

4.3 Discussion:

Billing for interdisciplinary care can be exceptionally complex depending on the SLCs clinical model and the billing structure established by the health region. Sometimes it can be difficult to determine what counts as a consult or a visit. Complexities associated with needing to consider interprofessional billing may limit the ability of the SLC to implement an efficient and effective interprofessional clinical model. Another consideration is that in theory the billing and fee-for-service models can compromise care by expediting clinical processes - time is money. The effects of rushing clinical care on quality of care are exacerbated further because junior learners need more time for cases, marginalized populations have complex health care needs, and interprofessional integration of care takes more time. However, billing can reduce costs associated with mentor remuneration and facilitate mentor recruitment. SLCs should take time to discuss solutions to these conflicts with their health region, university, and host prior to opening.

5. Relationship with University Faculty

An SLC often works to build an official relationship with its participants' educational institutions (such as a university). This step may help to secure preceptors, funding, insurance, and curricular credit for student participation.

5.1 Approaches:

Faculty "Champion"

An SLC may begin by identifying a faculty member who is enthusiastic about the project and involve that person in promoting the project to other faculty members (e.g. Harvard CCC. Since it is a large time commitment, an ideal "Champion" must be very passionate about the SLC.

Important Approvals

In cultivating a relationship with an educational institution, it is important to identify those faculty members from whom approval and support is absolutely required for the establishment of the SLC. Once they do offer support, confirm and obtain it formally in writing.

Committee Involvement

Having representatives from university faculty on an SLC's committees (as is the case for SWITCH, Calgary SLC, SHINE) can help facilitate continuous communication between both parties. Faculty representatives may also have valuable expertise and input on clinic operations.

Network of Faculty Supporters

Developing a network of faculty supporters helps to ensure continuity of support when there is turnover of faculty members. Also, it is very important to be in communication with faculty representatives from all the professional programs that contribute to the SLC.

Remuneration

Certain aspects of SLC operation may be most efficiently managed by employees of the educational institution, for example, CHIUS receives administrative help from a provost office representative. This work can be remunerated if the SLC budget allows for a stipend for such work.

Curriculum Opportunities

An SLC is an excellent way to incorporate service learning and interprofessional education into a curriculum.

5.2 Issues to Consider:

Faculty Concerns

Before approaching faculty, it helps to anticipate concerns they may have, and decide how to answer them. For example, if they have concerns about the quality of care, reassure them that all patients will be seen by faculty supervisors. Despite efforts at reassurance, some faculty members may remain firmly unsupportive of the SLC. It is likely more effective to redirect efforts towards faculty members who seem like they may potentially become supporters.

5.3 Discussion:

In discussions with faculty, be open to their concerns and suggestions. Their viewpoints may help with the startup and operation of the SLC. At the same time, focus less on discussions with faculty who are categorically unsupportive, and work on finding those that are optimistic or enthusiastic. Above all, to optimize the likelihood of faculty support, establish a feasible plan that inspires confidence in faculty leaders. Some SLCs (Calgary) have faculty support but are otherwise independent.

6. Student Recruitment

The unique feature of Student-Led Clinics is that students have a central role in their establishment and operations. Establishing and running a clinic takes a lot of work, and many students from many different programs may be involved. The students who work for the SLC have a huge role in its mission, image, and successes. Students also stand to gain substantial benefits from SLC activities. Properly communicating these benefits plays a huge role in recruiting student volunteers.

6.1 Approaches:

Partnership with Student Groups

Partnering with groups such as student unions (e.g. SWITCH) often grants access to many resources for promoting the SLC and reaching interested students.

Presentations

Holding a presentation on campus is a good way to introduce many students to the concept of a Student-Led Clinic, address questions, and recruit volunteers. Some educational institutions may allow presentations before a class lecture (a method used by SWITCH), others may also permit booking auditoriums for presentations at certain times outside of class. Be sure to promote the event widely and in advance.

Events

Many educational institutions have events where organizations set up informational booths (e.g. SWITCH, Access Clinic) and students are invited to interact with them. Promoting at these events allows one-on-one conversation with potentially interested students. Students may sign up for email reminders about the SLC's activities.

Social Media

An SLC may also recruit through social media such as Facebook, Twitter, and Instagram (e.g. SWITCH).

Early Recruitment

Anticipate student turnover and be proactive about replacing departing volunteers. Recruit early (four or more months before official transition) to leave time for training; this allows incoming recruits to shadow current members (this is the strategy used by Harvard CCC). Keep recruitment in mind throughout the year.

Curricular Credit

In some SLCs, students earn curricular credit for their work (e.g. SEARCH). Negotiating this arrangement with the SLC's educational partner provides yet another benefit that may interest potential recruits. At Access Clinic, participation in the clinic will appear on the student's Dean's letter as a service learning activity.

6.2 Issues to Consider:

Benefits of Volunteering at a Student-Led Clinic:

Experiential learning – clinical skills, interprofessional care, clinic operation, leadership, communication

Course Credit or Volunteer Credit

Entry in Curriculum Vitae

Research opportunities

Relationship with the community, broadening horizons, social accountability

Access to network of SLC alumni, social networking

6.3 Discussion:

There are a wide variety of roles involved in the establishment and operation of an SLC such as leaders, committee members and clinical volunteers, so recruit students that can perform these roles, and remind recruits that there is room for a wide variety of interests and abilities. Remember to use approaches that target students from each of the different programs the SLC plans to recruit from. Remind students of how they can benefit from volunteering at a Student-Led Clinic. Since an SLC is a large commitment, be sure to recruit volunteers who are reliable, dedicated and enthusiastic about the cause. Be clear at the outset about what is expected from volunteers.

7. Preceptor Recruitment

To provide clinical services, SLCs need professionals to act as preceptors, supervising students and participating in care to ensure its quality. Preceptors may be difficult to recruit because professionals are often quite busy and preceptorship requires a significant time commitment, often with less pay than their typical working hours. The number of preceptors and the amount of time they allot to the SLC determines the volume of student opportunities to provide care.

7.1 Approaches:

Faculty:

Many SLCs find preceptors among faculty at their educational institution (e.g. SWITCH, Harvard CCC). They may be the SLC's "faculty champion", or faculty who align with the SLC's mission. Consider broaching the subject when a conversation with a faculty member reveals they may be interested in such an opportunity.

Collaborating clinic:

Professionals working at an SLC's collaborating clinic may agree to become preceptors for the SLC (e.g. SWITCH, CHIUS). There are many benefits to having preceptors that work with a collaborating clinic as they are familiar with the patients who use the clinic, they may be their family doctor, and may provide greater access to patient charts.

Events:

Many educational institutions have events where organizations set up informational booths (e.g. Calgary SLC) and professionals are invited to interact with them. Promoting at these events allows one-on-one conversation with potentially interested faculty. Email faculty members first, requesting that they visit the SLC booth.

Newsletter:

Preceptorships may be advertised in the newsletters of professional organizations.

Word of Mouth:

Ask current preceptors to speak to their colleagues about joining the SLC as a preceptor (e.g. SWITCH). This is one of the most effective methods of recruitment.

Remuneration:

Some preceptors at SLCs are volunteer-only (e.g. Calgary SLC), but they may also be paid. Sometimes they are paid a small honorarium that can be donated back to the SLC (e.g. Compass NORTH)

Former Student Volunteers:

After an SLC has operated for several years, former volunteers at the clinic who have graduated and become professionals may return to become preceptors (e.g. SWITCH). This is one benefit of maintaining a relationship with an SLC's alumni.

Residents:

In some cases, it is possible to have residents as preceptors, and it may even count as part of their rotations (e.g. SWITCH). The Gateway program at Memorial recruited an interested resident, who then became preceptor upon graduation.

7.2 Issues to Consider:

Flexibility:

Since professionals have busy schedules, they may appreciate an individual orientation meeting that is scheduled according to their preferences, at a location of their choosing. In general, professionals are dealing with many high-priority tasks, thus committing to an SLC is more feasible for them if the arrangement is flexible.

7.3 Discussion:

An SLC has several resources at its disposal for preceptor recruitment, such as staff from the collaborating clinics and faculty members from the various disciplines that make up the SLC. Many preceptors are passionate about the SLC's values and enjoy the opportunity to teach students and address community needs. They may benefit from a sense of "making a difference", of giving back to the community and educational system. When recruiting preceptors, keep in mind their realities and needs, and make preceptorships accommodating for these professionals who are providing a crucial service for the SLC's operation.

7.4 Conclusion

Above are a few of the standout issues that Student-Led Clinics have to navigate when opening and operating. This document provides some things to keep in mind but the descriptions are by no means comprehensive, so take time discussing these issues with the SLC's team and how the SLC plans to approach them, and also remember to contact other SLCs for more details about how they've been successful. SLCs have taken many different approaches, and different approaches work best for different situations. Keeping the SLC's specific situation in mind helps in making decisions about which approach to use.

Funding

Author: Reed Gillanders

Students involved with the administration of Student-Led Clinics often do not have a background in finance and some have difficulty with the revenues and expenditures part of their clinic. This section serves to provide a brief background and overview of revenues and expenditures in Student Led-Clinics.

1. Budget Basics:

Restricted vs. Unrestricted Revenues

Restricted revenues are funds acquired by the clinic that must be directed towards specific clinic activities. Usually, the organization awarding the funds to the clinic determines how these restricted revenues can be spent. A grant awarded by the United Way to provide weekly employability programming at the clinic is one example of this.

Unrestricted revenues can be spent on any clinic activity including administrative costs, salaries, and equipment. Examples of unrestricted funding include **core funding** (i.e. contractual funding for administrative and day-to-day expenses) from major partners (e.g. university, health region, host clinic), money from fundraisers, and independent donations.

Fixed vs. Variable Expenses

Fixed expenditures generally stay the same regardless of the size of the organization. Fixed expenditures include meetings, occupancy fees, website, fundraising, promotional materials, office supplies, phone, and internet.

Variable expenditures increase proportionally to the size of your organization. Variable expenditures include food for clients, educational programming costs, clinic supplies, and mentor honorariums.

Mixed expenditures increase as your organization increases in size but to a lesser extent than variable expenditures. Mixed expenditures include staff salaries, staff benefits, professional development, audits, bookkeeping, and program evaluation.

In reality, no expenditure is completely fixed or variable. When estimating the costs of expanding your program consider how each individual expenditure of your organization is likely to change.

In-Kind Revenue

In-kind revenue is the estimated value of goods and services provided free-of-charge by other organizations to your SLC. Don't forget to keep track of your in-kind revenues. Sometimes funders like to know the value of your in-kind revenues because it gives a better estimate of the size and value of your charity. Larger charities are generally awarded larger grants. In-kind revenues can include clinic supplies, payroll and administrative support, receptionist, mentor fees, and occupancy fees. In-kind revenues can represent a large portion of an organizations value. For example, SWITCH estimates the annual in-kind revenues provided by its host clinic at >\$100k/y.

Term-based to Sustainable Funding

In general, clinics first open with unrestricted financial support from their core funders and then once established they expand their services by applying for additional restricted grant funding. Budget spending for core funders is subject to significant regulation and oversight, so it may be difficult for you to obtain additional funding from them to expand your services. Grant funders will be hesitant to award a grant as the sole source of funding to open your clinic but they may be interested in expanding your services by supporting a pilot project at your clinic. However, remember that grants require more effort to report and are unsustainable. Grants are unsustainable because they often have **terms** that only allow funding for a specific initiative for a certain number of consecutive years. If you want to integrate a pilot project into the core activities of your clinic you will need to find another way to fund it before the grant runs out.

Administrators of clinics should collect meaningful quantitative and qualitative data about **core funded** and **grant-funded** initiatives. This data can be used both internally for quality improvement purposes and externally when applying for funding. Grant funders are more likely to fund initiatives that have a track record of high impact grant-funded projects. Long-term core funders (University, Health Region, etc.) are more likely to provide or increase core funding (unrestricted funding provided on a contractual or annual basis) for activities that they know are impactful. For example, if a previously grant-funded activity is demonstrated to be successful and one of your core funders believes that the new service you are providing is valuable, the organization may decide to core fund the activity.

Example: SWITCH reduced services from 3 to 2 shifts per week in November 2014 mainly because of an inability to maintain adequate grant funding. As SWITCH grew older, grant funding became more difficult to acquire because grants are intended to fund new initiatives (SWITCH was no longer a new initiative). Additionally, SWITCH began to reach term limits on many of the grants available in Saskatoon. At the time of the SWITCH shift reduction more than half of the budget was funded by grants. After financial restructuring with increased reliance on sustainable sources of funding from their major partners, SWITCH was able to return to service three days per week in April 2016. Currently, about one-quarter of the budget is funded by grants.

Start-up costs

Some SLCs have been required to generate an initial lump sum of 3-4 years operating expenses prior to opening. Some SLCs needed to purchase supplies and rent space from the host clinic prior to opening. Other SLCs use their host clinic's space and materials free of charge.

SLCs should consider creating an **operating reserve policy** within the first few years after launching. An operating reserve is cash set aside by a non-profit to buffer themselves from unexpected changes to revenues (for example, loss of a core funder) or expenses (for example, costs associated with closing SLC operations). The size of an operating reserve is typically equivalent to 3-6 months of operating expenses.

Non-Profit and Charity Status

SLCs should familiarize themselves with the rules and regulations of the **Non-Profit and Charity Acts**. Benefits of registration as a **charity** include the ability to apply for grants and issue tax receipts for donations. Drawbacks include strict oversight of financial operations and may require an annual audit costing up to \$10k. The Canadian Revenue Agency recommends an annual audit for charities with revenues >\$250k. Charities with revenues <\$250k can still complete an audit to increase the legitimacy of their organization from the perspective of funders and make it easier to apply for grants.

Financial Relationship with the Host Organization

There are a variety of types of host organizations:

- Clinic: Most SLCs are hosted by a pre-existing clinic, often a Community Health Centre.
- Church: e.g. HOPES.
- Library and Youth Centre: e.g. SHINE.
- Senior Centre (HOPES)
- Mobile outreach clinics: e.g. Calgary SLC ("Inn from the Cold", Alex Bus).
- Various local clinics: e.g. Calgary SLC (Refugee Clinic, Pediatric Clinic, Adult Clinic).

For SLCs that reside within a clinic the host is a crucial in-kind contributor. CHIUS's host clinic supplies all of their healthcare practitioners. Other in-kind contributions of host clinics include supplies, space, cleaning, advocacy, insurance, advice, referrals/follow-up, and a strong relationship with the community. A location should be determined by need, not by convenience.

2. Revenue Sources and Framework:

Student-Led Clinics receive funding from several different sources because they have many different stakeholders. Generally, the closest partners are the most significant funders, but this is not always the case and can fluctuate significantly from year to year. Budgets range from about \$7k to \$300k depending on the quantity and scope of the services provided, the proportion of the budget that is covered by in-kind donations, and the number of different organizations providing funding. Outlined below in no particular order are common sources of funding for SLC's, both financially and in-kind. Following this overview, a framework for developing a revenue strategy is outlined.

Partnering Educational Institution

Funding from the partnering educational institution can come through individual **colleges** (for example, College of Medicine, College of Nursing, College of Arts and Science, etc.), or from higher levels of university administration (for example, the university **provost** or the **provost** of health sciences if your university has one). Drawbacks associated with receiving funding through each of the models listed above are as follows:

- Provost: not all colleges belonging to the provost are involved with clinic. For example, SWITCH initially received funding through the provost, but eventually this funding was withdrawn because colleges including Agriculture and Engineering contributed to the provost but were not involved with the SLC.
- Health Science Provost: might not include all of the colleges involved with the SLC (Arts and Science).
- Individual colleges: it takes a significant amount of work to establish contracts with each college. This can take administrative capacity away from other SLC issues.

In-kind contributions from the partnering educational institution can include administrative support, general and malpractice insurance, advice, and resources for capacity building. Monetary contributions from the partnering educational institution range greatly. Some clinics closely tied with their College of Medicine (e.g. IMAGINE) or directed by their College of Medicine (e.g. CHIUS) receive the majority of the budget from these sources, whereas more independent clinics receive less than a quarter of the budget from their College of Medicine (e.g. SWITCH, SEARCH, WISH).

Grant Funding and Scholarships

Grants are a sum of money awarded to an organization for a particular purpose over a specified time frame. Registered charity status is necessary to apply for most **grant funding**. An advantage of grant funding is that clinics can obtain large amounts of funding through this avenue. The main drawback is that the application process requires significant administrative efforts including program evaluation, reporting, and grant writing.

Examples of grant funding sources for SWITCH include the City of Saskatoon, United Way Saskatoon and Area, Community Initiatives Fund, Saskatoon Community Foundation, Saskatchewan Indian Gaming Authority, the Royal University Hospital Foundation, Saskatoon Health Region, and Potash Corp. In the past SWITCH has received funding from banks, oil and gas companies, pharmacies, and other large corporations. Access Clinic also received a grant from the Shopper's Tree of Life Foundation for Newfoundland. Similar organizations exist near all SLC sites.

The portion of the budget funded by grants varies widely between clinics and years. During times of growth, the portion of the budget supported by grant funding tends to increase. Grant funders have not supported some smaller clinics. Other small clinics have 1-2 grants per year each valued at less than \$5k. Most of the larger clinics tend to have a few grants per year each valued between \$5k and \$50k. About 25 % of SWITCH's current revenues come from grants. Municipal, provincial, and granting organizations tend to offer larger grants (\$20-50k) whereas corporate grants tend to be smaller (\$5-20k).

Government

Clinics can obtain funding from the government either through billing (see below) or through contracts with the Ministry of Health. SWITCH in Saskatoon received its funding from the Ministry of Health through the Saskatoon regional health authority branch of primary health before the amalgamation of the regional health authorities into one provincial health authority. Clinics that are independent from their university tend to receive more funding from the regional health authority (SWITCH, SEARCH, WISH). Both SWITCH and SEARCH receive \$50k per year from the provincial health authority. WISH receives \$40k from their regional health authority.

Medical Association

IMAGINE received funding through their provincial medical association as a one-time grant. Access Clinic was provided with a one-time start-up donation for clinical stabilization from their provincial medical association. Often provincial medical associations are more willing to provide support for events and fundraisers than core funding.

Fundraising

Fundraising is an integral part of revenue generation and marketing for SLCs. Current funders often look to a Student-Led Clinic's fundraising success as an indicator of the abilities of the clinic's management team and how well their stakeholders support them. Most successful fundraisers net between \$2000 and \$10,000 each.

A successful example of SLC fundraising is the Rich Man Poor Man event for Calgary's SLC which provides the majority of their revenues. In its first eight years, the Rich Man Poor Man dinner has raised over \$160,000 and has hosted an average of 200 guests per year. The dinner illustrates inequalities in income, education, and food security by serving tables of eight, where one individual is served the "Rich Man" three-course meal, and the remaining seven are served a

simple "Poor Man" meal (Rich Man Poor Man, 2018). Independent fundraising almost entirely supports Calgary's SLC.

SWITCH used to host a golf tournament that generated a significant amount of revenues; however, the administrative efforts associated with hosting the event were too great to justify continuing the event once the event champion moved on from the SLC. Additionally, the event required significant upfront cash investment and efforts to plan and carry out but did not yield a significant profit.

SWITCH previously hosted an annual art auction that was successful for 3 years. Art was donated by volunteers. The target market was higher income stakeholders of SWITCH (mentors, University personnel, corporate sponsors, etc.). Eventually, the volunteers had no more art to donate and the target market was saturated with volunteer art and the event lost momentum.

SWITCH has hosted a relatively successful annual breakfast. Breakfast is cheaper to host than dinner. Students and clients speak at the breakfast. Organizational stakeholders (eg. University Colleges) typically purchase tables. Students can afford individual tickets. The early morning timing typically means that attendees do not have other time conflicts and do not need to take free time from their evening to attend.

Several Student-Led Clinics host shows. The medical students at the University of Saskatchewan College of Medicine host a 'Medicomania' talent show each year. Most years the proceeds are donated to SWITCH. Medical students from all years perform acts in the show. Ticket proceeds are typically donated to SWITCH.

The medical students at the University of Saskatchewan College of Medicine host an annual 'Date Auction' and the proceeds are usually donated to SWITCH. This consists of an auction at the campus bar where first-year students create and host events that participants (mostly upper-year students) bid on. Activities include a night on the town sponsored by a group of first years, to gymnastics/skating classes, to meal prep/delivery for a week. There is also a silent auction. The first years canvass locally to find businesses that are willing to donate prizes for the silent auction.

Individual Donations

Individual donors can contribute to a Student-Led Clinic in person or through an online tool. For example, SWITCH uses an online organization, <u>CanadaHelps.org</u>, to facilitate online donations. The clinic encourages mentors to donate their honoraria for supervising students back to the clinic. Operational clinics raised between \$3k and \$20k in individual donations.

Student Union

Compass North is looking to initiate a referendum through their student union to designate a portion of student tuition to be dedicated to their SLC. In 2014 when SWITCH reduced shifts from 3 to 2 per week, the University of Saskatchewan Student Union council supported a referendum to allot a portion of tuition fees to support community-based student-run initiatives, but the idea lost momentum with student union turnover and a referendum was not conducted. IMAGINE also receives funding from the Faculty of Pharmacy at U of T as well as U of T Medical Society (organization that advocates on behalf of medical students).

<u>Corporate</u>

Clinics can seek corporate sponsorships by contacting the community development departments of local businesses. Corporations are often more willing to support events and fundraisers than to provide core or project/pilot funding.

A Framework for Funding - Determining who to ask and how much to ask for

How your organization raises funds depends on the model of your SLC. Registered charities can raise funds in a variety of ways including grants, contracts, fundraising, etc. Independent organizations that are not registered charities may find it difficult to acquire large grants. Clinics that are a subsidiary of the university or clinic may be limited by the policies of their governing organization and should consult their supervisor for guidance.

Who to ask: Consider the purpose, beneficiaries of your SLC, and other local organizations whom with you may share goals. SLCs aim to provide services to the community, which is a goal they share with the Health Region, granting organizations like the United Way, and corporations that invest in the community. SLCs aim to enrich the education of students, which is a goal they share with the University.

How much to ask for: Determining a reasonable "ask" will be different for unrestricted funding and grant funding. Consider each of these factors:

- How is the stakeholder connected to your organization? What expenses are associated with the activities related to those connections?
- What proportion of expenses related to those activities should/could the stakeholder be responsible for covering?
- How big is the budget of the stakeholder and how big are the donations that they have made to other similarly sized organizations?
- What is the value of the contribution that you make to their organization?
- If you are still uncertain, consider asking the organization what they think is reasonable.

As an example, consider the following rationalization for a university proposal:

One of our goals as an SLC is to enrich the education of future health professionals. We share this goal with the University. Our SLC estimates that 1/3 of our efforts and expenditures go towards creating educational experiences for students. The University is the only organization that we share this goal with, so we aim to have 1/3 of our budget covered by the University. Considering that our SLC is most closely affiliated with the College of Medicine and that the College of Medicine has the largest budget of all of our affiliated colleges we will ask them for the majority of that 1/3 of the budget and for leverage in approaching other colleges for the remainder of the funding.

A second example for a restricted funding proposal (a grant) is provided in the section on grants below.

3. Expenses:

Mentor Fees

Some clinics choose to offer an **honorarium** to their mentors. An honorarium is a small payment given as a thank you for voluntary services. Typically, it is not reflective of the actual value of services rendered. Honoraria can increase recruitment, improve retention, and decrease difficulty scheduling mentors and the number of shifts without a mentor. The major drawback is cost. Some mentors are paid by the host clinic or the university to supervise and do not require an honorarium. Independent clinics tend to spend more of their budget on mentor fees, (e.g. up to 25% of total expenditures at SEARCH); however, a significant portion of these costs are recuperated by mentors donating their honorariums back to the clinic. Some clinics (such as SWITCH) offer greater honorarium rates to physician mentors than to non-physician mentors.

Staff Salaries

Some larger clinics choose to hire a full-time staff member. For example, SWITCH, SEARCH, and WISH have full-time executive directors. Other clinics receive significant administrative support from the university or are a university program. Consider hiring additional part-time staff as your clinic grows, for example, reception, program coordinator, volunteer coordinator, or cultural support/elder.

Day-to-Day Expenses, Supplies and Equipment, Administrative:

Day-to-day expenses include food and facilitators for programming. Supplies and equipment can include both medical and office equipment. Some host clinics provide medical supplies and equipment in-kind. Administrative expenses can consist of auditing and bookkeeping, professional development, program evaluation, the website, and meetings. These expenses tend to comprise the majority of the budget for smaller clinics. For example, half of Calgary's \$7k budget is supplies and equipment and the majority of IMAGINE's \$21k budget is administrative, security, janitorial, and secretary costs.

4. Grant Writing Basics:

Each grant that you apply for will have different requirements and different questions. Typically, grant applications will ask similar questions including a description of your SLC, a definition of your project, a statement of need, a budget, and how you will collect and report data.

Examples of granting organizations

- Corporate:
 - Industry (e.g. Cameco, PotashCorp, Mosaic)
 - Banks (e.g. TD, Affinity Credit Union)
 - Other businesses (e.g. Shopper's Drug Mart, Realty Companies, Dentist Offices) commonly offer local grants.
- Government: Hospital Foundations, Municipal.
- Granting organizations: sometimes lists of local granting organizations can be found online or through local granting organizations (e.g. United Way). Examples include: Community Development Fund, Community Initiatives Fund, Greenshield, Kinsmen Club, Rotary Club, local churches, United Way, Tolkien Fund.
- Other: e.g. in Saskatchewan the Saskatchewan Indian Gaming Authority provides funding for cultural programming.

Defining your project

Organizations are much more likely to offer grants to projects with a well-defined purpose, scope, and timeline. For example, piloting a weekly programming session on employability programming to be delivered in conjunction with your SLC shift, or opening up the SLC for an additional shift each week, or hiring a cultural mentor to enrich the education of student volunteers on shift. A brief survey of your local environment (formal or informal) might help to determine areas of need.

Organizations typically do not offer grants for activities that your clinic is already doing or for general program funding. For example, mentor honorariums, administrative fees, staff salaries, or food for the shift might be difficult to cover with grant funding.

Finding the right grant to fit your program

Check the websites of local organizations that offer grants regularly and keep a list of grants (and their application timelines) that your SLC might be eligible for. When you have a project that you would like to pilot, look at your grant list and choose several that share a focus area with your project. Contact the granting organizations to see if your project is a good candidate for the grant. Granting organizations understand that charitable time is valuable and will be more than happy to discuss the purpose of the grant with you and provide guidance on application writing.

Supporting your request for funding with evidence

The **statement of need** section of the grant application is your opportunity to demonstrate the projected impact of your project. You can support your statement of need with both **internally** and **externally** collected evidence (see below).

Internal evidence can include any needs assessments that your SLC has performed demonstrating a community need. Internal evidence can also include any data that your SLC has collected about previous projects.

External evidence can be found in publications authored by local government or health region affiliated organizations. Periodically these organizations will be commissioned to conduct an analysis of the local social environment describing priority areas of community need (e.g. the Saskatoon Health Region's Health Disparity Report). Granting organizations will often use information from these reports to design future grants. The literature can occasionally be a source of information describing general need in low-income communities but typically this isn't what granting organizations are looking for. They care more about the local context than academic journals.

This section is also your opportunity to provide evidence that your SLC is a reliable investment. You may provide annual reports to granting organizations to lend credibility to your SLC. If your organization conducts annual audits this will add further credibility. Organizations can present data collected from previous grants, if related and relevant, to demonstrate not only need but also efficacy in a similar type of project. If no data is available to support credibility, you can provide letters of support and/or testimonials as appendices to your application.

Budget

See the section above "Determining who to ask and how much to ask for..." for additional information on determining the value of grant requests. As an example, consider the following grant application for an extra SLC shift per week. Start by estimating the cost of opening your SLC for an extra shift per week. Then determine the value of an average grant awarded by the granting organization for similar initiatives (e.g. United Way, Hospital Fund, Local Municipality, etc.). Sometimes the estimated grant value is stated in the application description. You may have to distribute the costs of the extra shift between multiple grants. Try to incorporate some administrative costs into your grant application budget. A portion of staff salary and office supply costs can be included proportional to the amount of time/equipment you expect to spend on the project is usually appropriate.

Data collection and reporting

In your grant application, you will have to indicate what type of data you will collect about your program. The data you collect is important to granting organizations because donors to granting organizations judge them by the impact of the organizations that the granting organizations support. Consider contacting the granting organization for advice on data collection before submitting your application. Keeping track of both quantitative and qualitative outcomes of your program is important. A

discussion of what data to collect is outside the scope of this document; however, developing a program **logic model** for your project can be helpful to define some metrics (process and outcome indicators) you can use to evaluate your inputs, outcomes, and impacts. A logic model is a flow diagram illustrating the inputs, processes, short-term outcomes, and long-term impacts of your organization. Furthermore, your ability to adhere to your budget and generate meaningful and impactful data will affect your ability to acquire future grant funding. Note that the value of the project data collected must be weighed carefully against respondent fatigue. Often the populations that receive services funded by grants are heavily surveyed and data collection that is too invasive may influence your clients to seek care elsewhere.

5. Working with your Affiliate University:

Many SLCs struggle in their early stages with convincing University administrators to buy into the idea of opening an SLC. Most successful SLCs have a cohort of faculty champions that support students when approaching senior administration (Deans and Vice Deans), especially in early stages. Faculty champions are university faculty members that are supportive of your SLC initiative and are willing to assist with the development of your SLC. Identifying and involving faculty early on that are willing to support your SLC proposal to administration is important. For example, SWITCH has a faculty council that meets quarterly to discuss ongoing SLC issues and provides advice/support. Discussion with university administration should focus on benefits to students involved with SLCs as well as risk management. Major benefits to students include encouragement of independence and physician identity, opportunities for multidisciplinary primary care provision to low health literacy and socio-economic status populations in a peer learning environment, opportunities for clinic board members to develop leadership skills, and opportunity for non-health science students to interact with health science students and marginalized populations. When discussing risk management emphasize that students will receive the same amount of supervision and be held to the same standards expected on pre-clerkship clinical encounters and clerkship rotations. SWITCH incorporates a discussion of risk management in the clinical team orientation and conditions related to risk management in the clinical volunteer contract. See previous section on relationship with university faculty under the common challenges section for more information.

6. Discussion:

SLCs have many different stakeholders so many different sources of funding can be accessed. Usually, the closest partner is the most significant contributor. It is important for SLCs to not become reliant on unsustainable sources of revenue, specifically grant funding. SLCs that use a large portion of grant funding need to adapt programming frequently to meet priority objectives of granting institutions which leads to an inconsistent service for clients.

Some important points to take into consideration when determining a revenue model:

- Diversify funding sources:
 - o To be adaptable to changing social and political environments.
 - To meet fluctuating local needs.
 - To protect the quality of the services provided to the community from the interests of different stakeholders whose priorities may conflict with those of the SLC.
 - Service provision vs. student education.

- Work with stakeholders to recognize and address conflicting interests.
- Have multi-year contracts in writing.
 - Administrative turnover within partnering organization can mean that the SLCs champions won't always be there and the relationship between the SLC and the partner can get lost in turnover.

The Functioning of Interprofessional Teams

Authors: Braydon Connell and Jonathan Reid

1. Background:

There is sufficient evidence to conclude that effective interprofessional education (IPE) enables effective collaborative practice (Blackwell et al. 2011; Frenk et al. 2010; Reeves et al. 2009; Yan et al. 2007). Collaborative practice has been identified as a promising means of strengthening healthcare systems and improving health outcomes. Such collaboration is increasingly regarded as important for healthcare systems worldwide to meet complex health needs in spite of limited human and financial resources (Mickan et al. 2010; Reeves et al. 2009).

Nevertheless, there are a number of challenges that interprofessional teams must manage to effectively work together. Some of the main challenges relate to the following: professional cultures and stereotypes; inconsistent language; curriculum barriers; and lack of interprofessional knowledge (Baker et al. 2011; Hall 2005; Herbert et al. 2007). Additionally, role clarification, decision making, communication, and power dynamics pose difficulties.

The Centre for the Advancement of Interprofessional Education (CAIPE) framework identifies three key areas, each contributing to interprofessional teamwork, which can aid in identifying facilitators and barriers to interprofessional collaboration: 1) relational factors; 2) processual factors; and 3) organizational and contextual factors. Relational factors describe the mindset and can affect the relationship between professionals. Power, hierarchy, and team composition, together with team roles, are key elements in determining the relationships shared by healthcare providers according to this framework. Processual factors describe the processes involved in teamwork. Working competently as a team does not just occur; rather, collaboration is a learning process. Learning in healthcare systems means being part of a highly complex array of activities, routines and rituals, as well as roles and rules with a high load of unpredictability and urgency. These factors coincide with the processual factors described in the framework. Organizational support, leadership, and contextual culture are responsible for the organizational environment and are considered to be important factors for interprofessional team management.

2. Examples:

Calgary

Mentorship: Mentorship mainly takes place during management of a patient after the initial triage intake has occurred. Mentorship also occurs during physical examination, for which precepting clinicians are always present. The final opportunity for mentorship occurs at end of day when patients are discussed and summarized. The clinicians/clinic manager asks students to reflect on what they learned from the case. Clinicians mainly interact with the attending physician. The clinic manager is also very involved in team functioning by forming interprofessional teams. Interprofessional mentorship and interactions is limited in this setting.

Clinic flow/review process: The patient is first triaged by the clinic manager. This assessment is supported by advice from healthcare staff and students. Students then see and assess the patient and determine how to present the case to the preceptors. Preceptors will make recommendations on how to manage the patient. The students then perform the physical exam, however, only once the preceptors are in the room. At the end of the day, the patients are summarized and the clinic manager assesses whether any follow up is required.

Interprofessional experience: The experience for interprofessional involvement is limited and can occur organically. The only student involvement is from medical students, although, there are interprofessional preceptors.

SWITCH

Mentorship: Interprofessional mentorship consists of an MD or NP and a SW each shift plus up to two additional allied health professionals including pharmacy, physiotherapy, nursing, and chiropractic. The appropriate mentors must be present for the students to present a case (i.e. the MD or NP must be present if it is a medical case, the SW must be present if it is a counselling case). There are opportunities for both structured and organic mentorship. Students see patients together, thereby allowing for interprofessional peer-based mentorship. Organically, interprofessional mentors and students not directly involved with the case are encouraged to provide input. Students are also encouraged to observe mentors from different disciplines. Although there is no formal debrief of patients at the end of the shift, students are encouraged to discuss difficult cases with their preceptors, which allows another opportunity for mentorship.

Clinic flow:

- Patient registers at reception with receptionist.
- Once a clinical student is available to see the patient, the shift supervisor (a non-clinical student volunteer) brings the patient from the waiting room into a clinical room where they record a chief complaint and collect some demographic data.
- The patient stays in the clinical room and the shift supervisor presents the chief complaint to the entire clinical team (interprofessional students and mentors) in the team room.
- The team students consist of up to three medicine or nursing students, up to two social work students, and up to three students from other allied health professions.
- The shift supervisor helps the entire clinical team decide who will go in and perform the initial evaluation of the patient.
- Typically, two students from different disciplines will perform the evaluation: one of which being medicine or nursing and the other from an allied health profession.
 - The students see the patient together and develop an assessment and plan.
 - The students present the patient to all clinical team members that are not currently seeing patients.
 - Sometimes, only one student will see a patient if there are fewer students available (i.e. already seeing patients; too few volunteers).
 - Occasionally, a mentor will see a patient by themselves if the students are falling behind and the case is predicted to be straightforward.
- The appropriate mentors must be present for the students to present the case (ie. the MD or NP must be present if it is a medical case, the SW must be present if it is a SW case).
 - The students and mentors briefly discuss the case and modify their assessment and plan.
 - The students and the relevant mentors see the patient and confirm or modify their assessment, order labs, write prescriptions, perform procedures, refer, book follow-up, and consult as needed.
 - o Students chart the encounter and the appropriate mentor co-signs their note.
- Charting can occur at the end of shift if the clinic is very busy.
- There is no formal debrief of patients at the end of the shift although students are encouraged to discuss difficult cases with their preceptors at the end of shift.
- Supervisors work with students at different levels and are encouraged to guide them appropriately (i.e. direct supervision if a junior learner, less supervision if senior).
- Debrief (30 minutes): pass around a talking stone and all students and mentors briefly discuss how their shift went (things learned, social determinants of health that they witnessed, suggestions for improvement), and ensure that all students have a safe ride home.

Interprofessional experience: There are several structured and organic opportunities for interprofessional interaction both among student peers and also between mentors. First, the team of students that initially assess the patient is selected by the shift supervisor. As an interprofessional team they interview and examine the patient allowing for peer-to-peer education about interprofessional team roles and responsibilities. Afterwards the case is reviewed by the whole interprofessional team (students and mentors). Second, there is a formal debrief process in place to discuss the shift as an interprofessional team, reflecting on what was learned. Again, an opportunity is provided to understand how different professions experienced the shift, the patients involved, and what their focus/learning points were.

SEARCH

Mentorship: Professional mentors include a physician/nurse practitioner, a nurse, a counsellor, a nutrition mentor, and a cultural support worker. There are additional mentors during a physiotherapy or dermatology clinic. Depending on the level of the student, a mentor might let the student take the lead during a consultation and provide feedback and assistance, or a mentor might lead the consultation and discuss the process with the student afterwards. During any downtime, mentors will also discuss topics related to their fields and either engage the student in discussion about new information or teach the student a relevant skill.

Clinic flow:

- The patient encounters student volunteers at the front counter.
- If they do not have an immediate appointment, they enter the 'gathering room' with social programming and meal service. In this room they interact with other clients, student volunteers, and mentors.

Counselling:

- If a client has a counselling session, they will be taken into the counselling room.
- The students and counselling mentor will meet and talk about what to expect and do in the counselling sessions.
- Once the session is over, the student and mentor will meet again to discuss what was said, why the mentor chose that methodology, and answer any questions the student may have. If the session concerned a particularly difficult topic, the mentor will further debrief with the student to ensure their wellbeing.

Medical:

- If the client wishes to see a doctor or a nurse practitioner, they will be taken to the medical side where they will be seen by a medical team made up of student volunteers, a nurse, and a doctor or nurse practitioner.
- Students are sent in to perform an initial assessment on the client.
- The student then discusses their assessment with the medical mentors. If doing an assessment is beyond the student's scope, they will accompany a medical mentor into the clinic room for the assessment.
- The medical mentor and student volunteers provide the appropriate care while in consultation with the client.
- After the appointment, the medical mentors and the student volunteers discuss the case, what the initial assessment suggested, what and why the medical mentor provided the care that they did, as well as alternate options that may have been available.

Interprofessional experience: Structured interprofessional interactions take place during debrief sessions or scheduled presentation topics by the mentors. When students participate in a structured debrief or presentation topic, often they are grouped together by differing disciplines to allow a broad range of perspectives and informed conversations. Students are assigned to different areas of the

clinic based on their interests and discipline. It is common for two students from different disciplines to be assigned to an area that may or may not relate to their own discipline: for example, a medical student and education student may learn together on the medical service side of the clinic. The rests of the volunteers are students from varying disciplines including, but not limited to medicine, nursing, education, social work, and kinesiology.

WISH

Mentorship: WISH aims to have three mentors per shift, often of various health backgrounds (with at least one physician). All mentors share an office and decide amongst themselves who will be responsible for each case. WISH volunteers conduct a history on their own and observe physical exams and counselling/information-sharing done by the mentor. In some cases, WISH volunteers assist with the physical exam. The physiotherapy mentors are also professors at the University of Manitoba. They can brief physiotherapy students on expected cases in the week leading up to Sunday, thereby allowing the students an opportunity to prepare for the case.

Clinic flow:

- Two WISH volunteers of different disciplines meet with mentors before seeing the patient to discuss the case.
- The two WISH volunteers see the patient and conduct a history.
- The WISH volunteers report back to the mentor and share their findings.
- The mentor sees the patient with the WISH volunteers and supplements with additional questions, a physical exam, counselling and sharing information with the patient.
- Following the encounter, students have an opportunity to debrief with the mentors in an office at the back of the clinic.
- Students write a SOAP (subjective, objective, assessment, and plan) note.
- The SOAP note is reviewed by the mentor.
- At the end of the WISH shift, all WISH volunteers (including those not involved in clinical cases) break into three groups to debrief on the day's shift. There is an opportunity to share anonymized clinical cases during the debrief.

Interprofessional experience: Students are divided into 5 different teams at the beginning of each WISH shift. Attention is paid to ensure that these teams include students from various faculties and experience/inexperienced volunteers. Each clinical encounter is made up of two students from different professions. Students are encouraged to learn from each other through conversation, like during the debrief.

IMAGINE

Mentorship: The students discuss their findings with their respective preceptors after they have met with their patient. The professions do not differ much concerning the student-preceptor relationship. Preceptors rely on the students' ability to gather information, as they do not enter the patient's treatment room.

Clinic flow

- The Clinic Flow Manager decides with the group the professions best suited for the case.
- A pair of healthcare students selected by the clinic flow manager conduct their assessment of the patient.
- The students report back to the interprofessional group.
- The group discusses the diagnosis and management of the case, and whether or not other professions are needed to contribute.

• The students render treatment. Only students will interact with the patient (unless there are extreme circumstances that require the professional present).

Interprofessional experience: During the group discussion, interactions take place between the different professions. The process happens organically and varies depending on the patient's needs. Also, two students of different professions see patients. As a result, interaction and teamwork occurs within the treatment room while the two students work together to gather information from the patient.

MacHealthDNA

Mentorship: There are a PA and NP in the clinic, but only physicians supervise SLC students. A standard clinical preceptor-student interaction exists.

Clinic flow

- There are one to two students in an appointment documenting and interacting with the patient. The initial portion of the patient encounter is run independently by the student.
- The students then review with the physician.
- The students and physician return together to review the plan and provide additional documents for investigations, such as requisitions, urine samples, imaging, etc.
- The patient can book a follow up appointment if required.
- The preceptor and student later have an opportunity to debrief the case when they are reviewing the students' notes on the EMR. This occasion is when feedback and identifying any concerns are made known.

Interprofessional experience: SLC students work with Community Health Workers (CHC) and occasionally social work during the outreach portion of their shift. During outreach, students will interact with general clients of the CHC to share information about events taking place at the CHC, programming, and do an intake assessment of any client that wishes to register with the clinic to have access to healthcare services. Community Health Workers do an end-of-shift debrief with students to review patients seen and identify concerns regarding the clinic, services referred, programming attended, and any intakes/services shared during outreach. There is minimal interaction with students of different professions. This may happen at Family Saturday events with other non-clinic volunteers at the CHC but depends on the people present that day.

HOPES

Mentorship: Interprofessional mentorship consists of a variety of professions each shift. The appropriate mentors must be present for the students to present a case. There are opportunities for both structured and organic mentorship. Students see patients together, thereby allowing for interprofessional peer-based mentorship. Organically, interprofessional mentors and students not directly involved with the case are encouraged to provide input. Students are also encouraged to observe mentors from different disciplines. There is a formal debrief of patients at the end of the shift, during which students have the opportunity to discuss difficult cases with their preceptors allowing for another opportunity for mentorship.

Clinic flow:

- Welcome/Reception: Front desk volunteer who welcomes clients will be a research volunteer.
 - Volunteers will rotate the front desk position, welcoming clients, if there are no research students available.
 - Consent (see attached form in SNACC Pack) will be obtained at the front desk, along with an explanation of how the clinic runs.
 - The reception volunteer will write down the client's name (Last name, First name) on the folder and bring the file to the initial assessment team.

 Process for removal/referral if client is abusive, violent or intoxicated – Contact Dalhousie Security IMMEDIATELY 902-494-600. Incident report must be completed (see attached form in SNACC Pack).

Waiting room

- The client will be directed to the waiting room by the front desk volunteer/research student.
- Research student will introduce themselves and administer questionnaire to patient.

 The client has the option to decline participation or withdraw at any time. The research student may assist with completing the questionnaire if needed.
- o The clients will wait for the next assessment room to be available.
- o Initial Assessment Team will guide the client when a room is available.
- Initial assessment (Maximum duration 10 minutes)
 - The Initial Assessment Team (IAT) will be formed by a group of two or three student volunteers; this role will be rotated so that everyone can experience the first contact with the clients.
 - o The IAT should tell the client the evaluation is going to be 10min.
 - o The IAT will complete the initial assessment form with the client.
 - The team members will ask screening questions to determine the client's greatest concerns and needs.
 - After the form is completed, and the initial evaluation is finalized, the client will be directed back to the waiting room.
 - The IAT, in conference with the shift supervisor (MHA student) will decide whom the client should see based on the Scope of Practice sheets.
 - Shift supervisor will then organize the (room + students + preceptors) for the clients to see.
 - The IAT will brief the Secondary Assessment team on the client needs, emphasizing the main concerns.
 - The IAT is in charge of wiping and cleaning the room with Lysol after each appointment.
 - o In the event of low client numbers at the Health Centre on a given Sunday, the IAT, accompanied by a preceptor, can walk to St. Andrew's United Church, and interact with guests in the Outreach Location. If it is deemed the guest needs services provided by the Health Centre, the IAT and preceptor can walk with the individual back to the Health Centre.
- Secondary Assessment/Care team (Maximum duration 35 minutes, care plan included).
 - Shift supervisor assembles team and preceptors who are directed into the assigned room for the client.
 - A tailored secondary assessment will be provided to the client by the care team, composed of volunteers from Dietetics, Dentistry, Health Promotion, Medicine, Nursing, Occupational Therapy, Pharmacy or Social Work, depending upon the needs of the client.
 - Students will have available to them an Adult Questionnaire Form as a guideline; this
 form is not meant to be filled in as it is meant to be used as a resource of what would
 normally be asked.
 - Preceptors will be matched to the appropriate situations, where the students require supervision.
 - Preceptors will supervise and sign all the documents filled in by the students.
 - Preceptors will provide guidance, at their discretion, on history taking, time management, physical exams, and care plan development.
 - o After the assessment, the client will be asked to wait in the room.
 - While the client is waiting on the room, an adult questionnaire and a feedback form will be provided to him/her and a volunteer will keep the client company while the care plan is being developed.

 In the event where a guest expresses interest in speaking to the Health Centre team, but is not/unable to visit the Health Centre and there are no clients waiting to be seen at the Health Centre, the appropriate senior students and preceptor can travel to the Outreach Location to talk to this individual if volunteers feel comfortable doing so.

• Case discussion with preceptors

- o The care team will discuss the client's case with the preceptors.
- o Both preceptors and students will agree on what are the best next steps for the client.
- o A list of resources will be available to refer the client to.
- The client's care plan will be written on the forms (for our registry) and a different care plan will be filled out (color copy) for the client to take home.
- The MHA student responsible for attaching a copy of the client's care plan to the client's file.

Care plan presentation

- The care team and preceptors involved will present the client with the care plan they formulated
- If multiple student health care providers are required, they will all offer their care plan in turns.
- The client will have either consent to all, some, or none of the options.
- A form detailing the care plan (color copy) will be given to the client.

Care plan implementation

- The client will undergo all consented care that is available at the Health Centre.
- If any supplies other than the ones in the HOPES supply cart are used, the preceptors must inform the MHA student of these, to keep track of them.
- o Referral for other services will be provided.
- The last volunteer that had contact with the client will walk the client out of the building, chat with them and say goodbye.
- The secondary assessment team will oversee cleaning the space used, wiping down the examining table with Accel wipes, while the rest of the surfaces will be wiped with Lysol wipes, and they will make sure everything is placed back to where it belongs.

Debrief

- o After the end of the shift, there will be a short clinical debrief.
- o A longer interprofessional debrief will be conducted afterwards.

Health Center Shutdown

 The MHA student will walk around the clinic, making sure the space is clean, and everything is stored where it belongs in the Health Centre space.

Interprofessional experience; All clients that come to HOPES are reviewed by all preceptors in the case discussion. Therefore, each client receives an assessment based on their needs and priorities regarding their health, so as to offer a tailored person-centered experience. This enhances the interprofessional experience among students and preceptors as shared decision making is a priority. This model allows for students to practice interprofessional communication, learning from different professions in a collaborative, responsive and responsible manner. There are ample opportunities for role clarification. Student volunteers will better understand their roles and the roles of those in other professions and use this knowledge appropriately to establish and achieve person/family/community goals. Whether as part of a triage team or assessment team, volunteers will understand the principles of teamwork dynamics and group processes to enable effective interprofessional collaboration. As clients require different professions to be the focus students will learn and apply leadership principles that support a collaborative practice model. Finally, there is the opportunity for interprofessional conflict resolution: allowing volunteers to actively engage self and others, including the client/family, in positively and constructively addressing disagreements as they arise.

3. Summary of Clinics

Clinic	Professionals
SWITCH	Medicine Nursing PT Pharmacy Social Work Nutrition Clinical psychology Kinesiology Cultural support workers
SEARCH	Medicine Nursing/ Nurse practitioner Social Work Psychology Kinesiology Education PT Personal training Cultural support workers Dieticians Marriage and family counsellors
WISH	Medicine Nursing Occupational Therapy Pharmacy Physiotherapy Nutrition Dental hygiene
IMAGINE	Medicine Nursing Pharmacy Social Work Physiotherapy
HOPES	Dietetics Dentistry Health Administration Health Promotion Medicine Nursing Occupational Therapy Paramedicine Pharmacy Social Work

4. Discussion:

Interprofessional exposure is a major goal of SLCs. The methods of Canadian SLCs to promote interprofessionalism vary. Some of the strategies used are discussed here.

Team History and Physical exam:

Many clinics promote interprofessional interactions during the history and physical exam stages of the encounter. Having students from different professions assess the patient together helps each student understand the scope of practice of their team members: the questions they ask on history, the tests they perform on physical exams, and how they approach and interact with the patient. This can be combined with the other strategies below.

Team-Based Discussion of Assessment and Plan

Other clinics have only one student perform the history and physical, or they have separate students assess the patient in turns. The interprofessional interaction happens at the assessment and plan stage, where several students and mentors from different professions gather in a separate room and formulate a consensus assessment of the patient's status, as well as a plan for investigation and treatment after the student who saw the patient reports their findings on history and physical. As a result, students see how mentors from different professions interact and gain insight on the different perspectives of treatment and investigation. Also, students have a safe place away from the patient to ask questions and enrich their understanding.

Team-Based Debrief

Other clinics do not have structured interprofessional interactions until after the clinical encounter ends, at which point an interprofessional debrief discussion takes place. This approach can also be combined with the other two strategies. Team-based debrief has the advantage of allowing students to analyze the whole clinical encounter from start to finish and ask questions from other professional students and mentors without time constraints, since the patient has already left.

Organic Interactions

Many clinics have structured interprofessional interactions such as those described above, but even having multiple professions in the same clinical space promotes interaction and interprofessional learning. Two students working on a non-clinical community outreach initiative together may organically discuss the differences between their educational programs and professions. A student working with a mentor of a different profession may learn about their different techniques or assessments. Above all, organic interactions promote a culture of respect between the professions and students and encourage an eagerness to learn.

Interprofessional Case Review

During a clinical quality improvement review at SWITCH in 2016 administrators noticed clinical downtime between cases on slower days. Interprofessional mock clinical case review was suggested as one way to fill this time. SWITCH has not piloted interprofessional case review as of the most recent version of the Toolkit; however, this is another way of encouraging interprofessional education. At the 2016 SNaCC conference Elizabeth O'Reilly presented the MacHealth DNA Clinic Workbook – a collection of clinical cases focusing on marginalized populations. SWITCH considered using these MacHealth DNA cases for their on-shift interprofessional case review.

Day-to-Day Functioning of a Canadian SLC

Author: William Kennedy

1. Before the shift:

Overview

When developing a clinic, it is essential to have a means of scheduling and notifying students regarding their clinic dates and an organizational plan for each shift (roles and responsibilities). Access to and collaboration with upper year classmates who can acclimate new students to clinic activities is beneficial, so often there is an overlap period between junior and senior students.

Scheduling your shifts

Clinics use a variety of mechanisms for scheduling. Bigger clinics with large and transient cohorts of students use web-based schedulers designed by programmers. Volunteers are given logins and their profiles can be set to sign-up for certain positions; administrators can set the number of available positions for each shift. Others have chosen to use a google spreadsheet like the one below:

https://docs.google.com/spreadsheets/d/1LkVu_wyB9PwIV5rjtaxjw7iDgRhOnz5draSezF7ae1I/edit?usp = sharing

Weekly emails

Before each clinic, reminding students of the shift can help ensure your team is organized, efficient, and punctual. The following link lists a standard form email that can serve as a template when reaching out to your team.

https://docs.google.com/document/d/1fRcRNyGwCYTr1sY0CgElsLBjNLXFfVkRazijd9iPY8E/edit?usp=sharing

To make your job as clinical manager easier, there are several extensions available through mail services that can send and email on a specific date and time. An example of this is Boomerang, which can be used on Gmail, Outlook and mobile devices (https://www.boomerangapp.com/).

Pre-Shift briefing

- Welcome statement by managers, note the indigenous territorial lands.
 - Calgary example: I would like to take this opportunity to acknowledge the traditional territories of the people of the Treaty 7 region in Southern Alberta. The City of Calgary is also home to Métis Nation of Alberta, Region III.
- Introductions: Name, Role, Personal focus of the day.
- Housekeeping items: unstable patients, fire alarms, harassment, troubleshooting.
- Manager Set Clinic Goal: Focus for improvement from last clinic.
- See appendix for script example: SWITCH Pre-Brief Checklist.

2. During the shift

Overview

Depending on the size of the clinic and scope of activities, one or more supervisors should be present on shift. The role of these supervisors can include patient triaging and flow, organizing non-clinical activities, and managing/troubleshooting clinic issues that arise on shift. For example, during a shift there could be 3 separate roles to help the clinic function efficiently. These include the clinic manager, the SLC Executive and the clinician. While all of these roles have different responsibilities, below are some key directions for all roles that should help guide an efficient shift.

Triaging patients

CTAS Guidelines (https://handbook.bcehs.ca/clinical/checklists-reference/ctas-score/):

- Level 1: Resuscitation (immediate assessment needed)
 - Refer to Emergency Department
- Level 2: Emergent (assess within 15 minutes)
 - o Refer to Emergency Department
- Level 3: Urgent (assess within 30 minutes)
 - o Refer to ED as needed (chest pain, dyspnea, bleeding, infection, trauma)
- Level 4: Less urgent (assess within 60 minutes)
- Level 5: Non-urgent (assess within 120 minutes)

Other considerations for triage:

- Presenting concern (severity, imminent risk).
- Age (pediatric patients should be seen earlier).
- Last time seen (have they been waiting for an appointment).
- Time in the waiting room.
- Ability to follow-up.

Preparing for your patient

Language line (where available if paid for, ~\$100):

- Contact: 1-866-874-3872
- Info needed:
 - Client ID.
 - Language preference: 1 for Spanish, 2 for all others (specify verbally).
 - Discuss situation with interpreter.
 - Add the non-english speaker.
 - Say "End of Call" when done.

Patient information: some of this information can be collected by the person doing triage. Keep in mind that if your triage person is pre-clinical they may not be able to collect this information (beyond their scope). At SWITCH, a receptionist books the patient into the clinic EMR, then the triage person, usually an Arts and Science student, collects some demographic information and a concise presenting complaint. The clinical volunteers take the rest of the information:

- Last set of vitals
- Past medical history (Surgeries, admissions, current health conditions)
- Current healthcare providers and resources (referred sites?)
- Medications (Currently on, ensure they are up to date)
- Healthcare coverage (Indigenous NIHB, Refugee IFHP, PHN)

Differential diagnoses (clinical volunteers should consider these before entering room):

- What is their chief complaint (C.C.).
- What health conditions should be considered for the C.C.
- Physical exams help to narrow the diagnoses.
- Scores can help define your management (eg. CENTOR).

Writing the History

SOAP note:

- Subjective: ID, CC, HPI, PMHx, Medications, Allergies, FamHx, SocHx.
- Objective: Vitals, Clinical exam, Labs.
- Assessment: Differential diagnosis.
- Plan: Management plan both short and long term, treatment rendered.
- Post-appointment documents (prescriptions, Referrals, Community resources).

Presenting your Patient

Details to include:

- Patient ID: Name, Age, Sex, Gender.
- Time of Chief complaint.
- Differential Diagnosis (Minimum 3).
- Pertinent History negatives and positives that narrow your Ddx.
- Pertinent Physical exam negatives and positives.
- · Repeat Differential diagnosis.
 - o Most probable, followed by remainder.
 - Tests needed to resolve.
- Management steps (Immediate, then long-term).

Referrals

Template:

https://docs.google.com/document/d/1Y3GhcllUCBxZ6i68gxKgP9ZrHUyVL3jhaheEE6FKjUk/edit?usp=sharing

Community resource list

- Make a list of community resources you can refer to, including descriptions, point of contact, and address.
- Sometimes, lists of local resources can be found online. Ask a local community-based social
 worker and they might be able to direct you to one.
- Handout template: https://docs.google.com/document/d/1F-QolVV4G64qn5PNEeC-YIOExv4xWDzADZsZ-u3N8YE/edit?usp=sharing

3. After the shift

Handover

- Patients assessed during the clinic may need follow-up. The SLC should have a protocol in
 place to determine which practitioner will provide follow-up for patients seen in clinic. The name
 of this practitioner should be written on all investigations or consults and should be able to
 access a copy of the clinical note for that visit.
- Follow-up needed:
 - o Referrals.
 - Investigations ordered.
 - o Prescription pick-up/delivery and follow-up.
 - (Emergency drug coverage as needed).
 - Patient follow-up in clinic. SWITCH has an agreement with their host clinic that they can book patients follow-up appointments with doctors during normal (non-SLC) clinic hours.
 - Entry of paper healthcare assessments.
 - Billing records as determined by SLC protocol and discussed with finance exec/preceptor.
 - Preceptor and Student feedback forms.
 - Volunteer time logging (for all volunteer healthcare providers).

Clean-up/team debrief

- Clean up area, restock carts as needed, wipe down equipment. Some clinics need to deliver samples (i.e. urine cultures) to the laboratory after the shift.
 - o Team de-brief.
 - Review patients seen (briefly describe chief complaint, assessment and plans for management, learning points).
 - Meet as a team to discuss positive aspects of clinic and areas of improvement.
- Remind students to fill out their feedback forms.
- If your clinic includes non-clinical activities that are separate from the clinic, consider a debrief with everyone together with both clinical and non-clinical volunteers sharing. This helps to promote a team atmosphere and recruitment of future clinical volunteers.
- Encourage students to share something that they learned with the group. Debrief is an opportunity for peer-to-peer learning.
- Individual debrief:
 - Sometimes students have experiences that make them feel uncomfortable and do not feel like sharing with the group. Provide students the opportunity to discuss this with an SLC administrator (or the social work mentor if you have one) after the shift if need be.

Non-Clinical Activities

Authors: Essi Salokangas, Tina Hu, Jessica Visentin, Tina Felfeli

Non-clinical activities are an important part of Student-Led Clinics. The use of education sessions, wellness activities, and outreach events enhance the engagement of students with their community. Students involved in delivering health care education within the community have the opportunity to increase personal awareness about different health care disciplines and social services available to patients while facilitating collaboration between the community and students.

1. Health Promotion, Education & Outreach

Health Education Sessions

- Sessions for target populations (HIV patients, street workers, youth, women etc)
- Mental Health workshops
- Diabetes workshops
- Healthy eating workshops

Wellness Activities

- Crafts
- Games nights
- Mindfulness
- Exercise

Youth Outreach

- Mentorship
- Social events
- Healthy living promotion

Others

- Literacy Days
- Women's Health Night
- Cooking Programs, Community Dinners
- Indigenous Cultural Support
- Community Clean-up
- Tax Clinics
- Employability Programming

2. Other Services

Food

- Snacks provided at educational sessions
- Food and coffee for patients and preceptors
- Hot meal on every shift
- Health Snack Bags and Lunches
- Food Store

Child Care

Provide childcare for clients at the clinic

Personal health products

- Women's health theme night
- Fundraising to purchase car seats, vitamin D, oral health supplies, personal health items to donate to participants

3. Potential Sites

For clinical and non-clinical activities:

- Community Health Centre (SEARCH, IMAGINE, CHIUS)
- Shelters (Compass North, Calgary-SRC, IMAGINE)
- Community Clinic (SWITCH, Access Clinic)
- Aboriginal Health Centre (Compass North)
- Church (HOPES)
- Drop in Activity Centre (IMAGINE)
- Library (SHINE)
- Mobile Health Bus (Calgary-SRC)
- Pharmacies (Access Clinic)
- Refugee Clinic (Calgary-SRC)
- Women's Health Centre (Access Clinic)
- Youth Centre (SHINE)
- Senior Centre (HOPES)
- Societies representing various marginalized populations: HIV, Women's Health, Aboriginal Health, Refugee Health, Associations for New Canadians, and other Non-Profit Organizations

4. Advocacy

Advocacy committees can be built into clinic model that organizes events such as Community Health Seminar Series and Online Blog about topics pertaining to issues affecting marginalized populations, and participation in advocacy events (e.g. Homeless Connect).

5. Research

Several internal research projects and program evaluations can be run. Students recruited through the medical school program (community health research course) or other programs (e.g. physiotherapy) complete research projects at the clinic. Many clinics collect anonymous data from interviews with volunteers for research or evaluation purposes.

Most clinics do some form of internal program evaluations. A pre- and post-participation survey for volunteers is common. Patient interviews can be done to obtain qualitative data about their experience and their valuation of the services provided.

Failed/unsuccessful SRC Activities:

Authors: Michael-Roy Durr, Nikki Tyminski, John Lee

The following section provides insight into the challenges SLCs have faced and how they were resolved. The purpose of this section is to provide a forum for discussing and learning from our collective mistakes.

1. SWITCH Childcare

Challenge:

In addition to clinical and outreach services, SWITCH offered child-minding to any community member using SWITCH services while they were on the premises. A child-minding mentor in charge of a group of volunteers would supervise children for the shift's duration. The focus at the time was to reduce a barrier to access for parents/quardians to obtain the services they needed, while also seeking to address the social determinants of health that children face – literacy, early childhood development, food security, and education (to name a few). The child-minding program was initially unstructured and, for the most part, worked well. The shift's activities (supper time, play time, reading time, video games, toys) were left to the discretion of that day's volunteer child-mending mentor. As SWITCH grew, issues with child-minding began to surface. At times, the sheer number of children overwhelmed what only a handful of volunteers could manage. In such cases, the only feasible option was to forego any set schedule and, as a result, valuable activities like one on one reading were not possible. Moreover, SWITCH had several volunteer child-mending mentors with personal leadership styles directing the volunteers and children. Children that were consistently present did not know what to expect in the program as the mentors were always changing; and new children were challenging to integrate into the service. What resulted was a chaotic environment where volunteers struggled to control the children and, in some cases, were not up to the challenge of volunteering in child-minding. SWITCH was in a position where they were unable to address the aforementioned social determinants of health effectively.

Solution:

The delivery of child-minding services was re-envisioned. In place of the previous mentor program, SWITCH hired a child-minding coordinator responsible for creating a more structured environment for children and volunteers alike. This change was successful, with regular attendees aware of what to expect, and new children were able to integrate much more efficiently. To ensure the proper ratio of volunteers to children, SWITCH created a 'soft cap' on the number of children that the service can accommodate, dependent on the number of volunteers, ages of children, etc. Ultimately, these changes allowed both the volunteer and child experience to improve. As children adjusted to the routine, volunteers had less of a challenge in directing the kids, thereby allowing an opportunity to address the social determinants of health.

2. SWITCH Alternative Medicine

Challenge:

SWITCH's clients report a high level of satisfaction with, and demand for, non-traditional medical services. Therefore, SWITCH provided chiropractic, acupuncture, and alternative medicine (reiki, natural medicines, etc.) along with conventional medical services. SWITCH is also mandated by its organizational values to provide services that follow the principles of evidence-based and student-led medicine. Occasionally, SWITCH received feedback from stakeholders and volunteers that alternative medical services (not including chiropractic) were providing care and advice that was incongruent with our mandate. The board conducted a review of alternative medical services and found that preceptors were providing advice that was incongruent with the principles of evidence-based medicine (i.e. avoidance of vaccination, denigration of traditional medicine recommendations). SWITCH was uncomfortable with these practices, because evidence did not support these conflicting recommendations. Also, there was little to no opportunity for student involvement and experiential learning with alternative medical services.

Solution:

A stepwise approach was followed to address the conflict. First verbal and then written warnings were issued. An explanation of the conflict and a proposal of boundaries were presented to the preceptors (i.e. don't make recommendations on vaccination or services provided by other disciplines outside of the scope of alternative medicine). Alternative medicine preceptors continued to overstep these boundaries despite repeated warnings. To ensure SWITCH meets its mandate of experiential learning opportunities for health science students, alternative medicine services were discontinued indefinitely. Despite this decision, SWITCH still believes that there is value in alternative medicine practicing alongside traditional medicine. In the future should the opportunity to offer Indigenous medicines/health practices arise, SWITCH will conduct a thorough review of the practice scope of the professionals, as well as assess their congruence with SWITCH's mandate. SWITCH will also encourage clinical volunteers to participate to ensure a learning environment. Until such time, SWITCH will continue to meet community needs with educational programming for clients on holistic aspects of health like nutrition and wellbeing.

3. SEARCH Sweat

Challenge:

SEARCH has not had any unsuccessful programs specifically, but has learned some lessons. SEARCH is always looking for ways to improve our programs and services and is continuously making alterations or adapting based on client feedback. SEARCH hosted their first Sweat Lodge Ceremony last year that was not as well attended as expected.

Solution:

Through feedback, SEARCH discovered that the event itself was highly anticipated but there were barriers that were not accounted for. Specifically, it seemed to be a bad time of the year for both our clients and our students. Although SEARCH had thought of transportation and funding issues, they had not anticipated availability conflicts.

4. SEARCH Teen Group

Challenge:

SEARCH recently implemented a Teen Group similar to our Women's Group – the Women's Group is made for and led by women, with the goal of developing new skills and building community. Feedback received after the program launch highlighted some key issues. SEARCH primarily sees females at their clinic; males that do attend are usually adults or very young children. To cater to SEARCH's main demographic, they planned a female focused teen group and had a successful turn out. Nevertheless, a male teen in attendance felt like leaving the clinic because he was inadvertently excluded from the topic and program.

Solution:

SEARCH adapted in the moment and was able to provide services for the male teen, but they learned a lesson from this mishap about being prepared for all reasonably foreseeable scenarios. SEARCH is in the process of adjusting the program policy and looking to serve their clients better by taking a more inclusive approach.

5. IMAGINE Expansion of Clinical Services

Challenge:

In the past, IMAGINE piloted a variety of additional services including the addition of Occupational Therapists to their team. However, they found that due to the short duration of the OT program at the University of Toronto, as well as the limited scope of practice expected by patients in a walk-in clinic environment, the student learning and patient benefit was minimal. The IMAGINE clinic has also explored adding dentists to their clinic due to their access to dental equipment. However, they discovered that this initiative was redundant given that the Faculty of Dentistry already offers subsidized dental services for community members nearby. Third, they piloted the addition of a dietician to their team in previous years but feedback from the dietician revealed that the benefit to the community members was minimal.

Solution:

IMAGINE is currently exploring the formation of discipline specific role outlines to provide students with an understanding of the services they can safely and confidently provide at IMAGINE. They are also exploring an alternative collaboration with the Faculty of Dentistry to create oral hygiene packages and information seminars for the clinic.

Collaboration Between Student-Led Clinics

Authors: Michael-Roy Durr

1. Past Collaborations

Historically, clinics have worked together through a yearly conference and online services.

Student-Led National Clinics of Canada (SNaCC):

Purpose:

The SNaCC conference allows members of SLCs to meet face-to-face and network. Beginning in 2008, SNaCC has had many different names (SMIHILE, SNaCC, SRC Conference) and forms throughout the years. As both a non-profit and a clinic, an SLC faces unique challenges. They must balance the competing interests of the health region, community, and university. Given their unique situation, helpful resources are scarce. The conference provides an opportunity for SLC members from all across Canada (typically board members) to get together to build capacity by hosting speaker sessions, discussing SRC issues, sharing information, and finding ways to collaborate to strengthen our organizations individually and collectively.

Numbers:

Ideally, one or more representatives from each university across Canada with an established or developing SLC would attend. As most of the Canadian universities fall into the two aforementioned categories, there are potentially 25 attendees.

In reality, the host's own attendees contribute to the majority of the turnout at SNaCC, with ten to fifteen representatives from other universities travelling to attend. Accordingly, the event functions best as a large group discussion in lieu of a formal conference.

In order to maximize the number of attendees, the host aims to contact SLCs with a concrete event plan at least four months before the conference date. Students will then have ample time to request funding and holidays to attend. Historically, SNaCC planning has taken place during the spring for a fall conference (November).

Costs:

For a more thorough explanation refer to the detailed expense reports in the SNaCC Pack (see below).

Expenses: SNaCC normally is a two-day event with a total cost of \$800. Attendees are responsible for their own flights and lodging, but they may obtain funding from their own school. The host clinic provides meals (lunch for both days, and supper of the first day), transportation (minimal cost as the hosts can provide carpooling), and a venue. Booking a conference room at the university will eliminate a venue cost. There are small costs (<\$100) associated with speaker gifts and signage.

Revenues: The following is based on the 2016 SNaCC in Saskatoon (SWITCH hosted).

We received donations from the Saskatchewan Medical Association, Saskdocs.ca (physician recruitment association in Saskatchewan), and the Council of Health Science Deans (a group

responsible for promoting interprofessionalism at the U of S). Attendees were charged a small (~\$20) registration fee. Total: ~\$2500. ~250 from registration fees and \$2200 from sponsors.

Expect surplus revenue with a smaller event turnout. In such cases in the past, donors have been informed and had agreed to donate excess revenue to the host for clinic operations (SNaCC 2016).

Conference agenda:

The focus of the conference should be geared towards the attendees. The 2016 SNaCC focused on issues for new and developing clinics (governance models, fundraising and sustainability, starting an SLC) since most sites attending were still in their preliminary stages.

The SNaCC Pack:

The SNaCC Pack is a Google Drive folder where SLCs can upload and share useful documents pertinent to daily operations and organizing the SNaCC conference.

In the sub-folder "TOPICS," there are daily resources for the following: risk management/insurance, research, program deliverance, presentations, policies, media/advertising, letters of support, human resources/operating procedures, governance, and finance.

The sub-folder "CONFERENCE DOCUMENTS" contains the conference documents and planning information of the past SNaCC events.

Given the nature of the documents, the *SNaCC Pack* Drive folder is set to private. To request access, contact a representative from an SLC and ask for a link.

Canadian Student Led Clinics Official Facebook Group:

The official Facebook group is closed access (any user can find it, but must request permission to access resources). Currently, membership includes both past and present SLC volunteers and executives. Content includes SLC Toolkit updates, SNaCC planning, and general clinic and community updates. This is currently the fastest way to communicate with all the SLCs.

Canadian Conference on Medical Education (CCME):

In 2017, representatives from SWITCH and ASPIRE presented data regarding the utility of this SLC toolkit at CCME where the presentation sparked a lot of discussion. Representatives from several SLCs then applied to host a session at the 2018 CCME Innovation Symposium, which was ultimately not selected for the conference. The purpose of the symposium is to examine innovational medical education from many perspectives. Below is the abstract for the project titled *Learner-Led Education: A New Paradigm of Medical Education:*

"Learner-Led Education: A New Paradigm of Medical Education" re-evaluates the focus that medical curricula place on developing clinical knowledge in a traditional setting. This symposium will illustrate the student's pivotal role in improving undergraduate medical education through student-led initiatives. The first of four brief talks will explore the background behind the development of student-led initiatives, and reasons why students can direct their own education. Using Student-Led Clinics as the focus, the second and third talks will discuss the benefits and challenges of student-led initiatives compared to traditional, faculty-led learning. The final talk will examine the role student-led initiatives might play in the future of medical education. Presenters will draw from their experiences as learners in medical schools and as leaders in developing and directing student-led clinical learning initiatives.

Through the presentations and subsequent discussion, it is hoped that this symposium will expand current discussions between learners and medical education leaders to explore a new paradigm for undergraduate medical education: A method of education that puts student and community needs at the forefront, with learners and faculty leading the way together."

2. Potential for Future Collaboration

As the clinics across Canada continue to grow and reach a point of stability, the future for collaboration is very bright. The aforementioned CCME proposal is a good starting point. Beyond, clinics can develop national research projects focused on medical education and the impact of student-led clinics. The SNaCC conference provides a perfect opportunity to plan and execute such research projects.

There is a group called the Society of Student-Run Free Clinics (SSRFC) (http://www.studentrunfreeclinics.org/) based out of the United States. The SSRFC hosts an annual conference that Canadian SLCs have had intermittent representation at in the past. The SSRFC also hosts a journal called the Journal of Student-Run Clinics (http://journalsrc.org/index.php/jsrc/about). SNaCC has not contacted or worked with the SSRFC. Consideration should be given to contacting the SSRFC, attending the annual conference, and publishing in the Journal of Student-Run Free Clinics.

Self-Regulation, Medical Regulatory Authorities

Authors: College of Physicians and Surgeons of Ontario

Student-Led Clinics (SLCs) must be aware of, and abide by, the legal framework governing healthcare providers in their jurisdiction, as it has implications for the roles and responsibilities of students and preceptors.

1. Approaches

Legal and Regulatory Framework

Each province and territory has legislation that provides a legal framework for the practice and regulation of healthcare within that jurisdiction. This includes the licensing and registration requirements with the relevant regional regulatory authority for healthcare professionals and sometimes for students. A SLC should be familiar with the legal framework of the jurisdiction regarding healthcare provision, as they must comply with the policies and laws of the jurisdiction in which they operate.

For province/territory and profession specific regulations, see <u>Appendix 2</u>: Province and profession specific regulations related to SLCs.

2. Issues to Consider

SLCs aim to operate on an interprofessional basis with the goal of filling existing gaps in care that are found within provincial/territorial health systems. Each health profession that has students and preceptors as participants in a SLC must be aware of the legal and regulatory framework within which they operate, and abide by the expectations outlined by each profession's respective regulatory body.

The composition of health professions involved in a SLC will differ across clinics. The involvement of physicians and medical students will be common, and serves as an example to review here:

Physicians and Medical Students

All practicing physicians must be licensed in the province or territory in which they reside. In some provinces, registration with the medical regulatory authority is required for medical students.

Provincial/territorial medical regulatory authorities in Canada are organizations led by Councils composed of members of the profession and public members acting first and foremost in the interest of the public to uphold the standards of the profession.

An SLC should be aware of the relevant policies, standards and expectations of the medical regulatory authority of their jurisdiction. The province/territory's Medical Regulatory Authority can be found at http://fmrac.ca/members/. SLCs should also be aware of and act in accordance with any relevant legislation in their jurisdiction (provincial/territorial and federal laws).

3. Discussion

Health care providers who act as preceptors in an SLC are bound by the standards and policies set out by the regulatory authorities in their region. Many authorities have standards, policies and/or legal requirements regarding involvement of preceptors in undergraduate medical education, as well as student involvement in care provision, and have information and resources that can help both navigate preceptor and student roles within SLCs. SLCs should check with the various profession specific regulatory authorities for any relevant policies or standards or legal requirements that may be applicable.

Working together with the regulatory authorities in advance, and maintaining close connections with them throughout operation of the SLC, will help ensure that policies, standards and legal requirements are being met. This is crucial to avoiding delays in opening clinics, preventing clinics from being shutdown, and obtaining support from faculties and community healthcare leaders.

School administrations who consider endorsing and supporting the operation of an SLC must be made aware that students and preceptors are operating within a regulated environment. Working with regulatory authorities in advance can help this process immensely.

References

Arenas, Daniel J, et al. "A Monte Carlo simulation approach for estimating the health and economic impact of interventions provided at a student-run clinic." PloS one 12.12 (2017): e0189718.

Arntfield SL, Slesar K, Dickson J, Charon R. Narrative medicine as a means of training medical students toward residency competencies. Patient education and counseling. 2013 Jun 30;91(3):280-6.

Baker L et al. (2011). Relationships of power: implications for interprofessional education. Journal of Interprofessional Care, 25(2), 98–104.

Bridges et al. (2011) Interprofessional collaboration: three best practice models of interprofessional education, Medical Education Online, 16:1

Bullard MJ, Musgrave E et al. Revisions of the Canadian Emergency Department Traige and Acuity Scale (CTAS) Guidelines 2016. *CJEM* 2017: S18-27.

Butala NM, Murk W, Horwitz LI, Graber LK, Bridger L, Ellis P. What is the quality of preventive care provided in a student-run free clinic?. Journal of Health Care for the Poor and Underserved. 2012;23(1):414-24.

Campbell DJ, Gibson K, O'Neill BG, Thurston WE. The role of a student-run clinic in providing primary care for Calgary's homeless populations: a qualitative study. BMC health services research. 2013 Jul 17;13(1):277.

Cepeda M, Chapman R., Miranda N, Sanchez R., Rodriguez C, Restrepo A, ... Carr DB. Emotional disclosure through patient narrative may improve pain and well-being: results of a randomized controlled trial in patients with cancer pain. J. Pain Symptom Manage. 2008; 35(6), 623-631.

Charon R. Narrative medicine: a model for empathy, reflection, profession, and trust. Jama. 2001 Oct 17;286(15):1897-902.

Choudhury N, Khanwalkar A, Kraninger J, Vohra A, Jones K, Reddy S. Peer mentorship in student-run free clinics: the impact on preclinical education. Family medicine. 2014 Mar;46(3):204-8.

Dugani S, McGuire R. Development of IMAGINE: A three-pillar student initiative to promote social accountability and interprofessional education. Journal of interprofessional care. 2011 Nov 1;25(6):454-6.

Frenk J et al. (2010). Health professionals for a new century: transforming education to strengthen health systems in an interdependent world. The Lancet, 376(9756), 1923–1958.

Gross D, Zyzanski SB, Cebul R, Stange K. (1998). Patient satisfaction with time spent with their physician. J Fam Pract. 1998;47(2), 133

Haggarty D, Dalcin D. Student-run clinics in Canada: an innovative method of delivering interprofessional education. Journal of interprofessional care. 2014 Nov 1;28(6):570-2.

Hajar R. History of Medicine Timeline. Heart views: the official journal of the Gulf Heart Association. 2015 Jan;16(1):43.

Hall P (2005). Interprofessional teamwork: professional cultures as barriers. Journal of

Interprofessional Care, 1, 188–196.

Herbert C et al. (2007). Factors that influence engagement in collaborative practice: How 8 health professionals became advocates. Canadian Family Physician, 53(8), 1318-1325.

Holmqvist M, Courtney C, Meili R, Dick A.. Student-run clincs: Opportunities for Interprofessional education and increasing social accountability. J Res Interprof Pract Educ. 2012; 2(3), 264-277.

Kim GB, Lee S, Kim H, Yang DH, Kim YH, Kyung YS, Kim CS, Choi SH, Kim BJ, Ha H, Kwon SU. Three-Dimensional Printing: Basic Principles and Applications in Medicine and Radiology. Korean journal of radiology. 2016 Apr 1;17(2):182-97.

Kramer, Nick, Jaden Harris, and Roger Zoorob. "The Impact of a Student-Run Free Clinic on Reducing Excess Emergency Department Visits." Journal of Student-Run Clinics 1.1 (2015).

Lawrence D, Bryant TK, Nobel TB, Dolansky MA, Singh MK. A comparative evaluation of patient satisfaction outcomes in an interprofessional student-run free clinic. Journal of interprofessional care. 2015 Aug 28;29(5):445-50.

Liberman KM, Meah YS, Chow A, Tornheim J, Rolon O, Thomas DC. Quality of mental health care at a student-run clinic: care for the uninsured exceeds that of publicly and privately insured populations. Journal of community health. 2011 Oct 1;36(5):733-40.

Meah YS, Smith EL, Thomas DC. Student- Run Health Clinic: Novel Arena to Educate Medical Students on Systems- Based Practice. Mount Sinai Journal of Medicine: A Journal of Translational and Personalized Medicine. 2009 Aug 1;76(4):344-56.

Mickan S, Hoffman S & Nasmith L (2010). Collaborative practice in a global health context: common themes from developed and developing countries. Journal of Interprofessional Care, September, 492–502.

Nakamura M, Altshuler D, Binienda J. Clinical skills development in student-run free clinic volunteers: a multi-trait, multi-measure study. BMC medical education. 2014 Dec 12;14(1):1.

Reeves S et al. (2009). Interprofessional education: effects on professional practice and health care outcomes. The Cochrane Library, 4, 1–22.

Rich Man Poor Man. About Us. richmanpoorman.ca/about-us-rich-man-poor-man/.

Rojas SM, Smith SD, Rojas S, Vaida F. Longitudinal hyperlipidemia outcomes at three student-run free clinic sites. Family Medicine. 2015 April;47(4):309-314.

Rubenstein, William, et al. "What Drives Faculty to Volunteer at a Student-Run Clinic for the Underserved?." Journal of Student-Run Clinics 2.1 (2016)

Schutte T, Tichelaar J, Dekker RS, Agtmael MA, Vries TP, Richir MC. Learning in student- run clinics: a systematic review. Medical education. 2015 Mar 1;49(3):249-63.

Scott EA, Swartz MK. Interprofessional student experiences on the HAVEN free clinic leadership board. Journal of interprofessional care. 2015 Jan 2;29(1):68-70.

Sean A, Chandan B, et al. The ABC's of the Calgary SRC. 2015-16.

Seif G, Coker-Bolt P, Kraft S, Gonsalves W, Simpson K, Johnson E. The development of clinical

reasoning and interprofessional behaviors: service-learning at a student-run free clinic. Journal of interprofessional care. 2014 Nov 1;28(6):559-64.

Stuhlmiller, Cynthia M., and Barry Tolchard. "Developing a student-led health and wellbeing clinic in an underserved community: collaborative learning, health outcomes and cost savings." BMC nursing 14.1 (2015): 32.

Seifert LB, Schaack D, Jennewein L, Steffen B, Schulze J, Gerlach F, Sader R. Peer-assisted learning in a student-run free clinic project increases clinical competence. Medical Teacher. 2015 Nov 17.

Shabbir SH, Santos MT. The role of prehealth student volunteers at a student-run free clinic in New York, United States. Journal of educational evaluation for health professions. 2015;12.

Sheu L, O'Brien B, O'Sullivan PS, Kwong A, Lai CJ. Systems-based practice learning opportunities in student-run clinics: a qualitative analysis of student experiences. Academic Medicine. 2013 Jun 1;88(6):831-6.

Smith S, Thomas R, Cruz M, Griggs R, Moscato B, Ferrara A. Presence and characteristics of student-run free clinics in medical schools. JAMA. 2014 Dec 10;312(22):2407-10.

Smith SD, Marrone L, Gomez A, Johnson ML, Edland SD, Beck E. Clinical outcomes of diabetic patients at a student-run free clinic project. Fam Med. 2014 Mar 1;46(3):198-203.

Soltani M, Smith S, Beck E, Johnson M. Universal depression screening, diagnosis, management, and outcomes at a student-run free clinic. Academic Psychiatry. 2015 Jun 1;39(3):259-66.

Teherani A. On autonomy in student- run clinics. Medical education. 2015 Mar 1;49(3):238-9.

Trumbo, Silas P., et al. "The Effect of a Student-Run Free Clinic on Hospital Utilization." Journal of health care for the poor and underserved 29.2 (2018): 701-710.

Vaikunth SS, Cesari WA, Norwood KV, Satterfield S, Shreve RG, Ryan JP, Lewis JB. Academic achievement and primary care specialty selection of volunteers at a student-run free clinic. Teach Learn Med. 2014;26(2):129-34.

World Health Organization. Framework for Action on Interprofessional Education & Collaborative Practice. 2010 Retrieved from http://whqlibdoc.who.int/hq/2010/WHO_HRH_HPN_10.3_eng.pdf

Yan J, Gilbert J & Hoffman SJ (2007). World Health Organization study group on interprofessional education and collaborative practice. Journal of Interprofessional Care, 21, 588–589.

Zucker J, Lee J, Khokhar M, Schroeder R, Keller S. Measuring and assessing preventive medicine services in a student-run free clinic. Journal of health care for the poor and underserved. 2013;24(1):344-58.

Appendix 1: Checklist



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How to Start a Student-Managed Health Initiative 101

1. Getting Started

- Finding Students, Faculty and Others Who Believe In Your Project
- Develop a Vision, Mandate, Objectives and Goals
- Develop Bylaws
- Develop and Implement Surveys, Needs Assessment, Logic Model What Is Your Reason for Existence; Who Do You Want to Serve?
- Write a Short Business Proposal & Develop A Preliminary Budget
- Assessing Your Own Circumstances Range of Services; Who Is Your Personnel; Who Are Your Clients & Partners; What Is Your Location; Who Can Be Your Host
- Networking Everyone Can Be a Friend

2. Operational Issues - Clinical

- What Functions Do Students Serve Social Team; Clinical Team, Psychosocial Floater; Counselor; Shift Supervisor; Medical & Pediatric Resident, Food Prep; Childcare; Program Development & Facilitator
- Interprofessional Staffing Clinical, Program, Cultural
 - o Physician, nurse, receptionist, cultural support worker(s), mentors, program coordinator, food prep/shopping, Kaptain Kid, shift supervisor.
- Scheduling Personnel Manual or Computer? Emergency Staff List;
 Student Categories
- Liability, Directors & Officers, & Malpractice Insurance How Are Students, Professionals & Staff Covered & By Whom?
- Shift Structure Introductions, Client Care, Debrief Period, Interprofessional Team Building, Continuing Educational Opportunities, Case Management Discussions
- Scopes of Practice/Skills Inventories for Each Student Discipline and Level
- Develop Orientation Session(s) & Presenters Agenda Issues To Include?

- Programming Developing Your Own &/or Partnering With Others
- Policies Charting; Code of Ethics; Reproductive Rights; Red Flag Situations;
 Dispute Resolution; Drop-In Children; Childcare Reporting
- Providing Social Services Food; Phone; Condoms; Needle Exchange; Newspaper; Chess; Puzzles; Clothes Depot; Computer Access; Advocacy; Client Assistance – Letters, Forms, Applications, Employment; Transportation for Clients

3. Operational Issues – Administrative

- Staffing Coordinator; Program Director; Educational Liaison; Fundraising;
 Volunteer Coordinator; Accountant/Bookkeeper; Lawyer; Webmaster; Schedulers Students, Professionals
- Staff Issues Hiring; Contracts; Payroll; Staff Meetings; Dispute Resolution
- Finances Budgeting; Banking; Bookkeeping; & Financial Review vs. Audit
- Research & Evaluation Data Collection, Compilation & Evaluation Reporting
- Record Keeping Meeting Minutes; Student, Professional, Client & Program Participant Numbers; Calendar of Events; Personnel Files – Students, Professionals, Staff; Funding & Grant Agreements & Reports; Service Agreements; Banking & Financial Information; Receipts; Tax Receipts; Correspondence
- Community Development & Knowledge Transfer Networking; Partnering; Presentations; Conferences; Publications
- Contact Lists Networking CBO's, Partners, Job Postings, Potential Funders;
 Media, Organization Newsletter; Students; Professionals; Faculty; Committee
 Members; Interested Parties

4. Funding & Sustainability

- Identify Potential Funders Government Federal, Provincial & Municipal; University & Individual Colleges; Community; Foundations, Corporations & Individuals. Potential for Multi-Year Funding?
- If Applicable, Develop Funding Policy
- Develop Strategy for Contacting and Presenting to Potential Funders
- Do You Remain Unincorporated; Incorporated Non-Profit and/or Registered Charity? Tax Receipt Disbursement?
- Develop Long-Term Strategy for Funding
- Sustaining Student Interest & Involvement Have Fun; Constant Recruitment; Integrate Your Project Into Curricula; Practica
- Sustaining Professional Interest & Involvement Constant Recruitment; Remuneration; Have Fun; They Love Teaching
- Maintaining Effective Service Delivery Don't Spread Yourself Too Thin
- Maintaining Relationships Partners, Clients & Others
- Tracking System for Funding (Application and Reporting Deadlines, regular board review of Budget-to-Actual)

5. Marketing & Public Relations

- Logos & Branding
- Website Development & Maintenance; Scheduling Software
- Printing Brochure; Recruitment Cards; Posters; Business Cards

- Media Contact List; Media Releases; Interviews; Photos
- Presentations Student Recruitment; Professional Recruitment; Potential Funders; General Use
- Promotional Items T-shirts, Magnets, Coffee Mugs, Lanyards
- Community Events Community Dinner or BBQ; Community Cleanups
- Fundraising Events Golf Tournament; Dinners; Dances; Bowling Challenges
- Project Video

6. Paperwork is Your Friend

- Student Contract
- Student Manual
- Mentor Contract
- Mentor Manual
- Staff Contract(s)
- Faculty Letter of Recommendation
- Criminal Record Check
- Skills Inventories or Scopes of Practice Per Discipline & Program Level
- Shift Supervisor End of Clinic Checklist
- Attendance Sheet
- Intake Form
- Client Checklist
- History & Prescription Form
- Kids' Rules
- Debrief Notes
- Referral Information
- Local Resource Directory
- Donation Deposit Form
- Policies & Protocols
 - 1) Policies
 - o Research Policy
 - o Red Flag Situation Policy Chest Pain, Difficulty Breathing, Heavy Bleeding, Suicide Ideation, Other
 - o Personal Conduct Policy
 - o Patient Follow-up & Continuity of Care Policy
 - o Client Exam Room Policy
 - o Teaching Policy (Mentors)
 - o Interprofessional Policy
 - o Feedback Policy
 - o Prescription Policy
 - o People Under the Influence Policy
 - o Clients Seen Alone vs. With Another Policy
 - o Child Abuse Disclosure Policy
 - o Reproductive Policy
 - o Impeachment Policy
 - o Conflict Resolution Policy
 - o Media, Social Media, and Communications Policy
 - o Photography Policy

- o Financial Reserve Policy
- o Sponsorship Policy
- 2) Protocols
 - o Dispute Resolution Protocol
 - o Code of Conduct
 - o Confidentiality Agreement
 - o Code of Ethics (Individual Profession & Project)

7. Planning for the Future

- Strategic Planning Reviewed Annually
- Contracts or Memorandum of Understanding with Major Partners
- Evaluation Model for Clinical and Non-Clinical Programs
 - o Collect data for internal purposes (are we reaching our goals and if not why?) and external purposes (demonstrate impact to stakeholders in Annual Report)
 - o Could include creating a program logic model, theory of change, regular needs assessments
- Board Portfolios and Board Mentoring
 - o How are you going to ensure that board knowledge gets passed down with the high rate of student turnover inherent to SLC's?
- Fundraisers and Special Events

Appendix 2: Province and profession specific regulations related to SLCs.

Appendix Authors: Delia Sinclair Frigault, Policy Analyst (CPSO), Noam Berlin (CFMS/OMSA)

NOTE: The information provided in this section is intended for information purposes only, and is not intended to constitute legal advice. The CPSO investigates all complaints received, and decisions are made on a case-by-case-basis.

1. College of Physicians and Surgeons of Ontario (CPSO)

The College is the self-regulating body for the medical profession in the province of Ontario. Its mandate is to serve and protect the public interest by governing the medical profession. All doctors in Ontario must be members of the College in order to practice medicine in the province.

1.1 Medical Regulation

The role of the College, as well as its authority and powers, are set out in the <u>Regulated Health</u> <u>Professions Act</u>, 1991 ("RHPA"), the <u>Health Professions Procedural Code</u>, being Schedule 2 to the RHPA (the "Code"), and the <u>Medicine Act</u>, 1991.

The Legislature has given the College the mandate to regulate the practice of medicine in Ontario, including through enforcement of clinical and professional standards for physicians in Ontario. The College has the obligation to ensure that standards of clinical and professional practice are in place to govern physicians in the service of the public interest.

One of the College's duties as a medical regulator is to provide guidance to physicians across Ontario on issues related to professionalism and ethics and on clinical and practice issues that are relevant to the practice of medicine. As the body with exclusive jurisdiction over the regulation of Ontario physicians, the College has a duty to ensure that mechanisms are established to regulate both clinical issues and issues related to professionalism and ethics.

1.2 Student-Led Clinics and Medical Students in Ontario

As medical students interested in establishing and operating a SLC in Ontario, it is important to be familiar with the policies and positions developed by the College, along with any relevant legal requirements. In Ontario, medical students are not required to be registered with the CPSO, but physicians who will be acting as preceptors in the SLC are members of the CPSO and are therefore bound by the policies set out by the College. In addition, they must practice in accordance with applicable legislation.

The College expects preceptors participating in SLCs to be familiar with and act in compliance with <u>all</u> College policies. Those policies that are particularly relevant to the involvement of physicians in SLCs are as follows:

- <u>Delegation of Controlled Acts</u> policy
- Professional Responsibilities in Undergraduate Medical Education policy
- Confidentiality of Personal Health Information policy

• Medical Records policy

1.3 Delegating Controlled Acts, Professional Responsibilities in UME and Student-Led Clinics

Under Ontario law, controlled acts are specified in the <u>Regulated Health Professions Act</u>, 1991 (RHPA) as acts which may only be performed by authorized regulated health professionals. The RHPA permits physicians to delegate to others who are not independently authorized to perform controlled acts (Section 27(1)(b) of the RHPA) and the College's <u>Delegation of Controlled Acts</u> policy sets out expectations for this practice. A list of controlled acts can be found in both the RHPA and the College's <u>Delegation of Controlled Acts</u> policy.

Typically, undergraduate medical students are permitted to perform controlled acts through a mechanism in the *RHPA*. The *RHPA* sets out an exception to the general restriction that permits students to perform controlled acts when they are acting under the supervision of a member of the profession and when they are "fulfilling the requirements to become a member of a health profession." (Section 29(b) of the *RHPA*).

Notably, the College's delegation policy requires that delegation only be done when it is in the patient's best interest to do so (i.e. in order to facilitate the timely delivery of health care and promote optimal use of health care resources and personnel).

While participating in a SLC provides medical students with opportunities to develop their clinical skills, the primary motive for participating in a SLC must be to provide patients with the same standard of care they would receive elsewhere, and is intended to provide care they would otherwise not receive.

1.4 Summary

All participants in a SLC must be familiar with, and abide by, the legislation and policies that regulate the practice of medicine in the province.

Physicians who have reviewed CPSO policies and provincial legislation, but have specific questions about their involvement in a SLC are encouraged to call CPSO's Physician Advisory Service.

Physician Advisory Service

Local: 416-967-2606

Toll Free: 1-800-268-7096 Ext. 606

Online information: http://www.cpso.on.ca/CPSO-Members/Resources-for-Physicians/Physician-

Advisory-Service

Appendix 3: SWITCH Updated Pre-brief 2017

- 1. **Introductions:** Ask everyone to introduce themselves with their name, college (if in school) and their category. Pass around the attendance sheet while introductions are happening and ask students to check themselves off, as well as write down any other languages spoken and any special skills they have (ie. ASIST Training).
- 2. **Check for new SWITCHer's:** Make sure that the Cat A Sup. knows to match them up with an experienced SWITCHer.

3. Red Flag Situations:

Sometimes on shift we encounter what we call "Red Flag Situations." These include:

 Chest pain, heavy bleeding, difficulty breathing, suicide ideation, child abuse disclosure, sexual/physical assault, harassment (to anyone), and hypothermia (winter months)

Red flag situations must be brought directly to the shift supervisor or clinical team. They should also be reported to the office staff as soon as possible.

4. **Assist Button:** In the event of a red flag situation, or any situation where you need urgent assistance, we have an assist button in every room (the nice highlighted one on the phone that says Assist). When pressed, an announcement will go out over the intercom stating "Assistance is needed in room ___." In the event of an emergency, mentors and staff are to respond and Cat A's please just stay where they are. If you are looking for a room on shift, rooms that start with a 2 are on the 2nd floor, and rooms that start with a 1 are one the 1st floor.

5. In Emergency Situations:

- If 9-1-1 is dialed from a clinic phone, 9-9-1-1 must be dialed.
- Emergency services will require a callback number and our address, every volunteer has the following information on the back of their nametag.
- Callback number **306-664-4310**
- Address 1528 20th Street West
- 6. **AED:** If an AED is needed on shift, one is located in Reception.
- 7. Your shift today belongs to you, and you will get as much out of the shift as you put into it. We have lots of great opportunities that can help you move out of your comfort zone, so don't be afraid to try a new role or start conversations with clients. If you are looking for something else to do, want to change roles, or have any questions, don't hesitate to talk to a supervisor or someone in the office.
- 8. **Confidentiality:** Due to our status as a health clinic, and our location inside the Westside Community Clinic, a certain level of trust and confidentiality is expected. Clients may not explicitly state that what they're telling you is confidential, however, you should not be going home and talking about what clients told you on shift. This is true whether you are on the clinical or outreach teams. If you do want to talk about what happened to you on shift today, debrief is the perfect time to do so. If you wish to debrief in a more private setting, our social worker or office staff would be more than happy to talk to you after shift as well.
- 9. A lot of our clients have had poor experiences with healthcare institutions, and we find that the best way to overcome those setbacks is by maintaining an environment of mutual respect here at SWITCH. If you have any questions about the best way to do that, please let us know.

10. **Smudge:** To be performed and explained by the cultural support worker. Remind volunteers that the smudge is not mandatory and they may leave the room if they wish to do so. Jewelry and glasses should be removed prior to smudging.

If there is no cultural support worker present: Normally we would do a smudge at this point but we are unable to do so today. Please before you start your shift take a moment to think about creating as many good outcomes as possible, and how you plan to do that on shift today.

11. Final Reminders:

- Announce Programming: Clients today may ask you what we have for programming, so this is what we have today.
- Nametags, closed toed shoes, and volunteer t-shirts must be worn at all times. If you
 are missing any of these items, please talk to a staff member in the office immediately
 after prebrief.

Appendix 4: Additions for Future Versions

Literature Review:

• Update as new literature is published

Governance models and on-boarding:

• Different governance models adopted by SLCs (ie. Who is on the board (what colleges, are there professional advisors)? What do the organizational bylaws look like? Is there staff and what is their responsibility/relationships relative to the board?) and how are new board members trained to enter an administrative position (a challenge for many students that don't have a business background)

Clinic Models:

• Include stand-alone clinics in other countries (USA, Sweden, Denmark, Australia, Japan)

Summary Chart of Active Canadian Clinics:

- Sources of funding
- Approximate annual budget
- Major costs
- Update Information
- Add new clinics

Common Challenges and How to Approach Them:

- Billing:
 - More details in the future on provincial regulations and how shadow billing works
- New sections:
 - Clinical flow/operations
 - Orientation/training

Non-Clinical Activities:

- Include links to existing resources, samples and templates
- Respondents wanted to know more about non-clinical ways of engaging students and clients at their SLCs (childcare, educational programming, tax clinic, hot meals, research projects, etc.). The section needs to make more concrete suggestions and include some examples.

Appendices:

- Sample/template business plans
- Sample/template clinic flow/operations