

Workplace Health and Safety in the Health and Community Services Sectors:

Evidence-based Best Practices and
Assessment of Current State in Nova Scotia

*Prepared as part of the development of a **Workplace Safety Action Plan**
for Nova Scotia's Health and Community Services Sectors by Research Power Inc.*



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Executive Summary

Background and Methods

Nova Scotia's health care and community services sectors play a critical role in the health and well-being of all Nova Scotians, but are challenged by the highest rates of work-related injury. The most common type of injury is a sprain or strain related to assisting patients/clients/¹ residents/persons supported to move. Injuries related to workplace violence are also an area of concern. There is already much work underway in the province to address workplace health and safety for the health and community services sectors. In 2016, organizations including AWARE-NS (Nova Scotia's health and community services safety association), the Nova Scotia government, the Nova Scotia Health Authority (NSHA), the IWK Health Centre (IWK), the Workers' Compensation Board of Nova Scotia (WCBNS), unions and employers in these sectors began the process of developing a *Workplace Safety Action Plan for Nova Scotia's Health and Community Services Sectors*. The Action Plan work focuses on the publicly-funded home care, long-term care (LTC) and community services sectors as these are the areas of greatest need.

The first step in developing the Action Plan was to conduct research to identify best practices for improving health and safety in the home care, long-term care and community services sectors and to assess the current state of workplace health and safety for these sectors in Nova Scotia. This research involved a literature/document review (grey and academic literature), and interviews with key informants from Nova Scotia, the rest of Canada, and internationally.

Findings

Initiatives and supports for workplace health and safety currently available to employers and staff in the health and community services sectors in Nova Scotia identified through this research include:

- Workplace health and safety legislation and regulations, licensing of publicly-funded organizations, and enforcement of requirements;
- Organizations such as AWARE-NS and WCBNS that support workplace health and safety through training and support to employers and workers;
- Provincial workplace safety strategy and associated initiatives;
- Supports provided by the provincial Department of Health and Wellness (DHW) such as bed/equipment loan programs, infection prevention and control programs, funding to support training for nurses through the provincial Nursing Strategy, etc.;
- Initiatives to address safely lifting and transferring clients based on the Soteria Strains provincial strategy for health care workplace musculoskeletal injury (MSI) prevention;
- Programs and training to address workplace violence (e.g., Steps for Safety offered by WCBNS and AWARE-NS, Challenging Behaviours Program provided by the NSHA and funded by DHW);
- Efforts to build a safety culture (e.g., Health and Safety Leadership Charter, use of management systems that integrate safety into daily activities);
- Injury management and return-to-work programs.

¹ Throughout the report, the term "client" is used to refer to patients, clients, residents, and persons supported.

Although there is much positive work already underway to support workplace health and safety in home care, LTC and community services, challenges still exist. There are many factors that, if lacking, can have a negative impact on workplace health and safety. Some of the factors that are challenges in Nova Scotia include a workplace culture that does not prioritize and support safety; a lack of safety leadership; resource limitations that impact access to staff, equipment, and health and safety expertise; the increased complexity and acuity of clients and the associated increased care and support needs (e.g., increased levels of dementia or other mental health challenges and associated behaviours); the availability and composition of the workforce (e.g., staff shortages, turnover and difficulty recruiting, the aging workforce, the mental health of staff, etc.); barriers to accessing safety-related training and education; the physical environment in which staff work (e.g., providing home care in a client's home, older facilities); and a lack of accountability for unsafe practices at the employee and organization levels.

Understanding the barriers and challenges that exist and the current initiatives to support workplace health and safety in Nova Scotia is an important first step in determining which areas should be addressed within the Action Plan. This research also identified some of the initiatives and best practices that have contributed to reducing injuries in the health and community services sectors. While there are many initiatives specific to different types of injuries (e.g., sprains and strains related to moving/lifting clients, workplace violence), there are also several broader areas where interventions could help to improve workplace health and safety across injury types. Initiatives related to safety culture and leadership include implementing and using safety management systems and continuous improvement practices; providing education and support for leadership; and engaging employees at all levels, and empowering them to address safety issues. Using resources more efficiently (e.g., by collaborating on initiatives/policy development, group purchasing, etc.) could help to free up resources to be directed to health and safety initiatives. Gaining an accurate understanding of the issues and needs of clients will help to ensure that an appropriate mix of staffing and support is in place that supports the safety of both clients and workers. Providing supports to staff such as employee wellness/mental health programming, effective return to work/stay at work programs, or interventions to support older workers may help to improve safety. Ensuring that staff and leaders have access to appropriate and effective training is critical, as well as access to support for implementation of what is learned through training. Finally, strong accountability mechanisms such as inspection/enforcement, licensing requirements, accountability of staff/leaders within an organization for safety performance, and regularly reporting on safety performance (potential indicators are included in this report) are all important supports that can help to make health and safety a top priority.

Conclusion

This work is an important first step in developing the *Workplace Safety Action Plan for Nova Scotia's Health and Community Services Sectors*. It will be complemented by the findings from consultations with stakeholders in the sectors of interest and additional research as the work to develop the Action Plan continues through 2017.

Introduction

Background

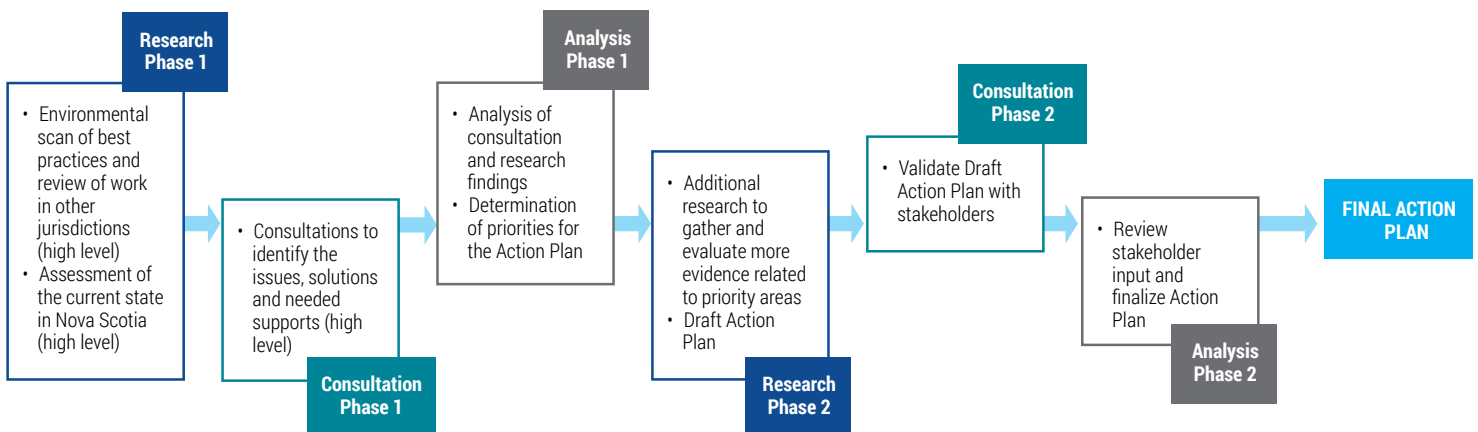
Nova Scotia’s health care and community services sectors – which include ambulance services, family and social services, home care, hospitals, nursing homes/residential care facilities, and special care homes – represent the province’s largest employer group and play a critical role in supporting and enhancing the health and well-being of all Nova Scotians. These sectors, like publicly funded health and community services in many jurisdictions, are challenged by the high cost of service delivery and increasing demands due to poor population health, an aging population and difficulties with staff retention and recruitment in some geographic areas and clinical specialties.

These sectors are also challenged by a high rate of work-related injury and illness. In Nova Scotia, the health and community services sectors have the highest rates of injury (3.03 injuries per 100 workers covered under the Workers’ Compensation Board of Nova Scotia (WCBNS)) and the largest number of claims to the WCB for time lost from work due to injury (Workers’ Compensation Board of Nova Scotia, 2016). Work-related injuries can contribute to burnout, poor job satisfaction, high turnover, and permanent departure from the field, exacerbating health human resource shortages (McCaughey et al., 2012). Injuries negatively affect workplace productivity, and increase costs for government and employers. In addition, the health and safety of the workforce in the health care and community services sectors can have a significant impact on the quality of service they deliver, including patient/client/resident/person supported² and safety outcomes (McCaughey et al., 2012). Nova Scotia needs its care workers healthy, working and on the job.

Because of the size of the health and community services sectors in Nova Scotia, the high rate of work-related injuries and illnesses that could potentially be prevented, and the impact of these injuries and illnesses on quality of care, stakeholders have come together to develop a Workplace Safety Action Plan for Nova Scotia’s Health and Community Services Sectors. The Action Plan will provide overall direction for the health and community services sectors, with particular focus on publicly-funded home care, long term care and community services.

Project Scope

The work to develop the Action Plan is proceeding in several phases, as represented in the figure below:



² Throughout the report, the term “client” is used to refer to patients, clients, residents, and persons supported.

In order to inform development of the Action Plan, two pieces of research were conducted, and the findings are presented in this report (research phase 1). The information gathered through this research will assist those involved in developing the Action Plan with selecting and prioritising the actions to be included. The research conducted in this phase includes:

- An environmental scan, conducted to identify **best practices** for improving health and safety in the health and community services sector that could be potential actions for inclusion in the Action Plan. In addition, information related to the costs and benefits of potential initiatives, and information related to the evaluation of initiatives (i.e., key performance metrics) were identified. The environmental scan included a review of the grey and academic literature, and interviews with key informants from other jurisdictions outside of Nova Scotia.
- A review, to assess the **current state of workplace health and safety** for these sectors in Nova Scotia. The objectives of the review are to:
 - Provide a picture of the current state of health and safety performance for Nova Scotia's health and community services sectors, including identifying possible root causes of work-related injuries;
 - Identify issues/challenges related to workplace health and safety in these sectors; and
 - Identify major activities planned or already underway to improve health and safety outcomes in these sectors.

The assessment of the current state in Nova Scotia involved a review of related documents and data specific to the province, as well as interviews with key informants working in these sectors from across the province.

In addition to Research Phase 1, the action planning process includes these other components:

- Consultation Phase 1: Consultations will be conducted with a broad group of stakeholders to identify, at a high level, the issues, solutions and needed supports related to improving workplace health and safety. Frontline workers, managers/supervisors, senior leaders in LTC, home care and community services organizations, and family/friend caregivers will be engaged through the consultations using a mix of group consultation sessions and surveys.
- Analysis Phase 1: The findings from the phase 1 research and consultation processes will be reviewed and analyzed, and the findings will inform the priority areas to be addressed through the Action Plan.
- Research Phase 2: Additional research will be conducted to further gather and evaluate evidence related to the priority areas. The draft Action Plan will be developed.
- Consultation Phase 2: The draft Action Plan will be shared with stakeholders for their input and feedback.
- Analysis Phase 2: Input from the second round of consultations will be reviewed and the final Action Plan will be developed.

Project Governance

The work on the Action Plan is being led by AWARE-NS (Nova Scotia Health and Community Services Safety Association). The work is also guided by a Steering Committee and an Advisory Committee. A list of members of these committees can be found in the Appendix of this report. Organizations such as WCB, the NS Department of Labour and Advanced Education (DLAE), the NS Department of Health and Wellness (DHW), the NS Department of Community Services (DCS), the Nova Scotia Health Authority (NSHA), the IWK Health Centre (IWK), employers in the home care, long-term care, and community services sectors, and organized labour representatives are represented on the Steering and Advisory Committees. The Project Sponsors (senior representatives from WCB, DHW, LAE, and NSHA) have the final decision-making authority for project related activities. The Deputy Minister of Health and Wellness, as Project Owner, has approval authority for the final Action Plan. A consulting firm, Research Power Inc. (RPI), has been engaged to support the work.

Methodology

Environmental Scan of Best Practices

Literature Review

A comprehensive review of the literature related to workplace health and safety in the health and community services sectors was conducted, including both academic/peer-reviewed and grey literature.

Academic Literature

To identify academic literature, the PubMed, CINAHL, and Health Business Elite databases were searched for related English language articles published in the last five years (2011-2016). Because of the extensive potential scope of this topic, the search focused first on identifying systematic reviews/meta analyses. The search used appropriate terminology, alternative spellings and synonyms, Boolean operators and relevant syntax for the requirements of each database. The search strategy that was used is summarized below, and was modified as required for each database:

"long-term-care" OR "longterm-care" OR "nursing-homecare" OR "nursing-home" OR "home-care" OR "homecare" OR "group-home" OR "group-homes" OR "small-option-home" OR "small-option-homes" OR "small-options-home" OR "small-options-homes" OR "care-home" OR "care-homes" OR "developmental-residence" OR "developmental-residences" OR "residential-facility" OR "residential-facilities" OR "residential-care" OR "nursing-home" OR "nursing-homes" OR "special-care-homes" OR "special-care-home" OR "homes-for-special-care" OR Group Homes (MeSH / CINAHL heading) OR Residential Facilities (MeSH / CINAHL heading)

AND

"occupational-health" OR "occupational-injuries" OR "occupational-injury" OR "occupational-safety" OR "occupational-wellness" OR "workplace-safety" OR "workplace-injury" OR "workplace-injuries" OR safety[ti] OR hazard*[ti] OR injury[ti] OR injuries[ti] OR wellness[ti] OR violence[ti] OR violent[ti] OR bully*[ti] OR "Occupational Health" OR "Occupational-Medline" OR "Occupational-Injuries" OR "Occupational-Exposure" OR "Occupational-Health-Services" OR "Occupational-Health-Nursing" OR "Workplace-Violence" OR "Worker's-Compensation" (MeSH / CINAHL headings)

AND

"best-practice" OR "best-practices" OR "evidence-based" OR framework* OR "action-plan" OR "action-plans" OR "system-wide" OR strategic* OR strategies[ti] OR strategy[ti] OR roadmap* OR "systematic-review" OR "systematic-reviews" OR meta-analysis OR "meta-analyses" OR cost*[TI] OR economic*[ti] OR finance*[ti] (as freetext AND / OR Mesh/CINAHL headings)

AND (in select databases)

staff* OR employee* OR care-taker OR care-takers OR caretaker* OR personnel OR occupational* OR workplace OR "work-environment" OR worker* OR workplace OR "Nursing-home-personnel" (CINAHL heading)

The searches yielded many results, which were narrowed down by a skilled reference librarian to approximately 130 results. The titles and abstracts of these results were reviewed by the consultants for relevance. From these results, approximately 65 relevant articles were obtained in PDF and reviewed in further detail.

Grey Literature

Grey literature was identified through systematic searches of relevant provincial/territorial, national, and international websites (see list below), as well as through general Google searching and review of reference lists from other relevant articles/documents.

Provincial/Territorial

- Provincial Workers' Compensation Boards
- Provincial Workplace Safety Associations
- Ministries of Health/Labour to identify enforcement strategies

National

- Canadian Centre for Occupational Health and Safety
- Association of Workers' Compensation Boards of Canada (AWCB)
- Canadian Institute for Health Information (CIHI)
- CN Centre for Occupational Health and Safety
- Canadian Nurses Association
- Institute for Work and Health
- Ontario Hospital Association
- Accreditation Canada
- Canadian Home Care Association
- Patient Safety Institute
- Home Care Knowledge Network

International

- Australia (Queensland, Victoria)
- Institute for Safety Compensation in Recovery Research (ISCRR)
- UK: NICE, Health and Safety Executive (HSE)
- US: National Institute for Occupational Safety and Health
- US: Centers for Disease Control and Prevention
- US: Dept. of Labor / Occupational Safety and Health Administration (OSHA)
- US: Veterans Affairs
- US: American Nurses Association
- New Zealand Institute of Safety Management
- European Network for Workplace Health Promotion
- World Health Organization

Key Informant Interviews

Telephone interviews were conducted with ten key informants (in nine interviews) from other jurisdictions in Canada and internationally. The purpose of the interviews was to gather information about best practices in workplace health and safety in the health and community services sector, and to refine and substantiate what was learned in the literature review. Potential key informants were identified by the Project Team and through the literature review. Key informants are listed in the Appendix. An interview guide was developed with the input of the Project Team to help ensure all areas of interest were addressed. A copy of the interview guide is available in the Appendix. All interviews were conducted by telephone and lasted approximately 45-60 minutes. Detailed notes were taken during each interview.

Assessment of the Current State in Nova Scotia

Key Informant Interviews

In order to gather information about the current state of workplace health and safety in the health and community services sectors in Nova Scotia, 19 semi-structured interviews were conducted with 22 key informants from across the province. Potential key informants were identified by the Project Team. Key informants are listed in the Appendix. An interview guide was developed with the input of the Project Team to help ensure all areas of interest were addressed. A copy of the interview guide is available in the Appendix. All interviews were conducted by telephone and lasted approximately 45-60 minutes. Detailed notes were taken during each interview.

Document and Data Review

In addition to the key informant interviews, a review of selected reports/documents and data from Nova Scotia was also conducted. Data was identified and gathered by the organizations represented on the Project Steering Committee and provided to the consultant for inclusion in the report. Relevant documents and reports, including both public and internal documents, were identified by the consultant through online searching, as well as by Project Team and Steering Committee members.

Analysis

Information collected through the literature reviews and key informant interviews was thematically analyzed, which involves identifying common threads across sources (i.e., literature and transcripts). Sources were first coded to reveal broader themes, as well as sub-themes/categories that illuminate the data in ways not provided by the main themes/concepts. The themes and sub-categories were then compared and contrasted across data sources to further formulate the themes and categories. Systematic comparisons and verifications ensure that important categories are not overlooked, and that emerging categories and concepts are properly identified.

The strength of response from key informants is reflected in the use of the descriptors “most”, “many”, “some” and “a few”:

- “Most” is used when over three-quarters of respondents discussed a theme.
- “Many” is used when at least approximately two thirds of respondents discussed a theme.
- “Some” is used when at least approximately a third of respondents discussed a theme.
- “A few” is used when less than a third of respondents discussed a theme.

Limitations and Considerations

- Throughout the report, findings specific to one or more settings (e.g., LTC, home care, special care homes, etc.) are noted. If no specific setting is referenced, the reader can assume that the findings apply across all settings.
- In both the environmental scan and the assessment of the current state in Nova Scotia, the majority of the documents/articles identified through the searching were specific to long-term care facilities, health care in general, and/or hospital sectors. A smaller number of documents were specific to home care, and there was very limited information specific to the community services sector. However, key informants familiar with all three settings (long-term care, home care and community services) indicated that many of the challenges and best practices were common across settings.
- In assessing the current state of workplace health and safety in Nova Scotia, relevant provincial documents and data were reviewed and are included in this report. However, there is limited published information specific to the province, so the assessment of the current state relies heavily on input from the Nova Scotia key informants. It is important to note that the key informants did not include frontline staff (though those that represent staff, i.e., labour organizations, were included), so the challenges and supports for workplace health and safety identified in this report may not fully reflect the views of frontline staff. In the next phase of the work (the consultations), the information from the review will be shared with, validated, and added to by those working in the health and community services sectors in Nova Scotia in order to build a more complete picture of the challenges and supports needed.
- The findings from the assessment of the current state in Nova Scotia provide insight into current workplace health and safety issues and initiatives in the province. However, this work is not intended to provide an exhaustive list of all related activities currently underway.
- A detailed description of the current legislation, regulations, and/or codes of practice that apply to health and safety in Nova Scotia is outside the scope of this report.
- Many of the specific topic areas considered in the report (e.g., workplace violence, safe lift and transfer, safety culture, etc.) have an extensive body of literature addressing the topic, including both academic literature and grey literature such as program documents and guidelines. In order to ensure efficient use of resources and extraction of the most relevant information, the evidence review focused primarily on systematic reviews and program documents/information from evaluated programs. This report does not provide a detailed review of programs that address specific topic areas.
- There is also a large body of literature that examines the frequency, nature, and causes of workplace injuries in the health and community services sector. A detailed review of this literature was outside the scope of this project, but some of this information is included where it was identified in documents reviewed for this work.
- Because of the nature of the topic, it is difficult to use rigorous experimental research procedures (i.e., randomized controlled trials). For example, it may not be ethical to withhold the intervention from an appropriate comparison/control group for comparative purposes, or identifying such a group may be practically difficult. This challenge limits the quality of the evidence available to support the effectiveness of interventions.

Findings

Structure of the Findings

The findings from the assessment of the current state in Nova Scotia and the environmental scan of best practices are organized into six main sections:

- **Section 1. Overview of the Sector in Nova Scotia:** provides an overview and description of the health and community services sectors in the province, including how they are organized, governed, and funded.
- **Section 2. Workplace Injuries in Nova Scotia:** describes the data from WCBNS on workplace injuries, including the frequency, types, and causes of injuries.
- **Section 3. Current Initiatives and Supports for Workplace Health and Safety in Nova Scotia:** discusses the current and planned activities in Nova Scotia to address workplace health and safety in the health and community services sectors.
- **Section 4.a Challenges to Improving Health and Safety and Contributing Factors to Workplace Injuries:** identifies factors contributing to workplace injuries and challenges to improving health and safety in the health and community services sectors in Nova Scotia that cut across specific topic areas (e.g., culture and leadership, workforce, accountability, etc.).
- **4.b Strategies, Supports and Best Practices for Improving Workplace Health and Safety:** presents the strategies, supports and best practices for improving workplace health and safety identified both in the review of evidence and best practices and in the assessment of the current state in Nova Scotia.
- **Section 5. Evaluation and Performance Indicators:** reviews potential performance indicators that may be useful in developing the evaluation framework for the Action Plan.

1. Overview of the Sector in Nova Scotia

In Nova Scotia, there are approximately 44,000 people working in the publicly-funded health and community services sectors. These sectors are described below. As noted in the introduction, the areas of focus for the Action Plan are the long term care, home care, and community services (i.e., special care homes) sub-groups.

Long Term Care

Long term care (LTC) is provided through nursing homes and residential care facilities (Nova Scotia Department of Health and Wellness, 2015b). Nursing homes provide accommodation and support to people who have difficulty performing everyday tasks such as, dressing, bathing and toileting, and typically offer higher levels of support (e.g., 24-hour nursing and/or personal care support). Residential care facilities (RCFs) are for residents who have fewer medical needs and require a lower level of care. RCFs provide accommodations and supervision to residents, as well as assistance with personal care. Residents of RCFs must be ambulatory. The specific levels of care provided may vary by facility.

LTC facilities may be owned and operated by the public sector, the private sector, or the non-profit sector. Any facility that receives public funding from DHW must be licensed by DHW under the Homes for Special Care Act and follow the Long Term Care Program Requirements (Nova Scotia Department of Health and Wellness, 2016). Publicly-funded facilities are inspected annually by DHW Investigation and Compliance Officers for licensing purposes. Each facility operates independently. Non-profit facilities/organizations are each governed by a Board of Directors while private facilities are independently owned and operated. Facilities may also be part of a larger organization that operates at a national level or in multiple provinces.

DHW funds LTC facilities across the province with a variety of different funding models: traditional (annual grant based on an annual budget), service agreement (hourly rate inclusive of all costs) and hybrid (a combination of the two other models). DHW funds 100% of health care costs in licensed LTC facilities with the expectation that seniors will contribute to the room and board costs of their residing facility.

There are 133 nursing home and residential care facilities funded by DHW providing services across Nova Scotia. These facilities provide 6,900 nursing home beds and 840 residential care beds and serve 10,000-11,000 residents each year (Nova Scotia Department of Health and Wellness, Nova Scotia Department of Labour and Advanced Education, Nova Scotia Department of Community Services, AWARE-NS, & Workers' Compensation Board of Nova Scotia, 2016). Nursing homes and RCFs may range in size from very small homes that accommodate 3 or 4 residents, to a large facility for almost 500 residents. Nursing homes tend to be larger, with an average of 75 residents, while RCFs are much smaller, with an average of 16 residents and 10 facilities with fewer than 5 residents. The majority of residents in both types of facilities are seniors, but residents may also include younger people who require a high level of care due to an injury or condition (e.g., brain injury). Approximately 8,560 employees work in publicly-funded nursing homes and 584 employees in residential care facilities (Nova Scotia Department of Health and Wellness et al., 2016). Employees may include nurses (RNs, LPNs), personal support workers (PSWs) or Continuing Care Assistants (CCAs), other therapeutic staff (e.g., physiotherapists, occupational therapists, social workers, etc.) administrative and management staff, and support staff (e.g., housekeeping, dietary staff, etc.).

Home Care

Home care provides support to people still living in their homes. Home care may include home support (e.g., personal care, respite, essential housekeeping) and/or nursing (e.g., dressing changes, catheter care, IV therapy, etc.) as required by the individual (Nova Scotia Department of Health and Wellness, 2015a). DHW provides funding for home care services and the NSHA is responsible for operationalizing home care services within that funding. The NSHA serves as the first point of entry into service delivery in the home. As with LTC, home care may be provided by the public sector (NSHA/IWK), or by the private or non-profit sector. Non-profit and private home care agencies operate independently, and non-profit agencies are governed by a Board of Directors. Home care agencies may also be part of a larger organization that operates at a national level or in multiple provinces. Funding methods vary; for-profit providers receive an hourly rate that is inclusive of all costs, while non-profit providers are granted a total amount based on an annual budget.

The 20 publicly-funded home care organizations provide services to almost 23,000 clients. Most of these clients (65%, 14,755) receive both home support and nursing services, with the rest (8,036) receiving only home support services. Approximately 2,000 home support workers and 650 home care nurses are employed in these organizations (Nova Scotia Department of Health and Wellness et al., 2016). In addition, there at least another 191 private firms/agencies providing home care services in the province (Workers' Compensation Board of Nova Scotia, 2016), and this does not include very small operations (i.e., three or fewer staff) that are not registered through WCBNS.

All referrals for home care and LTC services are made through SEAScape, the Single Entry Access (SEA) Case Management Model. Home care clients are assessed using the electronic RAI-HC (Resident Assessment Instrument – Home Care) Assessment, which provides standardized scores called Outcomes and Client Assessment Protocols that are calculated electronically and assist in care planning, evidence based decision-making and determining program eligibility.

Hospitals

Hospitals are the largest employers in the health sector. Hospitals provide diagnosis and treatment for people with all types of illnesses/conditions and injuries. There are 46 hospitals, community clinics and service locations (including all NSHA sites and the IWK Health Centre) across Nova Scotia, as well as a rehabilitation facility (King's Regional Rehabilitation) funded by DCS. Approximately 29,000 employees work in these facilities (Nova Scotia Department of Health and Wellness et al., 2016).

Ambulance Services

Ambulance services are provided through 60 bases across the province, and include approximately 1,100 employees (Nova Scotia Department of Health and Wellness et al., 2016).

Family and Social Services

Family and social services includes 30 Adult Service Centres (ASCs) that provide vocational programs (e.g., skills training) and other day programs for adults with disabilities across Nova Scotia. These Service Centres employ approximately 340 people (Nova Scotia Department of Community Services, 2008; Nova Scotia Department of Health and Wellness et al., 2016). ASCs are run by third-party, non-profit providers, and are each governed by their own board of directors. Funding for the ASCs comes primarily from DCS through grant funding, but ASCs also earn income from their own social enterprise activities. Funding provided by DCS through grants is based on provincial guidelines. ASCs may also apply to DCS for additional funding to address other needs, for example, capital projects or the purchase of equipment. As ASCs provide only day programs and have no residents, they are not covered under the Homes for Special Care Act and are not required to be licensed by DCS. They are of course still required to ensure the safety of residents/participants and the safety of their staff and adhere to all applicable safety legislation and regulations (Judy LaPierre, September 30, 2016).

Community Services/Special Care Homes

Special care homes provide residential services and support for individuals with disabilities as part of DCS's Disability Support Program (DSP). These homes include a range of residential support options in homes/facilities with three or more beds, including small option homes, developmental residences/group homes, residential care facilities, Adult Residential Centres (ARCs) and Regional Rehabilitation Centres (RRCs) (Nova Scotia Department of Community Services, 2013):

- Small option homes support 3-4 residents in the community through a combination of live-in and shift staffing models.
- Developmental residences/group homes offer a residential setting for 4-12 people. They primarily serve younger people and support development of inter-personal, community oriented skills and activities of daily living. Group homes support those with intellectual disability, long-term mental illness, or physical disability, while developmental residences primarily support those with an intellectual disability or dual diagnosis.
- Residential care facilities are for adults with disabilities who require minimal support and supervision and have no major health or behavioural issues that require significant support.
- Adult Residential Centres (ARCs) provide long-term supports/services to enhance development of interpersonal, community oriented, and activities of daily living skills. Support is provided on a 24-hour/7-day a week basis by on-site professional staff.

- Regional Rehabilitation Centres (RRCs) provide both rehabilitation and developmental programs to adults with disabilities who require an intensive level of support and supervision related to complex behavioral challenges and skill development needs. Support is provided on a 24-hour/7-day a week basis by on-site professional staff.

All residential services are provided by third-party service providers and are funded 100% by DCS. The majority of service providers are non-profits governed by their own board of directors, although a few operate as for-profit organizations. Each organization must be licensed under the Homes for Special Care Act and is inspected annually by DCS for this purpose. Funding from DCS is provided primarily based on a per diem rate for each resident. The per diem rates vary according to the needs of the residents (e.g., residents with more behavioural challenges need greater levels of staffing and the per diem rate reflects this). DCS also provides funding to address other needs such as capital projects or the purchase of equipment – organizations must apply to DCS for this additional funding (Judy LaPierre, September 30, 2016).

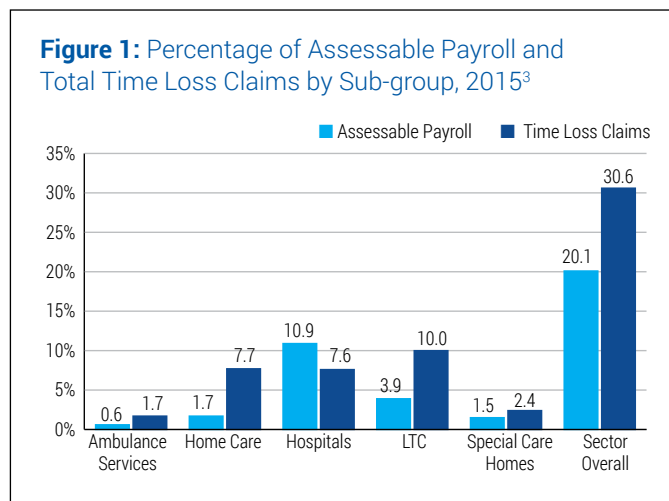
There are 348 licensed homes under the DSP, provided by 77 residential service providers. Approximately 3,600 employees work at these homes (Nova Scotia Department of Health and Wellness et al., 2016).

2. Workplace Injuries in Nova Scotia

Overview

In Nova Scotia, the health and community services sector have the highest rates of injury (3.03 injuries per 100 workers covered under WCB) and the largest number of claims to the WCB for time lost from work due to injury (1,680) (Workers' Compensation Board of Nova Scotia, 2016). In 2015, the health and community services sectors made up approximately 20% of the total assessable payroll for firms covered by the WCB. However, almost a third (30.6%) of the work-related injuries registered with the WCB in 2015 that resulted in a time loss were from this sector (see Figure 1).

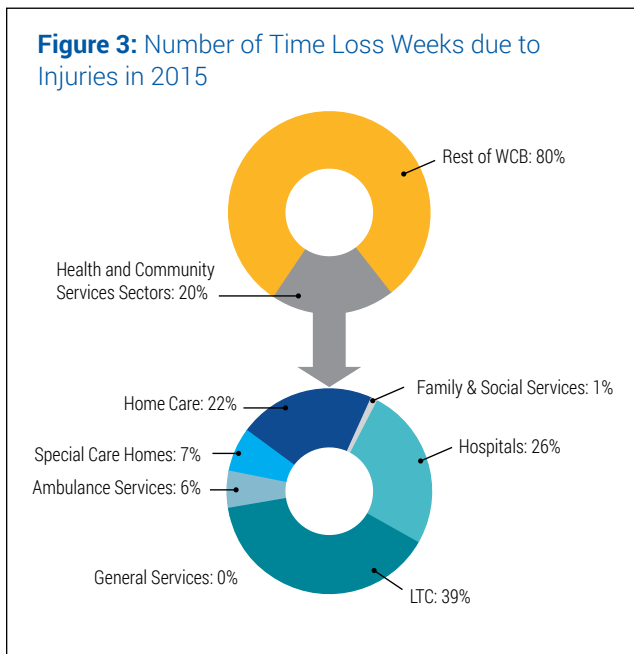
As seen in Figure 1, this disproportionate contribution to the number of time loss claims made for injuries can be attributed primarily to LTC facilities (representing only 4% of assessable payroll, but 10% of time loss claims) and home care (less than 2% of assessable payroll, but almost 8% of time loss claims). Hospitals meanwhile represented approximately 11% of assessable payroll, but only 7.5% of time loss claims. In the health care and community services sector as a whole, LTC and home care represent 28% of the assessable payroll, but almost 60% of time loss claims (Workers' Compensation Board of Nova Scotia, 2015b, 2016).



Source: Workers' Compensation Board of Nova Scotia, 2016

³ The term "hospital" used throughout this section of the report refers to all claims reported by employers that are categorized hospitals by WCB Nova Scotia. It is understood that both the NSHA and IWK have employees that work in various roles outside of acute care, including delivering care in the community and/or in LTC facilities. In all cases, data related to claims filed by workers who are employed by either the NSHA or IWK are presented as statistics for hospitals.

While the number of time loss claims has remained relatively flat or even declined between 2011 and 2015 in the other subsectors (see Figure 2), in home care, the number of claims has steadily increased, and was almost 50% higher in 2015 than in 2011 (Workers' Compensation Board of Nova Scotia, 2016).



Source: Workers' Compensation Board of Nova Scotia, 2016

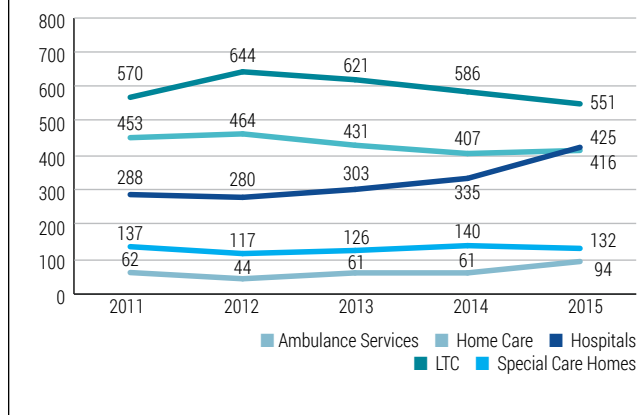
Claim Duration

For injuries that occurred in 2015 only, the average length of time workers were off work across all sectors was 6.1 weeks. In the health and community services sectors, in both home care and LTC, the average length of time loss claims was greater than the provincial average (6.3 weeks in home care, and 7.2 weeks in LTC), but below average for special care homes in community services (5.5 weeks). In 2015, nearly 302 long-term care/home care employees were absent from work for one full year due to work-related injuries (all injuries prior to and including 2015) (Workers' Compensation Board of Nova Scotia, 2016).

Costs

Work-related injuries in the health and community services sectors represent a significant cost to the system. In 2015, over \$58 million dollars in premiums were paid out by organizations in home care (\$11.2 million), LTC (\$20.8 million), special care homes in community services (\$5.2 million), ambulance services (\$2.7 million), and hospitals (\$18.7 million) (Workers' Compensation Board of Nova Scotia, 2016). These funds could be better invested in client care and support if injury rates, and therefore premium payments, were lower.

Figure 2: Time Loss Claims by Sub-group, 2011-2015



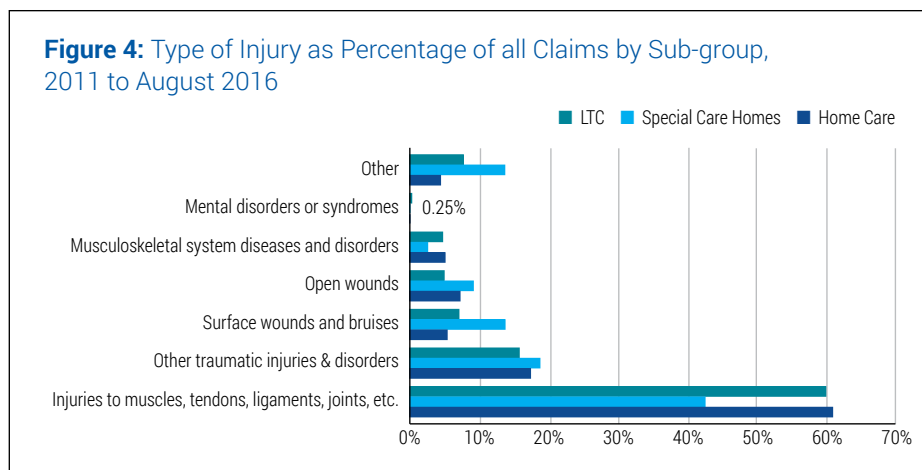
Source: Workers' Compensation Board of Nova Scotia, 2016

In 2015, workers in the health and community services sectors were paid a cumulative total of over 25,000 weeks of Temporary Earnings Replacement Benefit (TERB) by the WCBNS for all injuries that occurred in or prior to 2015. This accounts for approximately 20% of all TERB weeks paid out by the WCB in 2015 (see Figure 3).

The cost of workers' compensation benefits paid for workplace injuries in the health and community services sectors that occurred in 2015 was \$11.3 million (including benefits paid from Jan. 1, 2015 to Feb. 29, 2016). This includes earnings replacement (short and long term) costs, medical costs, and impairment benefits paid out by WCBNS. These costs made up 23% of total WCB benefit costs for injuries that occurred in 2015 (Workers' Compensation Board of Nova Scotia, 2016). The total cost of injuries in these sectors is estimated to be even higher, more than \$100 million, once additional costs not covered by WCBNS – overtime, recruitment, retraining, lost knowledge and experience, administrative time, and negative outcomes for clients – are included (Workers' Compensation Board of Nova Scotia, 2015a).

Types of Injuries

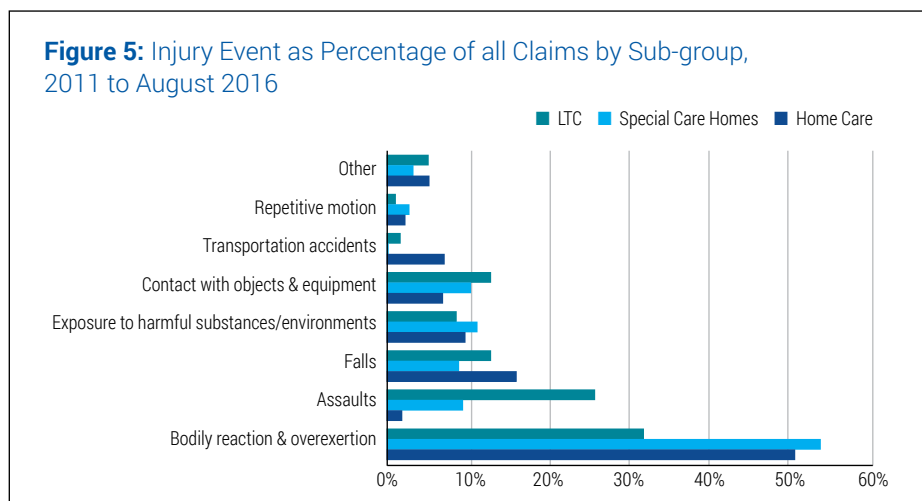
Over the last five years (2011 to 2016), traumatic injuries to muscles, tendons, ligaments, joints, etc. has been the leading type of injury in the long term care, home care and community services sectors, making up approximately 60% of claims in home care and long term care, and 40% of claims in community services (Workers' Compensation Board of Nova Scotia, 2016). Other common types of injuries were other traumatic injuries and disorders (e.g., injuries to bones or nerves, burns, intracranial injuries), and wounds (open wounds and surface wounds and bruises) (see Figure 4).



Source: Workers' Compensation Board of Nova Scotia, 2016

Causes of Injuries

The WCBNS tracks the type of event that resulted in any injury claimed. For the three sub-groups of interest, the majority of claims between 2011 and 2016 were a result of bodily reaction (i.e., the body reacting to a movement or event) and/or overexertion (e.g., lifting or moving something heavy). These types of injuries occurred more frequently in home care and nursing home settings. Assaults (including physical assault, violent acts and harassment) occurred more frequently in special care homes (26% of all claims) than in other settings. See Figure 5 for further details.

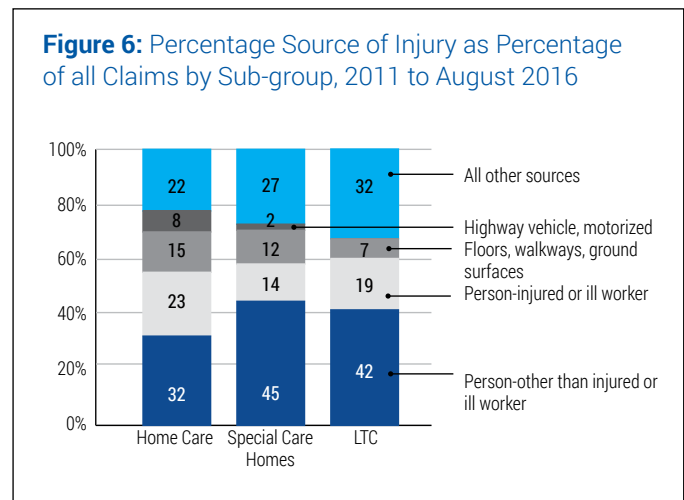


Source: Workers' Compensation Board of Nova Scotia, 2016

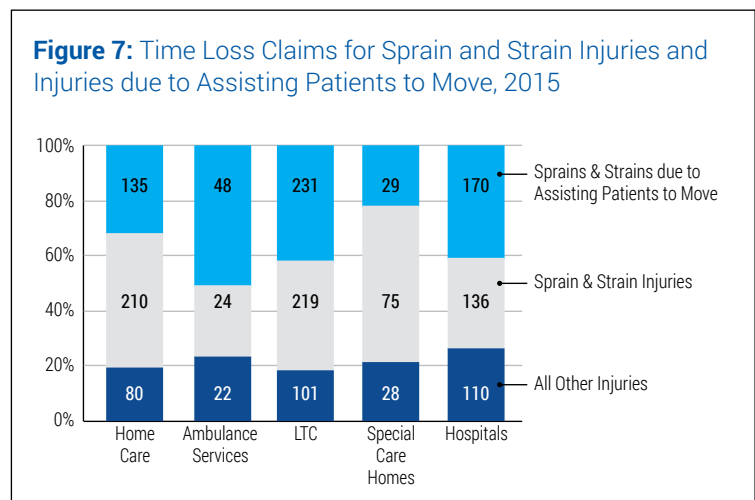
Data on the source of the injury is also revealing. Figure 6 below shows the source of injury as a percentage of all claims from 2011 to 2016 for home care, special care homes, and LTC facilities. In all three sectors, the largest percentage of injuries is due to a person other than the worker. This suggests that the injuries may be related to client handling or to incidents of violence for example. Injuries resulting from floors, walkways and ground surfaces represent slips, trips and falls, which make up over 10% of injuries in home care and special care homes. In the home care sector, where employees travel from location to location, vehicle accidents are an important source of injury as well.

Assisting Clients to Move

Some key informants interviewed for the assessment of the current state in Nova Scotia identified assisting clients to move as a main source of injury. This is also reflected in the WCBNS data. Of the total 1,618 time loss claims made for injuries in 2015 in home care, LTC, special care homes, ambulance services, and hospitals, almost 80% of these claims were related to a sprain or strain (n=1,277, 78.9%) and almost half of those sprain and strain injuries were related to assisting patients to move (n=612, 48%). As seen in Figure 7 below, sprains and strains due to assisting patients to move represented approximately a quarter of 2015 time loss claims in special care homes, a third of claims in home care, 40% of claims in LTC and hospitals, and almost half of time loss claims in ambulance services.



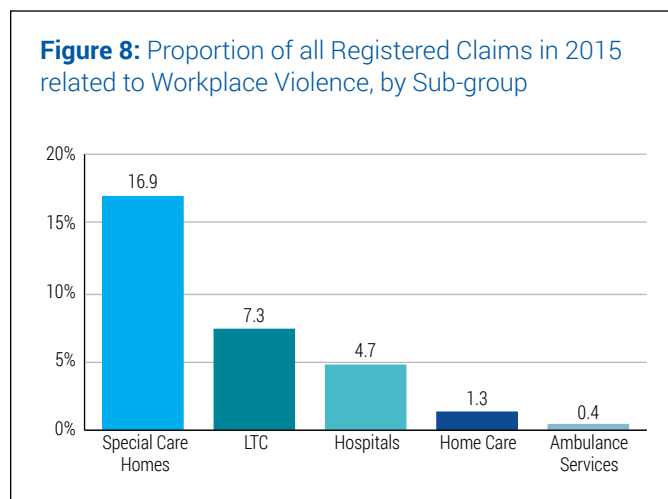
Source: Workers' Compensation Board of Nova Scotia, 2016



Source: Workers' Compensation Board of Nova Scotia, 2016

Workplace Violence

In 2015, there were 435 registered claims across all sectors that were related to aggressive acts (i.e., workplace violence). While this represented only 2% of total registered claims for all sectors, workplace violence claims represented 6% of all registered claims in the health and community services sectors (approximately 5% of all time loss claims for the sector) (Workers' Compensation Board of Nova Scotia, 2016). Also, of the total 435 claims made in 2015 for injuries related to workplace violence, the vast majority of these (290, or 67% of all registered claims) occurred in the health and community services sectors. Within health and community services, the greatest proportion of all registered claims in 2015 related to workplace violence was in special care homes (17%), followed by LTC facilities (7%), and hospitals (5%). See Figure 8 for more detail.



Source: Workers' Compensation Board of Nova Scotia, 2016

It is well documented in the literature that incidences of violence are under-reported (see for example Arnetz et al. (2015); Blando, Ridenour, Hartley, and Casteel (2015); Hanson, Perrin, Moss, Laharnar, and Glass (2015); Hesketh et al. (2003); Ontario Nurses' Association (2014)), so it is highly likely that the available data from WCBNS represents an under-estimate of the number of incidents/injuries associated with violence. For example, violent incidents that occur but do not result in an injury would not be reported to the WCBNS. Also, even incidents that do result in an injury reflected in the WCBNS data may not be reported as being related to a violent incident. For example, if a staff member has to move out of the way of a resident who is striking out at them and injures their back, the cause of this injury may be entered in the WCBNS database as "bodily reaction" rather than "assault". Some key informants interviewed for the assessment of the current state in Nova Scotia noted that while assisting clients to move may result in more injuries, concerns about violence in the workplace were seen as more pressing, or more of a "hot button" issue for employees.

A 2013 survey conducted by the Nova Scotia Nurses' Union (NSNU) of 185 nurses working in long-term care found that almost half of nurses reported experiencing bullying and aggression from residents frequently (twice a month or more) or often (a couple of times a year). Approximately a third of survey respondents (35%) felt that their workplace was less safe compared to three to five years ago (Curry, 2015). A second NSNU survey of 248 nurses in long-term care conducted in 2015 found that half of respondents had experienced an incident at work that negatively impacted their personal safety and security in the last 3-5 years, and 25% reported that they experienced physical violence from residents or families a couple of times a month or more (Curry, 2015). This data, and the input from key informants interviewed as part of the assessment of the current state in Nova Scotia suggests that workplace violence is an issue of growing concern for employers and staff in the health and community services sectors.

3. Current Initiatives and Supports for Workplace Health and Safety in Nova Scotia

This section of the report describes the key initiatives and supports for workplace health and safety that are currently available to employers and staff in the health and community services sectors in Nova Scotia. It also describes the types of initiatives that the Nova Scotia employers interviewed for the current state assessment indicated they have in place. As previously mentioned in the methodology section of this report, these findings are not intended to provide an exhaustive inventory of all workplace health and safety activities in the province; rather they give some insight into how health and safety are being addressed in LTC, home care and community services in Nova Scotia. This section of the report draws from information provided by Nova Scotia key informants and from Nova Scotia-specific literature (e.g., websites, reports, etc.).

Legislation, Regulation, and Enforcement

Legislation and Regulations

The Occupational Health and Safety Act is the main piece of legislation governing workplace health and safety in Nova Scotia. The foundation of Nova Scotia's health and safety legislation and regulations is the Internal Responsibility System (IRS), which is described in the Occupational Health and Safety Act. In the IRS, everyone at a workplace, including employers, supervisors/managers, and employees, has a shared responsibility for maintaining a safe and healthy workplace as part of their work. The level of responsibility is based on the level of authority and accountability that different people in a workplace may have.

In addition to the broad duties described in the Occupational Health and Safety Act, workplace health and safety requirements are further defined by regulations, codes of practice, and guidelines (Nova Scotia Department of Labour and Advanced Education, 2016b). For example, there are both regulations and codes of practice addressing workplace violence in Nova Scotia (Nova Scotia Department of Labour and Advanced Education, 2007, 2016c), though these are not specific to the health care or community services sectors. In addition to legislation and regulations specific to workplace safety, there are other pieces of legislation that address health care and community services that have relevance to workplace safety as well (e.g., Homes for Special Care Act, Fire Safety Act, etc.).

Licensing

As described above, all LTC facilities and DSP residential service providers receiving public funding must be licensed by DHW or DCS. An annual inspection is part of this licensing process. When licensing LTC and DSP facilities, the focus of the inspection is not looking in-depth at the health and safety of staff, but some general health and safety practices are assessed (e.g., does the organization have a JOSH committee, is the facility properly maintained to ensure safety, etc.) (Judy LaPierre, September 30, 2016; McMaster, August 16, 2016; Nova Scotia Department of Health and Wellness, 2016).

Enforcement

The Occupational Health and Safety (OHS) Division of Nova Scotia's Department of Labour and Advanced Education (DLAE) is responsible for promoting, administering, and enforcing legislation and standards that address and prevent workplace injury and illness. OHS Division staff include Inspectors and Investigators who focus on conducting inspections and investigations, Occupational Hygienists who address the environmental aspects of occupational health (e.g., radiation exposure, air quality), and an education and outreach group that focuses on increasing awareness and understanding of responsibilities for occupational health and safety.

Over the last five years (FY 2011/12 to FY 2015/16), the OHS Division conducted an average of 49 activities (inspections, investigations, and re-inspections) per year in LTC and community services facilities (ranging between 32 activities in 2013/14 and 67 activities in 2015/16) (Nova Scotia Department of Labour and Advanced Education, 2016a). Over these five years, 164 orders were issued. Table 1 below provides an overview of the Act/Regulation to which these orders were related.

Table 1: Orders Issued by DLAE to LTC and Community Services facilities in Nova Scotia, 2011/12-2015/16

Act/Regulation	Number of Orders
Occupational Health and Safety Act	82
Occupational Health and Safety First Aid Regulations	2
Occupational Health Regulations	1
Occupational Safety General Regulations	54
Smoke-free Places Regulations	1
Violence in the Workplace Regulations	15
Workplace Hazardous Materials Information System Regulation	8
Workplace Health and Safety Regulations	1
Total	164

Source: Nova Scotia Department of Labour and Advanced Education, 2016a

Long Term Care Inspection Blitz

In the fall of 2015/spring of 2016, the OHS Division undertook a proactive compliance initiative (blitz) to inspect LTC facilities. The blitz was mentioned by a few Nova Scotia key informants as an existing support that addresses health and safety in Nova Scotia. The blitz is also part of the work of the Inspection and Enforcement Working Group of the provincial Workplace Safety Strategy described below. In a blitz, the entire industry is made aware that compliance inspections will be taking place, but individual facilities do not receive notice that they will be inspected. The focus of the blitz was on musculoskeletal injury (MSI) hazards, specifically focusing on client lifts and transfers (Occupational Health and Safety Division, 2015). The blitz also addressed workplace violence (Carroll, August 17, 2016). While no detailed results of the blitz were available at the time of writing,⁴ key informant Harold Carroll, Executive Director, Occupational Health and Safety, Department of Labour and Advanced Education, did provide some initial findings from the blitz (Carroll, August 17, 2016):

- 36 of 160 potential sites were visited by inspection officers

⁴ Addendum (Jan. 5, 2017): As noted, at the time of writing, the detailed results of the blitz were not available. However, a summary of the findings and recommendations from the Long-Term Healthcare Blitz has since been released and can be found at: <http://novascotia.ca/lae/healthandsafety/docs/Healthcare-Blitz-Report.pdf>.

- Of the sites that were visited, all had the required equipment for client lifts and transfers. However, some sites could benefit from improved maintenance and inspection of equipment, as well as enhanced safety programs to support use of the lifts (e.g., training).
- In the area of workplace violence, inspectors identified a number of facilities that did not have violence assessment and mitigation plans in place, so further work is needed in this area.

Occupational Health and Safety Education Trust Fund

The Occupational Health and Safety (OHS) Education Trust Fund provides funding to Nova Scotia organizations with the goal of increasing awareness about occupational health and safety through education, training, promotion and related activities. The money in the Trust Fund comes from administrative penalties established by DLAE, as well as from court-ordered fines that offenders who have violated OHS legislation are directed to pay to the Minister for the purpose of occupational health and safety initiatives (Nova Scotia Department of Labour and Advanced Education, 2014).

AWARE-NS

AWARE-NS is Nova Scotia's health and community services safety association, and receives funding for their work from DHW. Most Nova Scotia key informants mentioned the critical role that AWARE-NS plays in providing resources and supports for organizations in the health and community services sectors. AWARE-NS develops and provides safety-related training to organizations in areas such as Joint Occupational Safety and Health (JOSH) Committees, workplace violence prevention (Steps for Safety, developed in partnership with WCBNS), safety management systems, and safety leadership (SAFER). Some of these initiatives are further discussed in the following sections. AWARE-NS also facilitates networking and communication among employers and staff in the health and community services sectors through support for communities of practice, training opportunities, and other networking events (AWARE-NS, n.d.-a).

Workers' Compensation Board

Many Nova Scotia key informants also identified the WCBNS as an important support to workplace health and safety. WCBNS provides consultants and relationship managers that can help to support organizations in improving their health and safety performance. WCBNS also provides training free of charge to organizations. They focus on supporting employers with implementing safety practices, and making implementation manageable. Some of the specific initiatives WCBNS has been involved in are further discussed in the following sections.

Provincial Workplace Safety Strategy

In 2013, the DLAE and WCBNS launched the Nova Scotia Workplace Safety Strategy covering the years 2013 to 2017. While the strategy is not specific to the health and community services sectors, the broader measures it includes are relevant. The strategy has six areas of focus, and each area of focus has established a Working Group to direct and report on activities related to the area. The six areas of focus are (Workers' Compensation Board of Nova Scotia & Nova Scotia Department of Labour and Advanced Education, 2013):

- Leadership: supporting and building leaders from all sectors and across levels of organizations to help advocate for safe workplaces
- Safety culture: changing workplace safety culture so that safe practices are second nature
- Small and medium-sized enterprises: providing small and medium businesses with appropriate tools and supports to enhance safety
- Education and training: education and training, both formal and informal, is important for changing safety culture
- Inspection and enforcement: inspection and enforcement of safety laws and regulations
- Performance management and measurement: determining, defining and implementing meaningful performance measures

Department of Health and Wellness

As mentioned in Section 1 of this report (Overview of the Sector in Nova Scotia), DHW sets out the requirements and standards for agencies/facilities providing publicly-funded home care and LTC. Program requirements and standards include elements that support workplace safety; some examples of these requirements/standards are:

- Ensure staff members are trained in the safe operation of equipment.
- Policies and procedures regarding the ongoing education of staff members, including mandatory education and training.
- Policies and procedures that minimize risk to residents, staff, volunteers, visitors and the home, including development of risk management plans/policies (e.g., identifying and reporting potential safety hazards, appropriate/safe use of equipment and supplies, etc.).
- A process for analyzing critical incidents and adverse events, a minimum of quarterly or more often as required, to identify trends and ensure appropriate action is taken to remedy the identified risks.
- Ensure staff have necessary competencies to perform procedures that may be authorized and that the procedures are within staff scope of practice.
- Ensure staff understand safety measures for clients and employees and procedures for dealing with emergencies.
- Procedure for removing care providers from a client's home in the case of abuse or suspected abuse of the care provider.

DHW provides a number of other supports and resources related to workplace health and safety in the home care and long term care sectors. These include initiatives such as:

- **Health Equipment Loan Program/Community Bed Loan Program:** Provides regular and bariatric hospital-type bed systems to Nova Scotians who are living in their own homes at no cost.
- **Specialized Equipment Program:** Loans LTC residents certain types of specialized health equipment, including specialized mattresses and accessories, power and manual wheelchairs, transfer aids, walkers, etc. Approved residents may be required to pay a monthly, income-based fee for the equipment being provided through the Program.
- **Community Occupational/Physiotherapy (OT/PT):** Maintains persons with physical disabilities in the home to promote, develop, restore, improve, or maintain optimum levels of functioning in the area of self-care, productivity, and leisure.
- **Home First:** Funding (\$1.5M) provided to NSHA to support care options for clients who require support and/or services, greater than or different from the regular home care services, to avoid admission to hospital or to be discharged from an acute care facility. NSHA determines funding use.
- **Instrumental Activities of Daily Living (IADL):** Funding (\$1M) provided to NSHA to provide services such as transportation, yard work, heavy house cleaning, equipment, and assistance with errands, to maintain individuals in their own home.
- **Caregivers Nova Scotia:** DHW provides funding to support Caregivers Nova Scotia in providing programs, services, and strong advocacy for caregivers.
- **Annual Business Plan Funding and Emergency Funding:** Can be used to purchase/replace lifts, slings, and other assistive devices.
- **Infection Prevention and Control:** LTC facilities have access to infection prevention and control expertise from a range of sectors including Infection Prevention and Control Nova Scotia (IPCNS) within the DHW, Infection Prevention and Control Nova Scotia (IPAC NS), and practitioners both in hospitals and LTC facilities.
- **Single Occupancy Rooms:** LTC residents expressing responsive behaviour may be placed in a single room, depending on their needs.
- **Continuing Care Assistant (CCA) Program Requirements:** DHW supports and provides oversight for the CCA Program which includes the educational component, certification process, and CCA Registry. CCA students must demonstrate program outcome competencies in areas concerning safety such as addressing challenging/responsive behaviours, safety guidelines when providing home care, safety during meal preparation, etc.

The provincial Nursing Strategy also helps to support workplace health and safety in various ways. The goal of the Nursing Strategy is to ensure that there is an adequate number, mix and distribution of nurses in the places they are needed in the province. The Nursing Strategy is a multi-pronged strategy that is grounded in evidence to recruit and retain new graduates and experienced nurses. Funding in the amount of \$4.7 million is provided annually to NSHA, IWK, and continuing care employers to support four main policies.

- **Employment Orientation and New Graduate Support:** In recognition of the large number of new graduates entering the provincial workforce at the same time as experienced nurses are retiring in higher than usual numbers, the two objectives of this policy are to offset employer costs to orient nurses to the workplace, and to fund targeted activities to support the transition of new graduates into the workplace.
- **Professional Development and Mentorship:** This policy supports nurses to develop professionally throughout their careers, a key factor in the retention of experienced nurses. It is targeted to four strategic, evidence-informed areas: injury prevention, quality workplaces, team development, and clinical leadership. This policy also funds time for experienced nurses to be relieved of their full patient care loads and enabled to mentor nurses who are new to the workforce. The purpose of this objective is to ease the burden that the large volume of new nurses entering the health care system places on experienced nurses.
- **Innovation Fund:** The Innovation Fund enables employers to do two things primarily: recruit to hard-to fill areas, and provide nurses with the opportunity to design and lead innovations in their workplaces that contribute to better work environments and productivity.
- **Co-operative Learning Experience Program:** The Co-operative Learning Experience Program encourages student nurses to start their careers in Nova Scotia and provides the employer with an opportunity to recruit future nursing staff, particularly in hard-to-recruit areas. Registered nursing students between their 3rd and 4th year of study are funded for 9-week work placements with health care employers, with priority given to clinical and geographical areas of highest need. The program has been highly successful with an increase in the number of placements from 60 in 2001 to 176 in 2016.

Initiatives Addressing Client Lift and Transfer

Soteria Strains is a provincial strategy for health care workplace musculoskeletal injury (MSI) prevention. Nova Scotia's District Health Authorities (prior to amalgamation into the NSHA) and the IWK, WCBNS, and AWARE-NS, partnered on this project. Extensive work went into development of this strategy in 2012/13, including a literature review and interviews with key informants to identify best practices in MSI tracking and prevention; a survey to assess perceptions of health care workers who assist clients to move; and development of a white paper, business case, and recommendations for evidence-based practices for safe client handling programs. A comprehensive set of program documents, as well as an implementation manual were then developed and were published on the Soteria website in 2015 (see <https://soteriahealth.ca/resources-2/program-guides/>).

The partners involved in this project are now working to implement the Soteria program in the health care sector. The NSHA has developed a Safe Patient Handling and Mobility Program (SPHMP) based on Soteria and focused on the acute care setting (i.e., hospitals). They are in the early stages of implementing this program at a demonstration site at St. Martha's Regional Hospital in Antigonish, and implementation there has been very successful with some positive outcomes related to safety as well as improving team functioning (Carter, August 24, 2016).

Many Nova Scotia key informants mentioned Soteria Strains as an important support for workplace health and safety in the province. Many Nova Scotia key informants also described programs they were implementing in their own organizations to support safe movement of clients. Examples of the types of activities underway in this area within organizations include:

- Development and implementation of comprehensive “no lift” and transfer programs (primarily modeled on best practices from Soteria Strains) that include staff training as well as the development of tools and resources (e.g., client risk assessment tool);
- Purchase and implementation of equipment to assist with lift and transfer;
- Developing champions to demonstrate/advocate for safe lift and transfer techniques among staff; and
- Training in ergonomics and lifting techniques.

While key informants felt the materials provided through Soteria Strains were an excellent resource, some also indicated that the program was not specific enough to the context of settings outside of hospital facilities. Organizations providing home care, LTC and community services operate in a very different environment, and may not have access to the same resources, supports and infrastructure that is available in the hospital setting. In addition, implementing the full program would have a significant cost associated with the training of all staff and integration of best practices.

WCBNS has been working with organizations in LTC and home care to adapt the Soteria program to their needs, context, and level of resource. Over the last two years, WCBNS has delivered workshops on safe patient handling and mobility to almost all LTC homes across Nova Scotia. These workshops focused on supporting LTC staff in using PACE as a quick screening tool to help verify a client’s status. PACE stands for:

- P is the Physical abilities of the Resident / Client / Patient
- A represents Agitation / Aggression of the Resident / Client / Patient
- C represents Communication
- E is about the Environmental hazards

The results of an assessment using the PACE tool will provide the necessary information to make the best decision possible about the care of a client at that specific time. While PACE was initially developed to focus specifically on client lift and transfer, it is also being used more broadly as a general assessment tool for clients that can help to identify other potential hazards prior to interacting with a client.

WCBNS has also begun working with one of the province’s largest home care providers (VON) to adapt the training and materials provided in the PACE workshops to the working conditions and context in home care.

Initiatives Addressing Workplace Violence/Challenging Behaviours

As mentioned in a previous section, AWARE-NS and WCBNS have a violence prevention training program that they have implemented in Nova Scotia, Steps for Safety. Stakeholders from the health and community services sectors participated in the development of this training. The program reflects best practice and is organized into six steps (AWARE-NS, n.d.-b):

- Step 1: Program Review and Perception Survey
- Step 2: Leadership and Risk Assessment
- Step 3: Policies and Procedures
- Step 4: Reporting, Investigating and Documenting
- Step 5: Education and Awareness
- Step 6: Best Practices, Workplace Bullying, Domestic Violence

Many Nova Scotia key informants also discussed the work they are doing in their own organizations around to workplace violence and challenging behaviours with clients. Most Nova Scotia key informants representing employers indicated that they conduct risk assessments for violence (at the site and/or individual client level), and that they have completed training for their staff in addressing/responding to violence and challenging behaviours. AWARE-NS has provided the Steps for Safety training to many employers and staff in the health and community services sectors. Other training programs mentioned by Nova Scotia key informants included U-First (see <http://u-first.ca/>) in LTC and home care, and the Mandt System (see <http://www.mandtsystem.com/>) and the Low Arousal Approach (see <http://www.studio3.org/training-systems-for-managing-difficult-behaviour/low-arousal-approach-for-autism/>) in community services.

DHW in coordination with the NSHA provides a Challenging Behaviours Program to “to enhance capacity in the provision of care to older adults experiencing cognitive impairment and associated responsive behaviours” (Nova Scotia Department of Health and Wellness, 2013, p. 2). DHW provides NSHA with funding for 11 Challenging Behaviour Resource Consultants located throughout Nova Scotia. This team provides support, care and services in all licensed and funded nursing homes, home support agencies, care coordination offices, and acute care alternate level of care units in the provision of care to older adults experiencing cognitive impairment and associated behavioural changes.

The CBR Consultants deliver education, mentoring, coaching and consultations. The P.I.E.C.E.S™ education program is provided to enhance capacity in the provision of care to older adults experiencing cognitive impairment and associated responsive behaviours.

Organizations providing home care also discussed some of the specific safety practices they have in place around violence prevention. In addition to staff training and conducting risk assessments as discussed above, procedures are in place for staff to check in and out of visits. Increasingly, organizations are also using GPS mobile technology as a safety feature so that they can track the location of their staff.

Initiatives Addressing Leadership and Safety Culture

A safety culture is “a common set of beliefs, assumptions and normative behaviors that actively influence how participants think and act with regard to safety issues” (Harris, 2013, p. 53). Some of the values and beliefs of an organization that has a strong safety culture include: all incidents are preventable; health and safety performance is a line responsibility (all staff held accountable for safety responsibilities); working safely is a condition of employment; employees are all fully engaged in safety; all incidents are investigated to root cause; all staff intervene when they see unsafe conditions/behaviours; all incidents are ultimately the failure of leadership (Worksafe Alberta & Government of Alberta, 2011).

In Nova Scotia, work is taking place to build a safety culture and support the development of leadership for safety. Both leadership and safety culture are identified as areas of focus in the provincial Workplace Safety Strategy (described previously). Thirty CEOs, including two large health care employers (Nova Scotia Health Authority and Shannex Inc.) signed the Health and Safety Leadership Charter in the fall of 2015 and are working to develop an action plan for health and safety in their organizations (Workers Compensation Board of Nova Scotia, 2015). AWARE-NS has also recently launched a course on safety for supervisors and managers that will continue to roll out over the next year.

Most of the Nova Scotia key informants from health and community services workplaces indicated that health and safety of staff is reflected in their organization's vision/mission/values and/or strategic plan. However, some of these key informants said that they would like to see staff health and safety more explicitly or prominently addressed. A few Nova Scotia key informants discussed their efforts to ensure that they have a workplace culture that values and promotes staff health and safety. Some of the activities related to workplace culture described by Nova Scotia key informants included:

- Regular staff meetings focused on safety to review safety data, identify and address hazards/safety issues, and keep safety top of mind;
- Communicating safety messages to staff via promotional/communication tools;
- Providing leadership safety training;
- Using a safety management system/safety program to integrate safety into daily activities; and
- Leadership participation in health and safety groups (e.g., JOSH committee).

In Nova Scotia, one key informant spoke about their organization's implementation of a Lean Six Sigma management system and the Daily Continuous Improvement Program (Daily CIP). This is a method of promoting safety and quality improvement in the organization. Each shift does a daily review of quality of care and safety information, discussing questions such as “what concerns you most about the safety of residents and staff today?” In addition, there is also a ticket system to identify potential problems/issues. Anyone can write a ticket and post it on the board. Then three days a week, there is a team huddle to review and address the tickets. The multidisciplinary huddle group is facilitated by one person (could be anyone with the training and skill, from frontline staff to managers) and they take 15 minutes to prioritize problems and brainstorm solutions (following a plan-do-study-act model). Using this management system has resulted in a shift in how staff think about and address safety; they have moved to thinking more broadly (e.g., mental/psychological safety as well as physical safety) and being more proactive (e.g., identifying something that may pose a risk in future rather than focusing just on immediate hazards). While the investment of time and resources (e.g., costs for staff training, bringing in consultants to support the process, etc.) to establish the program has been significant, the organization has been able to reduce costs and become more efficient in other areas, and anticipates that these gains will increase over time as staff become more proficient in using the system (Bonner, August 26, 2016).

The NSHA is also launching continuous quality improvement at the Zone level and establishing a provincial committee dedicated to this. There will be an opportunity for workplace health and safety to be addressed within this work. NSHA is also establishing a Client Council which will provide an opportunity for patients/clients to be engaged in workplace health and safety issues.

Initiatives Addressing Injury Management/Return to Work

Some Nova Scotia key informants discussed how their organization supports and manages employees who have been injured, but most did not provide extensive detail on this process. Key informants noted that it is important to ensure employees access appropriate treatment for their injury, and that the right supports are in place to facilitate the employee staying at work/returning to work. For example, one key informant described how their organization works with a specific physiotherapy clinic to support employees recovering from an injury. The clinic has copies of all staff job descriptions and the associated physical demands so they can accurately assess when an employee is ready to return to full duties, or whether any accommodations need to be made. Other key informants discussed how all employee leaves related to an injury or illness are managed by qualified staff (e.g., rehabilitation consultants, occupational health nurse). These staff may adjudicate the claims, help ill/injured staff navigate to appropriate resources, and/or implement early return to work initiatives to support effective and timely return to work.

WCBNS also has a number of initiatives and programs in place to support return-to-work, including providing workers with quick access to physiotherapy and chiropractic treatment and functional scans; supporting case management by working with employers and injured workers; educating health care providers about the benefits of return-to-work/stay-at-work programs; and supporting development of stay-at-work/return-to-work policies and procedures.

Other Initiatives

Other activities related to health and safety, each mentioned by a few Nova Scotia key informants, include:

- Addressing staff mental health (e.g., compassion fatigue program to raise awareness of the issue and provide support; training in trauma-informed care; other types of training that focus on employee wellness);
- Providing training opportunities in other areas (e.g., safety programs, fire safety, ergonomics, preventing abuse, etc.);
- Having an active and engaged JOSH committee that includes representation from a cross-section of staff;
- Conducting regular internal audits/safety inspections of their own facilities to proactively identify and address any hazards; and
- One organization indicated that they participate in an accreditation process and this ensures they regularly review their safety performance and procedures.

4.a Challenges to Improving Health and Safety and Contributing Factors to Workplace Injuries

This section of the report presents findings primarily from the assessment of the current state in Nova Scotia and identifies factors contributing to workplace injuries and challenges to improving health and safety in the health and community services sectors in Nova Scotia. There was significant overlap in the themes identified by key informants as challenges and contributing factors; therefore, we have grouped these two elements together. The findings are organized thematically, and the themes cut across specific topic areas (e.g., violence prevention, safe lift and transfer of clients). The themes are presented according to strength of response (i.e., the theme discussed most frequently by key informants is presented first) and include culture and leadership, resources, client complexity and acuity, the health and community services workforce, education and training, physical infrastructure and the working environment, and accountability. Findings from the literature (both Nova Scotia documents and other sources) that support these themes are also included in this section.

Culture and Leadership

Most Nova Scotia key informants said that the culture of a workplace was a significant factor that could either hinder or improve health and safety performance. The importance of workplace culture to safety performance is also reflected in the literature (Harris, 2013; Institute for Work and Health, 2007; Nielsen, 2014). Some of the aspects of workplace culture mentioned by key informants include:

- There are many competing priorities and staff do not have adequate time or energy to focus on safety and injury prevention.
- Health and safety is seen as a separate program or someone else's responsibility, rather than being integrated into all aspects of work for all employees.
- There is a culture of putting the needs/safety of clients first at all costs (e.g., stopping a client from falling may put staff at risk of injuring themselves).
- The workplace culture accepts taking shortcuts in order to meet the demands (e.g., not using equipment or having the client move themselves because it takes too long).
- Staff at all levels may be resistant to changes in practices that would improve health and safety.
- There is a focus on meeting the minimum levels required for compliance, rather than setting specific goals/targets related to health and safety.

The challenge of a workplace culture that is not sufficiently supportive of safety was also reflected in work completed as part of developing the Soteria Strains program in Nova Scotia. This work identified challenges such as a lack of safe client handling policies and consistent processes; the lack of a consistent policy across the province; and a culture in the workplace that leads staff to lift unsafely because they are pressed for time or they do not have appropriate equipment or support from other staff (Bluteau DeVenney, 2013). In addition, a survey conducted to better understand perspectives and opinions from front-line, support and supervisory staff that assist clients to move as part of their job, found that although workplace culture was supportive of moving clients safely, there was still room for improvement as 32-45% of respondents reported that they at some point have perceived violations of the occupational health and safety rules and/or safe work procedures (Soteria Strains Working Group, 2013b).

Another aspect of workplace culture that can be a challenge in preventing injuries is the normalization of certain behaviours or attitudes. For example, Curry (2015) notes that aggression and violent behaviour from clients is seen as part in the culture of facilities, just "how it is". When behaviour like this is normalized, workers may feel that there is little they can do to change or address the issue.

The safety culture of a workplace can also be influenced by its leadership (Wong, Kelloway, & Makhan, 2015). A few Nova Scotia key informants indicated that insufficient support/buy-in from leaders or managers in an organization is a challenge for improving workplace health and safety outcomes. A few key informants also noted that leaders/managers may not be fully aware of safety issues or practices affecting frontline staff, or that they may not have the skills or knowledge to properly address unsafe practices.

Resources

Many Nova Scotia key informants identified barriers to improving workplace health and safety related to resource limitations. For example, staffing levels that were described as insufficient to meet the needs of clients, a lack of funding for equipment or capital projects to address safety concerns, and limited funds to support training employees in health and safety-related areas were all discussed. A few Nova Scotia key informants noted that financial resources provided to organizations by government are not specifically earmarked for workplace health and safety, so when overall budgets are under pressure, health and safety initiatives (e.g., staff training, OHS staff person, etc.) may be cut. The impact of resource limitations on worker health and safety in the health care sector was also noted in the Soteria Strains project. The survey conducted for the project found that only 52.1% of respondents agreed that equipment for assisting clients to move is easily accessible and only 42.5% agreed that there is enough equipment to assist clients to move in their unit (Soteria Strains Working Group, 2013b).

A few Nova Scotia key informants emphasized the importance of providing direct, one-on-one support to organizations that want to improve health and safety, but noted that while there are various resources in Nova Scotia that provide this type of support (e.g., AWARE-NS, WCBNS, labour unions, DLAE, etc.), the support is limited by the resources available to these organizations.

Client Complexity/Acuity

Some Nova Scotia key informants noted that the complexity and acuity of clients is increasing. For example, there is an increasing prevalence of LTC residents and home care clients with dementia and/or challenging behaviours, clients may have significant mental health challenges, there are more bariatric clients, clients have more complex medical needs and require more medical care, etc. This affects the workload for staff, as well as the type of safety issues that may be present. This is supported by Nova Scotia research: nurses working in the long-term care sector report that the complexity and acuity of residents is increasing and that staffing plans and protocols have not changed to address this growing need (Curry, 2015); and the type of clients in care (e.g., obese clients, or those who are confused or resistive) was identified as a challenge in assisting clients to move as part of the work on Soteria Strains (Bluteau DeVenney, 2013). The increasing complexity/acuity of patients is an issue in other jurisdictions as well (Ontario Ministry of Labour, 2015a; Saskatchewan Association for Safe Workplaces in Health, 2016; Symon, September 19, 2016).

Workforce

Many Nova Scotia key informants identified challenges to health and safety related to the workforce in long term care, home care, and community services. These challenges included:

- Staffing levels are not sufficient. This leads to time pressure to complete tasks and limited time to address health and safety issues. A lack of sufficient staff and feeling time pressured to assist the client were identified as challenges in assisting clients to move as part of the work on Soteria Strains (Bluteau DeVenney, 2013).
- Staff shortages may also result in staff working excessive hours, leading to fatigue, burnout and stress, and increasing the risk of physical injuries.
- High rates of staff turnover means there is a constant need to offer training to and reinforce safety practices with new staff.
- The workforce in health care is aging, and that affects the physical abilities and resiliency of staff. Older workers may be at greater risk of injury, especially if they have chronic conditions such as arthritis or back problems (Smith et al., 2013). In the Soteria Strains survey, over half of respondents (55%) indicated that they were 45 years or older, and 60% of respondents reported that they were not fit enough to assist clients to move without the use of equipment (Soteria Strains Working Group, 2013b).
- Staff may be dealing with mental health issues that affect their ability to work safely (e.g., stress, depression, etc.). Factors in the workplace such as violence, harassment or intimidation from clients or other staff may exacerbate these mental health issues. It is difficult to accurately assess the extent of employee mental health issues due to data limitations (e.g., if an employee takes sick time, it is not known whether this is related to a mental or physical health issue).
- Staff may be working alone – this can include staff in home care or community services settings that are alone in a residence, as well as staff in larger facilities where there may be staff on another floor/unit, but no other staff immediately available to assist them if needed.

Education and Training

Organizations providing LTC, home care and community services in Nova Scotia regularly participate in training related to workplace health and safety. However, there are still challenges in this area that can result in staff and managers/leaders not having the right knowledge and skills to ensure a safe and healthy workplace. Access to education and training on health and safety topics can be challenging for organizations in the health and community services sectors. Even when free training programs are provided there is still a cost in terms of staff time to participate, and some Nova Scotia key informants indicated that the cost of training staff can be prohibitive. Small organizations may struggle with this more than larger organizations. A few Nova Scotia key informants noted that while online training opportunities can support access to education because the training is free and can be done at a time convenient to the employee, some employees may still experience barriers to participating in this training because they do not have access to the required technology (i.e., computer and internet connection). Even when organizations are able to access training, employees may have difficulty implementing what they learned in the training session (e.g., they may not have time to practice new skills during their regular work hours).

There is a lack of consistency between organizations and between individual employees/ managers in their level of skill/knowledge in relation to health and safety. A few Nova Scotia key informants discussed how there are a number of different training options to address each safety issue (e.g., workplace violence), and in most cases there is no standard training required to ensure all staff/organizations are using the same approach (the exception to this is the requirement to participate in the Mandt System training for violence prevention for community services providers). Different programs emphasize different skills/approaches, and can be of varying quality. In addition, a few Nova Scotia key informants said that the level of preparation of new staff coming into organizations can vary significantly depending on their training and experience, and new staff may not have adequate/appropriate skills or preparation for the work they will be doing.

Physical Infrastructure and Environment

Some Nova Scotia key informants noted that the physical infrastructure or working environment for staff can contribute to workplace injuries. For example:

- Buildings may be older and not have space for needed equipment/supports to enhance safety. Older buildings may also have issues such as air quality.
- Smaller facilities (e.g., group homes, small option homes, smaller nursing homes/residential care facilities, etc.) do not have the same capacity as larger facilities to incorporate safety equipment.
- The available equipment is not standardized across different facilities – each organization makes their own decisions about what equipment to purchase and how it is used in the facility. Organizations may not even be aware of all the different options available for health and safety equipment.
- Community services staff may be out in the community with clients and may have little control over the environment (e.g., using public transit, in public spaces, etc.).
- Home care staff are working in clients' homes and have little control over that environment. They may face issues such as pets, poor home maintenance, lack of equipment, travelling to unsafe neighbourhoods, etc.
- Staff that must travel to or with residents are impacted by weather and driving conditions.

A lack of appropriate equipment, inadequate maintenance and repair of equipment, and inefficient use of space and poor design in client rooms and bathrooms (i.e., not enough space to lift/move safely) were identified as challenges in assisting clients to move as part of the work on Soteria Strains (Bluteau DeVenney, 2013).

Accountability

Some Nova Scotia key informants said that there was a lack of accountability in relation to workplace health and safety. These comments addressed the following areas:

- Regulations do not always specify exactly how the regulation needs to be addressed. This may lead to confusion or uncertainty in how to best follow or meet the regulations. Also, health and safety regulations/legislation are intended to be broad enough to cover all workplaces; they therefore may not address issues that are more specific to health care and community services in depth (e.g., workplace violence regulations focus more on violence committed by someone outside the organization coming in, rather than violence committed by a client inside the organization).
- As discussed previously in this report, while licensing and funding requirements for publicly-funded organizations providing LTC, home care and community services include general health and safety requirements, a detailed review of workplace safety practices is not within the scope of the licensing process. For example, the licensing inspection may note whether or not a patient lift is available, but does not examine in detail whether and how that lift is used by staff. This results in limited accountability for worker health and safety performance through the existing licensing and funding mechanisms.
- There is a lack of accountability within some organizations (e.g., frontline staff to each other and to supervisors, supervisors to senior leaders, etc.) in relation to health and safety. Organizations may also struggle with enforcing accountability for employees that do not follow health and safety policies (i.e., taking disciplinary action).
- In both the continuing care (LTC and home care) and community services sectors, services are provided by a number of different organizations, each with their own governance structures. This can lead to inconsistency in the approach to, support of, and accountability for workplace health and safety across the sectors.

4.b Strategies, Supports and Best Practices for Improving Workplace Health and Safety

This section presents the strategies, supports and best practices for improving workplace health and safety identified both in the review of evidence and best practices (external key informants and academic and grey literature) and in the assessment of the current state in Nova Scotia (Nova Scotia key informants and Nova Scotia-specific documents). The findings are first presented according to the same thematic areas identified in the previous section on challenges and contributing factors. Following best practices in these cross-cutting thematic areas, best practices associated with specific types or causes of injuries (e.g., workplace violence; client handling; slips, trips and falls; infection control; etc.) are also discussed. Information about best practices in other jurisdictions is included under each theme/topic, and the jurisdiction names are highlighted in bold font.

Culture and Leadership

Many Nova Scotia key informants discussed the importance of building a workplace culture that supports the health and safety of staff. Developing this kind of culture cannot be mandated by leaders through a policy or program; it is a complex task that takes time and requires constant attention and maintenance (Harris, 2013). "A commitment to safety should not be a priority, but a value that shapes decision-making all the time, at every level" (International Association of Oil and Gas Producers, 2013, p. 2). Some of the values and beliefs of an organization that has a strong safety culture include: all incidents are preventable; health and safety performance is a line responsibility (all staff held accountable for safety responsibilities); working safely is a condition of employment; employees are all fully engaged in safety; all incidents are investigated to root cause; all staff intervene when they see unsafe conditions/behaviours; all incidents are ultimately the failure of leadership (Worksafe Alberta & Government of Alberta, 2011). Assessing and understanding perceptions of the current safety culture is an important first step in improving that culture (The Joint Commission, 2012; Worksafe Alberta & Government of Alberta, 2011). A detailed list of potential surveys that can be used to assess safety culture in an organization can be found in The Joint Commission's report on Improving Patient and Worker Safety (The Joint Commission, 2012, pp. 19-21).

If the workplace culture presents a challenge for improving workplace health and safety, there are a number of potential ways of addressing this, described in the following sections.

Connecting Worker Safety to Client Safety

In health care and community services, staff/provider safety is closely linked to the safety of clients and others (e.g., family members, caregivers, etc.) (Harrison et al., 2013; The Joint Commission, 2012). It is important to develop an organization-wide culture of safety that addresses both client and staff safety together, without prioritizing one above the other. This overall safety climate will help to improve health and safety for staff, and will also improve quality of care and safety for clients (Harris, 2013; The Joint Commission, 2012; Yassi & Hancock, 2005). The importance of connecting worker and client safety was also mentioned by a few Nova Scotia and a few external key informants. One external key informant noted that the connection between client and worker safety must also be made at the enforcement and licensing levels as these currently focus primarily on client safety.

Leadership

Safety leadership is one of the best predictors of safety outcomes (Mullen & Kelloway, 2011). Many Nova Scotia key informants indicated the importance of having the buy in of senior leaders and managers who need to “walk the talk” and prioritize safety, including setting and following up on expectations for behaviour/ actions of frontline staff (i.e., having a policy is not enough, the policy needs to be enforced/actively implemented). The importance of leadership buy-in and support of safety initiatives, as well as making them a priority in terms of both attention and resources was also discussed in the literature (Harris, 2013; Nova Scotia Health Research Foundation, 2013; Occupational Safety and Health Administration, 2015b; Workers’ Compensation Board of Nova Scotia & Nova Scotia Department of Labour and Advanced Education, 2013; Zhang et al., 2016) and described by some external key informants.

There are seven elements to leadership that promotes a safety culture: credibility, action (to address unsafe conditions), vision, accountability (for leaders and employees), communication/transparency, collaboration, and feedback and recognition (International Association of Oil and Gas Producers, 2013). As discussed in the previous section on challenges, not all leaders may have the skills/abilities needed to address all of these aspects of safety culture. A few Nova Scotia key informants noted that organizational leaders and managers could benefit from training on health and safety issues, and coaching on how to approach staff who are not behaving safely. The evidence in the literature suggests that safety leadership can indeed be taught (Institute for Work and Health, 2007; Mullen & Kelloway, 2009). A systematic review of the effectiveness of injury prevention and control programs found that interventions with supervisors (e.g., training, providing feedback) had a moderate positive effect, reducing workplace injuries (Brewer et al., 2007).

As previously mentioned, AWARE-NS has recently launched a course on safety for supervisors and managers that will continue to roll out over the next year to provide some additional training and support for health and community services leaders in Nova Scotia. In terms of leadership initiatives that have been implemented in other jurisdictions, **Saskatchewan** has implemented a number of initiatives to address safety leadership:

- The province developed a Saskatchewan Health and Safety Leadership Charter in 2010, which aims to build commitment among organizational leaders to eliminate preventable work and non-work injuries, and has over 300 signatories (Tucker & Diekrager, 2013). An evaluation of the impact of leadership on safety culture in Saskatchewan (including both charter signatories and non-charter signatories) found that leadership commitment to safety was associated with higher employee-reported safety compliance behaviours, higher employee-reported proactive safety behaviours, lower employee-reported lost-time injuries, a more engaged workforce, lower employee turnover intentions, and potentially higher organizational performance (Tucker, 2016).
- The Saskatchewan Association for Safe Workplaces in Health (SASWH)’s Healthcare Strategy also includes actions to support creating supportive, knowledgeable and engaged leaders and supervisors, such as the leadership charter and providing training, coaching and guidance for leaders and managers (Saskatchewan Association for Safe Workplaces in Health, 2016).
- Some Regional Health Authorities (RHAs) also tied safety outcomes to pay for performance to help integrate safety into the workplace culture (Cripps, August 24, 2016).

Employee Engagement and Communication

Employees also play an important role in establishing a strong safety culture. It is critical to ensure that workers are engaged and involved in this process, and to build buy-in and support among employees for changes to improve health and safety (Transport Canada, 2015). A few Nova Scotia key informants and many external key informants emphasized that employees at all levels need to be engaged and empowered to identify and resolve safety issues. Staff at all levels of the organization should have an opportunity to take on leadership roles related to health and safety, and appropriate committees and structures should exist to facilitate staff participation. For example, an effective JOSH Committee was noted as an important support to safety culture by a few Nova Scotia and external key informants.

In addition, building trust among employees and between workers and management is critical (Occupational Safety and Health Administration, n.d.). One external key informant noted that a critical part of building this trust and positive relationship with employees is to acknowledge and address staff perceptions and concerns about safety, rather than trying to convince staff that their concern is not an issue. Leaders also need to make it clear that staff should not fear reprisals for reporting safety hazards, incidents or near-misses (Harris, 2013).

Regular and open communication with staff about health and safety was also identified in the literature as an important part of safety culture (Nova Scotia Health Research Foundation, 2013; Worksafe Victoria, 2006; Zhang et al., 2016). Frequent communication on health and safety issues (e.g., through a daily safety huddle – a short (15 min) discussion of an incident or task that takes place immediately following to discuss what the team has learned and how things could be improved going forward) was described as helpful by a few key Nova Scotia informants. Some external key informants also identified communication tools that can be used to support safety practices and to keep safety top of mind, including videos, posters, and spotlight stories to share successes and promote and reward those using good practices. A few examples from other jurisdictions include:

- A LTC provider in **Australia** has developed a series of small posters that identify hazards and also reflect the organization's safety policies and risk management approach. This has been a helpful learning and engagement tool for their employees.
- The Public Services Health and Safety Association (PSHSA) in **Ontario** has developed a series of videos to highlight hazards in the workplace (e.g., MSIs, workplace violence, infection control, kitchen hazards, etc.).
- SASWH in **Saskatchewan** identifies and promotes positive safety stories with organizations/ employees.

Commitment to Performance Management and Continuous Improvement

A commitment to continuous improvement is a critical part of building a safety culture. Continuous improvement is supported by following a plan-do-study-act cycle where targets or goals are established, interventions are implemented, results of the interventions are observed, and any necessary changes made (Harris, 2013; International Association of Oil and Gas Producers, 2013; Occupational Safety and Health Administration, 2015b; The Joint Commission, 2012). A few key informants (external and from Nova Scotia) described how they have committed to management systems, such as Lean Six Sigma, that are focused on overall process improvement in the organization. These process improvements address staff and client safety as well as also improving efficiencies in other aspects of the organization's functioning. In **Saskatchewan** for example, they have implemented Lean management principles throughout the health system (Cripps, August 24, 2016).

Review and analysis of data related to health and safety performance is another important component of continuous improvement. Some Nova Scotia key informants highlighted the importance of access to and regular reporting of health and safety-related data to keeping safety top of mind (e.g., reviewing incidents and near misses, investigating and reporting on root causes, etc.). Many external key informants also emphasized the use of data to assess and manage safety performance, ideally captured and provided in real time (i.e., electronically). For example, in Saskatchewan, data was collected by the RHAs for both leading and lagging indicators that enabled them to roll up data to the provincial level or drill down to the facility level (LTC facilities are connected to the RHAs in the province, so they were part of this data collection and review process as well). This helped stakeholders such as SASWH and the RHAs to illustrate the scope of the problem and identify which facilities/organizations were the biggest contributors to injury rates and could therefore benefit from additional supports. The data was used to help target improvement efforts, and leadership regularly reviewed the data for key performance measures with staff to help keep safety top of mind (Cripps, August 24, 2016).

While most key informants (Nova Scotia and external) described the lagging indicators that they regularly track and review (e.g., injury rates), leading indicators (activities or inputs that help to predict an outcome) should also be measured and tracked so that potential risks and trends can be identified early (Harris, 2013; Worksafe Alberta & Government of Alberta, 2011). Leading and lagging indicators and examples of potential indicators are further discussed in Section 5: Evaluation and Performance Indicators.

Safety Management Systems

The importance of a safety management system (SMS) as a support to developing a culture of safety was emphasized by some external key informants and a few Nova Scotia key informants, and was also discussed in the literature (Occupational Safety and Health Administration, 2015b; The Joint Commission, 2012; Worksafe Alberta & Government of Alberta, 2011). A safety management system provides a comprehensive and systematic approach to workplace safety, bringing together all relevant structures, accountabilities, policies, tools, and procedures that are used to address safety and manage risk. The use of a SMS is also closely connected to continuous improvement practices, as the SMS should support data collection, reporting and analysis (Worksafe Alberta & Government of Alberta, 2011).

The Canadian Standards Association has developed a standard on workplace health and safety management: CSA Z1000-06 Occupational Health and Safety Management. This standard provides a model and extensive guidance for developing and implementing an OHS management system (see the CSA website for more information). This standard has been used in other jurisdictions to develop and implement an SMS.

Some examples of how a SMS has been used in other jurisdictions include:

- In **Saskatchewan**, the RHAs use a SMS that is aligned under six components: management commitment and leadership, hazard identification and control, training and communication, inspections, incident reporting and investigation, and emergency response, with 26 sub-elements across these six components (Cripps, August 24, 2016).
- In **Saskatchewan**, SASWH has made the adoption of an effective SMS in health care facilities one of their key outcome targets in their Healthcare Strategy. Related actions include assisting facilities with implementation of an SMS and providing training and support for improved hazard identification and control (Saskatchewan Association for Safe Workplaces in Health, 2016).
- The SMS in use in **Ontario** has been evaluated against the CSA standard to ensure it meets or exceeds the standard.

In **Alberta**, the Continuing Care Safety Association (CCSA) offers a fairly comprehensive injury reduction program to all LTC facilities that focuses on supporting the facility to implement a comprehensive safety management system. This program supports the organization to develop the skills, knowledge and required policies, procedures and systems to reduce workplace injuries. Potential participants are identified by reviewing injury rates and costs; organizations with high rates of injury are invited to participate. The program begins with an audit conducted by the CCSA that addresses key areas of injury prevention (e.g. MSIs, workplace violence, safety leadership, incident investigation, etc.). An action plan is then developed based on the findings, and the CCSA actively works with the organization to implement the action plan over the course of a year. Participating employers receive roughly one week per month of support from CCSA throughout the process. There is no cost to the employer to participate (because CCSA is funded through a levy on employers' WCB premiums), but employers do have to cover their own internal costs (e.g., additional training, staff time, etc.). They have seen a lot of success with this program in Alberta as participating organizations have maintained a 35% reduction in MSIs over five years (Kutschinski, September 21, 2016).

Resources

In Nova Scotia, as in most other jurisdictions in Canada and around the world, resources to fund health care and community services are not unlimited. While greater financial resources might help to address some of the challenges described earlier in this report, simply increasing funding levels will not resolve all of the existing barriers to improving workplace health and safety in the health and community services sectors, and may not be feasible given the current fiscal climate in Nova Scotia. It is therefore important to ensure existing financial resources are being used efficiently, and to explore a range of potential sources of funding for identified needs.

Working More Efficiently

Many Nova Scotia key informants highlighted the need for organizations in the health and community services sectors to work together more collaboratively in order to be more efficient with their time and resources. This could include sharing safety practices/resources/training (e.g., through the existing Communities of Safe Practice run by AWARE-NS) or developing/participating in working groups to address specific issues in the sector (e.g., client lift and transfer, workplace violence). A few Nova Scotia key informants noted that the creation of the NSHA will help to support collaboration and harmonization of standards/practices across the province. Some external key informants also spoke about the importance of collaboration to use resources efficiently, both within each province, and across jurisdictions (e.g., networking between all the provincial health and safety associations to share best practices). Better information sharing between government departments (i.e., DCS, DHW, DLAE) was also described as important by a few Nova Scotia key informants, so that the various individuals that interact with organizations are aware of any current health and safety issues, and can properly direct organizations they work with to existing resources and supports.

Equipment and Supplies

A few Nova Scotia key informants suggested that purchasing equipment or supplies could be done more efficiently. For example, one Nova Scotia key informant emphasized the importance of purchasing equipment/supplies that are multi-functional in order to use resources efficiently (e.g., purchasing needed bedsheets with a slider sheet built in instead of just regular bedsheets). Another key informant discussed how a shared procurement process for needed equipment that could be used by all health care and community services facilities in Nova Scotia would both help to reduce the resources put into procurement processes and reduce the price of equipment/supplies with a larger order across the province.

Additional Financial Resources

A few Nova Scotia key informants noted that funders (e.g., DHW, DCS) need to acknowledge/recognize the need for financial resources to address health and safety issues. This might take the form of dedicated funding to workplaces for a specific list of equipment and training for example. One Nova Scotia key informant suggested that other sources of funding should be identified/provided that could support organizations in making their own investments in health and safety. For example:

- The WCBNS has a rebate program that helps to reimburse organizations for making investments in health and safety by reducing their surcharges. In order to provide greater cash flow to organizations that want to invest in health and safety, this rebate program could be restructured to provide cash up front to allow organizations to invest, instead of providing the rebate after the investment is made.
- The DLAE OHS Trust Fund could be made available to organizations that want to improve their own health and safety performance (rather than focusing on initiatives that address the sector as a whole).

Paying for Investments with Savings

A few Nova Scotia and external key informants emphasized the importance of knowing the financial benefits, as well as the up front costs of improving safety. Organizations that implement changes to enhance safety could reduce their costs and make financial gains over the longer term (e.g., reduced WCBNS premiums, lower costs of employee replacement and turnover, reduced sick time/absenteeism, improved productivity, etc.). These financial gains could ultimately help to cover the costs of investments in safety.

Client Complexity/Acuity

As the complexity and/or acuity of clients using LTC, home care, and community services increases, the appropriate mix of staffing and support needs to be further explored and addressed. For example, the reimbursement rates per client may need to increase in association with factors such as complexity of care, violent behaviour, etc. (Robinson & Tappen, 2008). However, a detailed review of possible funding models and approaches for health care and community services is outside the scope of this report.

It could also be helpful to provide support to address specific issues related to client complexity/acuity. In **Ontario**, the Behavioural Supports Ontario (BSO) project is a province-wide, regionally implemented, evidence-informed change strategy to address the needs of people with responsive behaviours associated with cognitive impairment, and those caring for them (Nova Scotia also has a similar program). Early evidence following the implementation of this program in Ontario demonstrates effectiveness. For example, in one of the Local Health Integration Networks (LHINs) involved in the project, the number of responsive behaviours in long term care facilities was decreased by half (Gutmanis, Snyder, Harvey, Hillier, & LeClair, 2015).

Workforce

A number of strategies were identified to help better support the workforce in LTC, home care and community services.

Staffing Levels

A few Nova Scotia key informants suggested that greater levels of staffing are needed to make it easier for staff to work safely (e.g., easier to replace staff attending training, more time to lift clients safely, dedicated health and safety staff to ensure safe practices in the organization, better able to address the increasing needs of clients, etc.). This need for greater staffing is also reflected in some of the literature (Ontario Nurses' Association, 2014; Robinson & Tappen, 2008). A detailed review of staffing models and ratios is outside the scope of this report.

Staff Hours and Shift Structures

Interventions such as work-hour restrictions, evidence-based shift length, rotation, and rest periods can help to ensure that staff have the rest and energy they need to work safely. These types of regulations have been put in place in other industries (e.g., aviation, trucking) to help ensure safety (The Joint Commission, 2012). The European Union also has directives limiting maximum hours of work weekly (48), required rest period between shifts (11 hours), and the requirement that employees are provided with regularly scheduled breaks during their shifts (European Commission, 2010; European Parliament, 2003; The Joint Commission, 2012). Worksafe Victoria's Guide to Working Safely in Community Services recommends that early morning (before 6 am) starts and late finish times be eliminated; overtime to cover absences be limited to no more than three consecutive days; issues related to inadequate amount or quality of sleep (for example when 'on-call') be addressed; work times between 10 pm and 8 am be limited whenever possible; more notice of shift changes should be provided; and that shift schedules/rosters be organized to prevent build-up of sleep debt (Worksafe Victoria, 2006). In Nova Scotia, one key informant spoke about changes to shift scheduling (more transition time when switching between day and night shifts, ensuring all staff have two days off in a row, maximum of two 12 hour shifts in a row). They are hoping that these changes will help to improve injury rates and employee absence/sick time, and plan to assess this after six months of using the new schedules.

Employee Wellness and Mental Health

A few Nova Scotia key informants highlighted addressing mental health and wellness of staff as a key area where improvements could be made (e.g., focusing on providing more employee supports for mental health and wellbeing, developing an employee mental health strategy, etc.). Some external key informants also highlighted employee mental health as an important area of attention and priority in their workplace health and safety plans/strategies. For example, a large LTC facility in Australia implemented wellness weeks for staff that involves providing many services and supports for staff (e.g., massage therapists, blood glucose/cholesterol testing with counselling, financial advisors and advisors to address retirement, etc.), which has been very well received by staff (Leacock, August 16, 2016). There is some evidence that cognitive behavioural therapy (CBT) and physical relaxation (e.g., massage) can help to reduce stress symptoms in health care workers (Marine et al., 2015). A systematic review of interventions to reduce burnout for staff in LTC facilities found that while interventions that focus on changing staff behaviour (e.g., learning relaxation techniques) reduced burnout in the short-term (1 month or less), interventions that were work-directed (i.e., changes to the working environment or tasks such as decreasing workloads or increasing job control) or that combined behaviour and work-specific techniques were found to be more effective in reducing burnout in the long term (Westermann, Kozak, Harling, & Nienhaus, 2014).

In addition to specific employee wellness initiatives, organizations could also address staff mental health through implementation of the comprehensive standard on Psychological Health and Safety (PH&S) in the Workplace developed by the Mental Health Commission of Canada (MHCC), in partnership with the Canadian Standards Association (CSA) and the Bureau Normalization de Quebec (BNQ) (Mental Health Commission of Canada, 2014). The standard addresses areas such as leadership, planning, data collection, education and awareness, and preventive and protective measures (Canadian Standards Association, Bureau de normalisation de Quebec, & Mental Health Commission of Canada, 2013). An implementation guide is also available to help organizations interested in implementing the standard (Collins, Canadian Standards Association, & Mental Health Commission of Canada, 2013).

Working Alone

The UK's Health and Safety Executive (HSE) has developed guidelines for working alone. The guideline notes that "working in the health and social care sector dealing with unpredictable client behaviour and situations" is one situation where another worker may need to be involved, based on a risk assessment. The National Health Service (NHS) in the UK has also developed extensive guidelines for health care workers working alone (National Health Service, 2009).

Aging Workforce

There are a number of different ways to help address the aging workforce in health care and community services. It may be helpful to focus injury prevention efforts on those injuries typically experienced by older workers (Smith et al., 2013; Stichler, 2013). Specific aspects of physical design may also be addressed to better support older workers. For example workstations that are comfortable and ergonomically correct; appropriate lighting for each task; placing needed items (e.g., electrical outlets, medical cabinets, etc.) at an appropriate height; and locating frequently used supplies and systems near/at the point of service could all be helpful (Stichler, 2013). Providing job assignments for older staff where the pace of work is slower and allows for more rest breaks is also important (Stichler, 2013). For example, Ontario has implemented the Late Career Nursing Initiative, which helps create opportunities for nurses 55 years of age and older to spend 20 per cent of their work time in less physically demanding nursing roles (Ontario Ministry of Health and Long-Term Care, 2016).

Understanding the abilities and needs of an aging workforce before implementing solutions is also important. The Work Ability Index is a tool to record the work ability of employees developed in Finland. It is based on staff self-perception of their abilities. It may be helpful to workers on an individual basis, and it can also be used as an analysis tool to identify individuals, groups, or sections that have low work ability values and therefore would benefit from additional supports (Morschhäuser & Sochert, 2006).

Education and Training

As discussed earlier in this report, there is much work taking place to provide training and educational opportunities related to workplace health and safety. However, some Nova Scotia key informants indicated that more education and training in various areas would be beneficial for staff (e.g., general health and safety, staff rights and responsibilities in relation to health and safety, workplace violence/dementia/challenging behaviours, and safe lift and transfer of clients). A few Nova Scotia key informants said that more should be done to ensure new staff (e.g., CCAs) have the appropriate skills and knowledge coming in to the workplace, perhaps by working with the schools providing this training, or increasing standardization of training.

A few external key informants indicated that outside consultants can be a helpful support with education and training for organizations. Some external key informants also spoke about the important role of health and safety associations (like AWARE-NS) in providing safety education and training for health care and community services staff. Offering training in different formats (i.e., in person and online) was identified as important in supporting participation. In a review of their workplace safety prevention programs and services, the **Manitoba** Dept. of Labour noted that training should be flexible (e.g., delivered online or outside of normal business hours) and strategic (connected to types of injuries and high risk work places) (Manitoba Department of Labour, 2013).

Although there is support for providing education and training opportunities, the evidence suggests that training/education alone may not be sufficient to have an impact on injury rates (Robson et al., 2010). Organizations and individuals need support to help them implement what they have learned in training.

Accountability

Some Nova Scotia key informants discussed the importance of having stronger accountability mechanisms in place. Strategies to enhance accountability in Nova Scotia mentioned included the following.

- More proactive inspections and outreach to LTC and community services facilities from the DLAE.
- Incorporation of more accountability mechanisms for health and safety into the licensing process at DCS and DHW (e.g., establishing standards that organizations would need to meet in order to be licensed and funded).
- Within an organization, appropriate health and safety policies and structures must be in place, and staff at all levels must be held accountable for safety performance and behaviours. Line supervisors/managers must be accountable for the behaviour and safety of the staff that report to them (Worksafe Alberta & Government of Alberta, 2011)
- Participation by organizations in accreditation processes (although there is limited emphasis on staff health and safety in current accreditation requirements).
- Adoption of performance indicators and regular reporting of performance across the sector, and making this data available at the organizational level (this is discussed in greater detail in the Commitment to Performance Management and Continuous Improvement section above).
- Potentially making changes to legislation governing health and safety in these sectors.

One Nova Scotia key informant suggested developing a Code of Practice in Nova Scotia specifically around workplace violence prevention. This could be a collaborative effort led by the health and community services sector, and could be managed by AWARE-NS. In Nova Scotia, a code of practice provides practical advice on preventive strategies, for a specific hazard, in a specific workplace or a practical means of achieving compliance with occupational health and safety in legislation. A code of practice does not have the same legal weight as a regulation but can be made so, by order of the Director of Occupational Health and Safety, DLAE, under the provisions of the Occupational Health and Safety Act (Nova Scotia Department of Labour and Advanced Education, 2016b).

Examples of accountability/inspection/enforcement activities conducted in other jurisdictions include the following:

- In **Saskatchewan**, SASWH has implemented focused inspections in facilities where injury rates are high as part of their Healthcare Strategy (Saskatchewan Association for Safe Workplaces in Health, 2016).
- The **Ontario** Ministry of Labour has had a separate enforcement program focused on health care since 2008. Earlier enforcement activities in this sector focused on shorter-term “blitzes” (6 weeks), but by 2014, the Ministry felt a more sustained, long-term approach was needed (Genesove, September 16, 2016). Therefore, between 2014 and 2017, the Ministry plans to inspect all acute care facilities as well as some long-term care homes, retirement homes and community-based health care services. Inspections focus on the top workplace hazards as identified by the Workplace Safety and Insurance Board (WSIB) in Ontario. These include musculoskeletal disorders, slips, trips and falls, exposures to hazardous biological, chemical and physical agents, contact-with/struck-by-object injuries, and workplace violence (Ontario Ministry of Labour, 2015a). While the focus is on acute care facilities, LTC facilities will also be identified to participate where resources allow. LTC facilities will be identified based on the experience of enforcement staff, and by examining data such as injury and incident rates, complaints and investigations, and employment standards information (e.g., employers that have not paid their workers on time). Some facilities will also be randomly selected (Genesove, September 16, 2016).
- In previous years (2012-2013) **Ontario’s** Ministry of Labour conducted a similar inspection “blitz” with the developmental services sector, including group homes. The Public Services Health and Safety Association (PSHSA) in Ontario worked with the Ministry of Labour on this initiative, to help organizations prepare for and respond to inspections (van Hulle, August 24, 2016).
- In **British Columbia**, WorkSafeBC has a Health Care High Risk Strategy that focuses on reducing overall injuries and violence-related injuries for frontline health care staff. This strategy has been in place for about 10 years, but in recent years the focus has been more on serious injuries (e.g., injuries resulting in amputations, fractures, serious cuts, etc.) and workplace violence (Symon, September 19, 2016). Inspection protocols will be focused on violence prevention and internal responsibility systems, and will target high risk employers (minimum of two inspections per employer) (WorksafeBC, 2015).
- In **Alberta**, the Occupational Health and Safety (OHS) branch of the Ministry of Labour has implemented the OHS Index Healthcare Program. The province uses the OHS index to identify employers who would benefit from being engaged in a proactive strategic inspection program. The OHS index is calculated based on lost time claims, disabling injuries, days lost due to injury, and occurrence of fatalities. Points on the index are scored when the employer is 100% or more above the industry average on any of these metrics. Employers selected to be part of the program will meet with an OHS officer initially to review the program, and will continue in the program for at least 18-24 months. The officer will conduct inspections and follow-up meetings (at least 5 visits a year) with the employer in an effort to reduce injuries and improve health and safety practices. Any lack of compliance with OHS legislation will be addressed through the use of orders and other established compliance tools (Alberta Department of Jobs, 2014).
- **Alberta’s** Ministry of Labour also has a Certificate of Recognition (COR) program (see <https://work.alberta.ca/occupational-health-safety/cor-how-it-works.html> for more information). This certificate is awarded to employers who develop health and safety programs that meet established standards. It requires the organization’s health and safety management system to have been evaluated by a certified external auditor. Alberta’s CCSA is responsible for supporting the COR process for all LTC facilities in the province. The CCSA provides training to organizations interested in achieving the COR and also conducts required audits. It is voluntary for LTC facilities to participate, so not all facilities have completed the process. LTC facilities that receive a COR benefit from a 5% rebate on their workers’ compensation premiums (Kutschinski, September 21, 2016).

Best Practices Addressing Specific Topics

In addition to the broader supports and best practices that can help to prevent workplace injuries identified for each thematic area in the previous section, this section describes other best practices that address a specific topic (e.g., type of injury, cause of injury, etc.). The broader supports and strategies discussed in the previous section (e.g., creating a culture of safety, improving staff mental health, improving accountability mechanisms, etc.) will of course have a positive impact on these specific topic areas as well. The resources available for this work did not allow for a comprehensive review of programs and best practices associated with all types of injuries. Instead, high level findings are presented here for the following topics:

- **Workplace Violence:** Detailed information on workplace violence programs is included here because this is an area of growing concern in Nova Scotia (and in other jurisdictions).
- **Safely Moving Clients:** A summary of the findings on the best practices for safely moving clients from the Soteria Strains work is also presented below, as many injuries are a result of assisting clients to move.
- **Working in a Client's Home:** The special context of working in a client's home is discussed, although there was limited information in the literature on best practices for interventions in this area.
- **Stay at Work/Return to Work:** Best practices on programs to effectively support employees staying at work and/or returning to work after an injury

Workplace Violence

Workplace violence can include physical assault, verbal abuse, bullying, threatening behaviour, and harassment (Canadian Centre for Occupational Health and Safety, 2016a). There are four types of workplace violence:

"(1) violent acts by criminals who have no other connection with the workplace; (2) violence directed at employees by customers, clients, patients, students, or any others for whom an organization provides services; (3) violence against coworkers, supervisors, or managers by a present or former employee; (4) violence committed in the workplace by someone who does not work there but has a personal relationship with an employee" (Lanctôt & Guay, 2014, p. 493).

Workplace violence is a key issue of concern for workers in the health and community services sector in Nova Scotia, and in many other jurisdictions, and numerous guides, programs and strategies to address workplace violence have been developed and implemented. It is also an issue that has been addressed extensively in the literature and McPhaul, London, and Lipscomb (2013) note that "the strength of the scientific evidence for workplace violence prevention strategies is well past the "emerging" evidence stage but has not achieved the "unequivocal" stage" (p. 1). However, it is important to note that while there is a strong body of literature on some types of violence (the focus primarily has been on type 2 incidents, i.e., those perpetrated by a client), there is a lack of research on tested and evaluated interventions that address other types of violence (e.g., bullying/harassment behaviour between co-workers (Quinlan, Robertson, Miller, & Robertson-Boersma, 2014)).

The best practices on workplace violence identified in the literature include:

- Develop a comprehensive violence prevention program that is backed by leadership and a system/organizational commitment (Curry, 2015; McPhaul et al., 2013; Occupational Safety and Health Administration, 2015a; Ontario Nurses' Association, 2014; The Joint Commission, 2012; Worksafe Victoria, 2006). Management commitment and buy-in is particularly important, as studies have shown that employees' perception of management commitment to violence prevention was associated with less workplace violence (McPhaul et al., 2013). Ensure the policy/program developed is in compliance with all relevant legislation and regulations (Ontario Nurses' Association, 2014).

- Engage employees and leadership at all levels in addressing the issue (Curry, 2015; McPhaul et al., 2013; Occupational Safety and Health Administration, 2015a; Ontario Nurses' Association, 2014; Quinlan et al., 2014; The Joint Commission, 2012). A committee should be established to develop and lead the program that includes management, employees from the various roles (e.g., RN, CCA, dietary staff, etc.), and union representation.
- Perform a comprehensive risk assessment of the work setting, physical environment, and violence issues. This should include assessment of staff perceptions of violence (e.g., through a survey or focus groups), as well as a walk-through of the facility to assess hazards (e.g., access control, physical layout, furniture placement, etc.), and a review of relevant data (e.g., incident reports, data on client characteristics such as mental health issues or past violent behaviour, etc.) (Curry, 2015; European Commission, 2010; McPhaul et al., 2013; Occupational Safety and Health Administration, 2015a; Ontario Nurses' Association, 2014; The Joint Commission, 2012; Worksafe Victoria, 2006).
- Implement appropriate hazard control mechanisms and policies. These may include, for example, use of GPS tracking for home care workers, systems to summon immediate assistance (e.g., panic buttons), establishing areas for clients to de-escalate, securing furniture/items that could be used as a weapon, establishing procedures to deal with domestic violence, implementing a system to track client-specific information and risk assessments (e.g., flagging procedures for a client's chart, visual identification of violent clients through signage or bracelets), changing the way clients access services (e.g., only providing services over the phone or at a public location), etc. (Occupational Safety and Health Administration, 2015a; Ontario Nurses' Association, 2014; The Joint Commission, 2012). Hazard control/violence prevention may also address processes for and approaches to care. For example, a systematic review of management of person with dementia with aggressive and violent behaviour found that using a person-centred approach to care can help reduce residents' aggression (Enmarker, Olsen, & Hellzen, 2011).
- Develop and implement effective reporting and tracking mechanisms for violent incidents, and review this data regularly to inform control and prevention activities (Curry, 2015; McPhaul et al., 2013; Occupational Safety and Health Administration, 2015a). This is a critical component, as without effective data systems that provide information about the client population and specific risks relevant to that organization/facility, the violence prevention program cannot be customized and targeted to high risk areas (McPhaul et al., 2013).
- Develop and implement appropriate response procedures for emergency situations (Curry, 2015; Occupational Safety and Health Administration, 2015a; Ontario Nurses' Association, 2014). These may include using established emergency codes (e.g., "code white"), providing immediate first aid/emergency care, ensuring no one else will be injured, providing prompt treatment and psychological support for victims, incident reporting and investigation, etc. (Occupational Safety and Health Administration, 2015a).
- Provide supports for staff dealing with the aftermath of violent incidents, such as formal crisis interventions (victim debriefing, counselling, etc.) and informal peer supports (Lim, 2011).
- Promptly investigate all violent incidents and near-misses, including identification of root causes of the incident/near-miss, and involve employees in this investigation (Curry, 2015; Occupational Safety and Health Administration, 2015a).
- Provide appropriate education and outreach for staff, clients, and families (Curry, 2015; McPhaul et al., 2013; The Joint Commission, 2012). Staff education should include experiential learning (e.g., role plays) (Robinson & Tappen, 2008) as well as therapeutic approaches to violence prevention/mitigation (e.g., de-escalation, non-violent crisis intervention, trauma-informed care) (Occupational Safety and Health Administration, 2015a; Ontario Nurses' Association, 2014). Staff training will not only assist with violence prevention efforts, there is also some evidence that if staff feel better equipped to address and respond to violent incidents, it can mitigate the effects of violence when it does occur (Lim, 2011).

- Regularly evaluate violence prevention programs, including regular review of data for trends, gathering feedback from employees and clients, and tracking prevention/mitigation actions through to completion (McPhaul et al., 2013; Occupational Safety and Health Administration, 2015a; Ontario Nurses' Association, 2014).

Some examples of workplace violence programs implemented in other jurisdictions are described below:

US Department of Veterans Affairs

In the US, the Veterans Health Administration, which provides health services to all veterans across the country, including acute care, long term care and home care, has implemented a comprehensive violence prevention program. The VHA benefits from having an electronic medical record that can track clients and information as they move through the system or to different locations across the country. This system is used to flag clients who display violent behaviour. There are then facility-level committees (Disruptive Behavior Committees) that review these records and determine the approach and plan for dealing with individual clients. The information system is also used to track and report on unsafe situations and violent incidents. There is a national training curriculum on violence prevention for VHA staff (Prevention and Management of Disruptive Behaviour – see the training manual for more information), which addresses interpersonal communication, assessing verbal/non-verbal cues, verbal de-escalation techniques, physical release techniques, and therapeutic containment. VHA facilities that have fully implemented this program were found to have a modest decline in assault rates (McPhaul, August 17, 2016; McPhaul et al., 2013).

Ontario

Ontario has developed a Leadership Table to address violence prevention in health care, focusing first on hospitals and then expanding to the rest of the health care sector. The group includes representation from the Ministries of Labour and Health and Long-Term Care, staff associations (e.g., Ontario Nurses' Association), labour unions, hospitals, Local Health Integration Networks (LHINs), the Public Services Health and Safety Association, client advocates, and researchers (Ontario Ministry of Labour, 2015b). The Public Services Health and Safety Association (PSHSA) is in the process of developing a model and toolkit on managing aggressive and responsive behaviours in health care. The model and toolkit will address five key areas: 1. Organizational Risk Assessment; 2. Individual Client Risk Assessment; 3. Flagging; 4. Security; and 5. Personal Safety Response System (PSRS) (Public Services Health and Safety Association, 2015). PSHSA is also working on a number of tools and resources related to workplace violence (van Hulle, August 24, 2016), and some of these are already available on the organization's website (see <http://www.pshsa.ca/workplace-violence-risk-assessment-tool-anysector/> for examples).

At a broader level, Ontario has also recently developed a *Code of Practice to address Workplace Harassment*. This code is not specific to the health or community services sectors but is certainly relevant to these sectors. It is intended to help organizations comply with the requirements with respect to the workplace harassment provisions under Ontario's Occupation Health and Safety Act. The code sets out guidelines for programs, policies and practices related to workplace harassment. Topics addressed include investigation and handling of complaints and reporting and record-keeping (Ontario Ministry of Labour, 2016).

British Columbia

WorkSafeBC has developed a three-pronged approach to addressing workplace violence in health care. The three components are: compliance through enforcement, compliance through awareness/information/education, and funding for the sector (Symon, September 19, 2016).

- *Compliance through enforcement:* This component includes targeted inspections by officers in health care facilities that have history of workplace violence. The officers enforce legislation, but also provide consultation and education as required.
- *Compliance through awareness/information/education:* WorkSafeBC provides resources and information (bulletins, awareness campaigns, videos, etc.) – to encourage change in behaviour related to managing and addressing workplace violence.
- *Funding:* WorkSafeBC provides funding to community groups that conduct prevention activities aligned with WorkSafeBC's core mandate. They also fund the province's health authorities for delivery of education and training modules on violence prevention (\$2.5 million in 2016/2017).

Legislation and Regulation related to Workplace Violence

In their report on LTC facilities, the Nova Scotia Nurses' Union recommends that the DHW include reporting on aggression, bullying and violence and a review of a facility's violence prevention program as part of their licensing reporting requirements (Curry, 2015). In Canada, violence in the workplace would be addressed through the "general duty provision" in Occupational Health & Safety legislation which requires employers to take all reasonable precautions to protect the health and safety of employees. However, most provinces (AB, BC, MB, NL, NS, ON, PE, QC, SK) also have specific legislation related to workplace violence. The legislation in Manitoba appears to be the most comprehensive, explicitly addressing harassment as well as violence (Canadian Centre for Occupational Health and Safety, 2016b). Some US states also have laws that require comprehensive workplace violence prevention programs (see American Nurses Association (2016) for a list) in health care, and there is evidence that these laws have contributed to stronger workplace violence prevention programs (McPhaul et al., 2013).

Safely Moving Clients

As discussed earlier in this report, Soteria Strains is a recently developed provincial strategy for MSI prevention in health care. Because such significant work went into developing this strategy and the accompanying resources (i.e., program documents and implementation manual), additional review of the literature specific to safely moving clients was not conducted as part of this work. Instead, a brief summary of the key findings from Soteria Strains is included here. The full set of associated research and resources can be found online at <https://soteriahealth.ca/>.

The Soteria Strains Working Group identified the elements that should be included as part of any program to support safely moving clients. These findings are drawn from both the research literature and input from over 700 frontline staff in Nova Scotia. The elements are (Soteria Strains Working Group, 2013a):

- Ensure senior leadership commitment to the program that is reinforced at all levels of the organization;
- Implement no lift (or variant) policy and procedures with defined roles and responsibilities;
- Establish unit-based peer safety leaders who actively promote safe client handling practices;
- Conduct Safety Huddles (After-Action Reviews), i.e., a short (15 mins) discussion of an incident or task that takes place immediately following to discuss what the team has learned and how things could be improved going forward;
- Identify workplace hazards and risk factors (e.g., high risk tasks, ergonomic risk factors), evaluating and analyzing risk, and redesigning difficult and demanding jobs;

- Assess client mobility/risk using an assessment tool to understand needs for lifting/transferring the client;
- Provide client handling aids and equipment that are appropriate to the needs of the facility, unit and clients;
- Conduct awareness, education and training for health care workers, including “hands-on” training with client handling equipment;
- Monitor and evaluate health care worker competencies, training and performance with respect to safe client handling;
- Regularly evaluate and report on program outcomes; and
- Establish channels for stakeholders such as staff, clients and families to provide feedback on the program.

Working in a Client's Home

Staff who work in a client's home must function in a very different context than those working in hospitals, LTC facilities, or even smaller group homes/residences. They are working in uncontrolled environments, often with minimal access to health and safety supports (e.g., equipment, policies, OHS staff with expertise, etc.) and limited supervision and support. They typically work alone, without colleagues or supervisors/managers immediately available to help address challenges or offer support. Safety issues include the uncertainty of the environment in a client's home (e.g., unsanitary conditions, pests, environmental hazards such as temperature and air quality), pets, falls, overexertion, and violence/aggression from clients, family members, or neighbours (Gershon et al., n.d.; McCaughey et al., 2012). Home care staff may experience violent incidents at a much higher rate than those working in more institutional settings (Campbell, McCoy, Burg, & Hoffman, 2014). Also, because staff must travel from location to location, they are more at risk of injuries related to motor vehicle accidents.

Traditional approaches to training, supervision and supporting staff in other settings (e.g., hospitals, LTC facilities, Adult Residential Care facilities, etc.) may not be practical or effective in a home care setting where staff are not contained in one location (Macdonald, Lang, & MacDonald, 2011). Unfortunately, there is a lack of research on staff safety in non-institutional care settings, and additional research is required to identify the most effective evidence-based practices for improving safety and ensuring quality care for clients (Campbell et al., 2014; Macdonald et al., 2011).

Techniques to enhance safety for home care/lone worker staff identified by external key informants and in the literature include:

- Accountability systems so that employees have a known and updated itinerary, and they check in with other staff at the beginning and end of each visit. Technology can facilitate this process, through the use of apps or other online tools that staff can access using internet-enabled phones, as well as through the use of GPS tracking technology. In the UK, the Birmingham and Solihull Mental Health NHS Trust has implemented a pilot project using special phones with satellite positioning that can locate the exact position of staff when an emergency alarm is triggered (Health and Safety Executive, n.d.).
- The Birmingham and Solihull Mental Health NHS Trust also uses photo books that include photos of staff, details of vehicle information, staff home contact information and next of kin. This information can be used if staff do not return as expected (Health and Safety Executive, n.d.).
- Remote employees need to have a reliable way of contacting their supervisor (SafeWork SA, 2014; Worksafe Victoria, 2006).

- Depending on the client needs and the level of risk, two workers may need to visit some clients together (SafeWork SA, 2014).
- Ensuring workers have reliable vehicles may also be an important safety practice (SafeWork SA, 2014).

Stay at Work/Return to Work

Supporting injured employees to stay at work and/or return to work in a timely manner is an important part of supporting workplace health and safety. An earlier return to work can help to speed up recovery (particularly for musculoskeletal injuries) and address mental health issues (e.g., depression) resulting from job loss (Alavi & Oxley, 2013; American College of Occupational and Environmental Medicine, 2006; Rueda et al., 2012). Even returning to work with modified duties before the employee is fully recovered may be beneficial for some workers. Workers who performed modified work duties (even if full recovery from a musculoskeletal injury had not been established) had a lower risk of recurrence of musculoskeletal sick leave than those who had returned directly to full duties (van Duijn & Burdorf, 2008).

Timely, appropriate, and adequate Return to Work (RTW) programs help to support workers in returning to their normal work duties. The evidence suggests that RTW programs can result in a quicker return to work. One study found a reduction of approximately 3-4 weeks in duration of time off work in association with RTW programs (McLaren, Reville, & Seabury, 2010). Another study found a significant reduction in lost workdays (55%) and an increase in workdays on modified duties (Bernacki, Guidera, Schaefer, & Tsai, 2000). Evidence suggests that RTW programs are cost effective, particularly for large employers (McLaren et al., 2010).

Key factors/elements in successful RTW programs include the following:

- A demonstrated strong commitment to health and safety in the workplace (Institute for Work and Health, 2014) and appropriate organizational support for return to work (Amick et al., 2016; Williams-Whitt et al., 2016).
- Employees are offered modified work activities that are appropriate to the abilities of the employee to support an early and safe return to the workplace (Institute for Work and Health, 2014; Williams-Whitt et al., 2016).
- Someone has the responsibility to coordinate RTW (Institute for Work and Health, 2014; Williams-Whitt et al., 2016).
- RTW planners ensure that the return-to-work plan supports the returning worker without disadvantaging co-workers and supervisors (Institute for Work and Health, 2014).
- The beliefs, values, and role of senior managers/leaders/supervisors are critical factors in supporting RTW (Williams-Whitt et al., 2016). In particular, frontline supervisors should be trained in work disability prevention, and should take an active role in the RTW process and planning (Institute for Work and Health, 2014; Shaw, Robertson, Pransky, & McLellan, 2003; Tjulin, MacEachen, Stiwnne, & Ekberg, 2011).
- Co-workers should also be informed and engaged in the RTW process so that they understand work modifications made in order to allow the worker to return to a clearly defined work role (Tjulin et al., 2011).
- The employer/supervisor makes early and considerate contact with injured/ill workers (Institute for Work and Health, 2014; Shaw et al., 2003).
- Employers and health-care providers communicate with each other about the workplace demands as needed, and with the worker's consent (Institute for Work and Health, 2014).

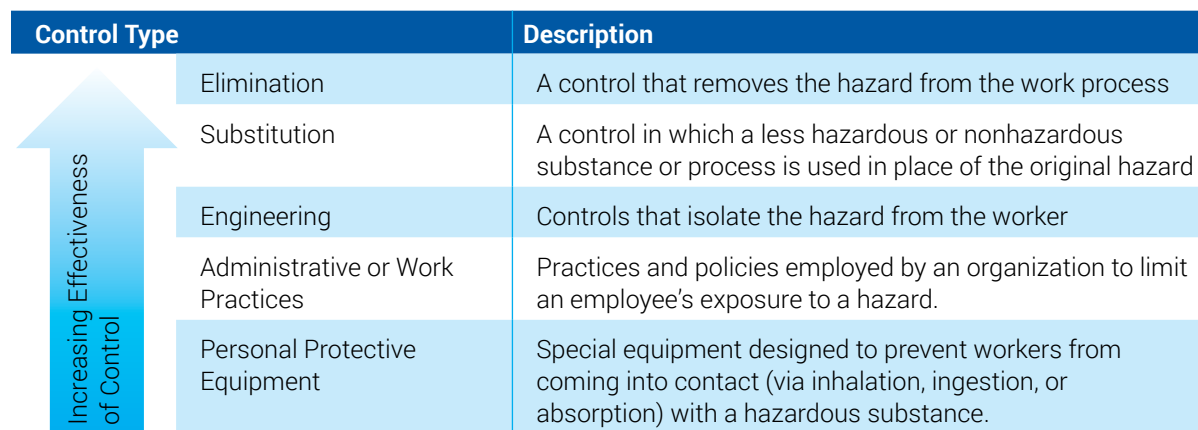
- Strong disability management policies and practices, ergonomic policies and practices and safety practices should be in place in the organization (Amick et al., 2016).
- The psychosocial elements of RTW should be addressed, including providing basic coping strategies and addressing perceptions about the employee’s role at work following an injury (Eggert, 2010).

There is also strong evidence for the effectiveness of RTW interventions that include multiple components: service coordination (communication, RTW planning, case management, education and training); health care (health care assessment & services, treatment, therapy, exercise, graded activity); and work modifications (modified duties, modified working hours, ergonomic adjustments, worksite adjustments) (Collie, 2014).

Choice of Intervention to Reduce/Eliminate Hazards

Whatever the specific area where safety risks are identified and interventions needed, it is important to select effective strategies to reduce hazards. There is a hierarchy of controls for injury prevention (as seen in Figure 9), where the ideal is to completely eliminate the hazard. If that is not feasible, other types of interventions, such as substitution of a less hazardous process, or use of personal protective equipment, can help to reduce the risk.

Figure 9: Hierarchy of Controls for Injury Prevention



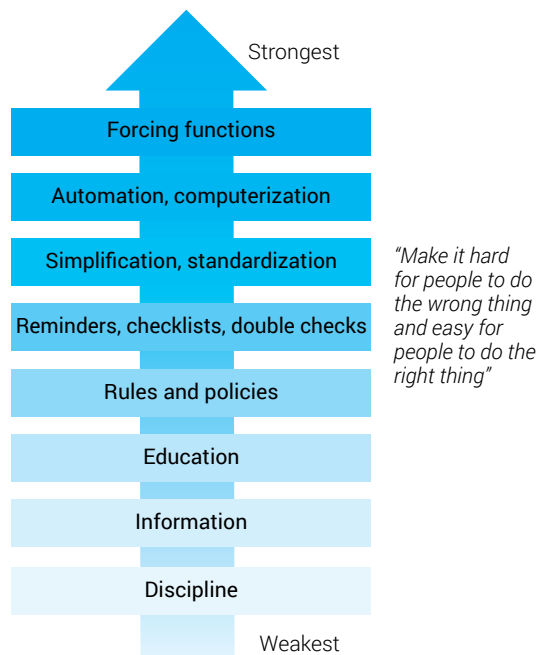
Control Type	Description
Elimination	A control that removes the hazard from the work process
Substitution	A control in which a less hazardous or nonhazardous substance or process is used in place of the original hazard
Engineering	Controls that isolate the hazard from the worker
Administrative or Work Practices	Practices and policies employed by an organization to limit an employee’s exposure to a hazard.
Personal Protective Equipment	Special equipment designed to prevent workers from coming into contact (via inhalation, ingestion, or absorption) with a hazardous substance.

Adapted from source: Milz SA. Principles of evaluating worker exposure. In: The Occupational Environment: Its Evaluation, Control and Management. Falls Church (VA): American Industrial Hygiene Association, 2011.

Source: The Joint Commission, 2012, p. 34

In addition to selecting appropriate interventions, effective change management strategies must also be implemented to support change in practices. While a detailed exploration of change management best practices is outside the scope of this work, the type of intervention selected can also affect the ease of change. For example, as illustrated in Figure 10 below, forcing functions, automation and computerization, and simplification and standardization are the more effective change strategies, while education, information, and discipline (i.e., disciplinary actions for those who do not follow the rules) are less effective.

Figure 10: Effectiveness of Change Strategies



Source: Bonner, August 26, 2016

5. Evaluation and Performance Indicators

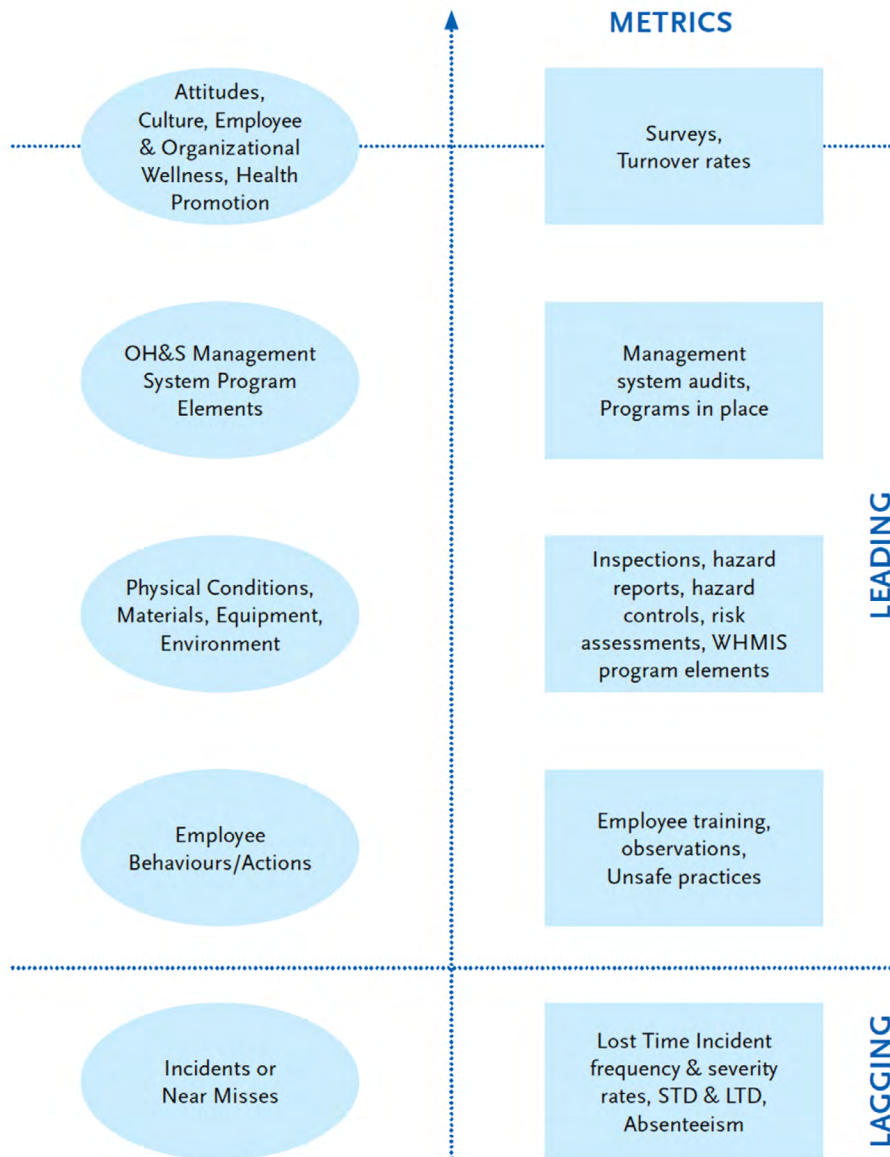
Evaluation and performance measurement are critical elements of improving occupational health and safety in the health and community services sectors. Data for performance indicators should be available to organizations and staff, and those using the data should understand how to access it, how to interpret it, and how to share/communicate it effectively. In addition, organizations should have the capacity to benchmark their performance against other similar organizations and against the sector as a whole (Worksafe Alberta & Government of Alberta, 2011).

The selection of performance indicators that are understandable and meaningful for an organization is critical. There may be large volumes of data/information available, so the focus should be on providing data that will assist in decision-making (Worksafe Alberta & Government of Alberta, 2011). It is important to look at a combination of both leading and lagging indicators:

- **Lagging indicators** are those that measure losses as a result of poor health and safety performance – i.e., they are measured and reported on with a time delay, after events have occurred (Worksafe Alberta & Government of Alberta, 2011). Examples of lagging indicators are: injury rates, cost of injuries, number and type of incidents reported, etc.
- **Leading indicators** are those that measure proactive work on health and safety that can help to prevent injuries (Worksafe Alberta & Government of Alberta, 2011). These indicators are measured before an injury occurs. Examples of leading indicators include: existing policies and procedures and how they are enforced, control measures in place, training for staff, staff perception of safety culture, etc.

Figure 11 below illustrates the time continuum of performance measures that may be selected.

Figure 11: Time Continuum of Performance Measures



Source: Worksafe Alberta & Government of Alberta, 2011, p. 82

Current Evaluation and Performance Measurement in Nova Scotia

Most Nova Scotia key informants indicated that they conduct informal evaluation of their health and safety activities such as collecting feedback after a training session. Most key informants monitor and report on lagging indicators such as number and type of workplace incidents and injuries, sick time, near misses, root causes of incidents. One key informant noted that the way the lagging data on injuries captured by WCBNS is organized makes it difficult to use this information effectively to support decision-making. A few key informants also track data for leading indicators such as staff participation in training, staff perceptions of safety, new equipment purchases, etc.

Potential Performance Indicators

The following tables describe the performance indicators identified in the literature and by key informants. These indicators may be used in developing the evaluation framework for the Action Plan.

<i>Topic/Area: General Health and Safety</i>	
Leading Indicators	Lagging Indicators
<p><i>Hazard Assessment and Control</i></p> <ul style="list-style-type: none"> • Assessment of exposure to hazards and risks (Public Services Health and Safety Association, 2013; Safe Work Australia, 2012) (key informants) • Hazard controls implemented (Safe Work Australia, 2012) (key informants) • Percentage of required hazard assessments completed (Worksafe Alberta & Government of Alberta, 2011) (key informants) • Percentage of follow-up on corrective action completed (Worksafe Alberta & Government of Alberta, 2011) • Near miss reporting, then completing the process after the report (report, follow up, correct) (key informants) <p><i>Culture/Perceptions</i></p> <ul style="list-style-type: none"> • Safety culture (Nova Scotia Health Research Foundation, 2013) / Staff safety culture surveys (Saskatchewan Association for Safe Workplaces in Health, 2016) • Results of staff surveys (Worksafe Alberta & Government of Alberta, 2011) (key informants) • Employee engagement perceptions (Public Services Health and Safety Association, 2013) • Staff turnover (Public Services Health and Safety Association, 2013) 	<p><i>Incident/Injury Rates</i></p> <ul style="list-style-type: none"> • Incidence of work-related death (Safe Work Australia, 2012) • Number of new claims (Saskatchewan Association for Safe Workplaces in Health, 2016; Worksafe Alberta & Government of Alberta, 2011) (key informants) • Number of workplace incidents (key informants) • Trends in lost time injury rates (Worksafe Alberta, n.d.) • Trends in lost time severity rate (Worksafe Alberta, n.d.) • Comparison of Employer's WCB lost time injury frequency rate with industry average (Worksafe Alberta, n.d.) • Comparison of Employer's WCB lost time injury severity rate with industry average (Worksafe Alberta, n.d.)

Leading Indicators	Lagging Indicators
<p>Training/Education</p> <ul style="list-style-type: none"> • Numbers of staff trained (Public Services Health and Safety Association, 2013; Saskatchewan Association for Safe Workplaces in Health, 2016; Worksafe Alberta & Government of Alberta, 2011) • Attendance at training and educational/informational events (Saskatchewan Association for Safe Workplaces in Health, 2016) • Manager/supervisor training (Public Services Health and Safety Association, 2013) (key informants) <p>Safety Structures/Committees</p> <ul style="list-style-type: none"> • Effectiveness of JOSH Committees (Worksafe Alberta & Government of Alberta, 2011) (key informants) • JOSH Committee activities (key informants) • Implementation and spread of Safety Management Systems (Saskatchewan Association for Safe Workplaces in Health, 2016) <p>Inspection and Audit</p> <ul style="list-style-type: none"> • Safety audit results (Worksafe Alberta & Government of Alberta, 2011) • Inspections completed (Worksafe Alberta & Government of Alberta, 2011) (key informants) • Percentage of incident investigations completed that identified root causes (Saskatchewan Association for Safe Workplaces in Health, 2016; Worksafe Alberta & Government of Alberta, 2011) • Number of internal compliance audits completed and corrective action plans implemented (key informants) • Types of orders issued (key informants) 	<p>Time Loss</p> <ul style="list-style-type: none"> • Lost time frequency rate (Worksafe Alberta & Government of Alberta, 2011) / Average hours of time lost per claim (key informants) • Lost time severity rate (Worksafe Alberta & Government of Alberta, 2011) • Average duration of claim (Saskatchewan Association for Safe Workplaces in Health, 2016; Worksafe Alberta & Government of Alberta, 2011) • Average sick days per FTE (Worksafe Alberta & Government of Alberta, 2011) / Sick time (key informants) • Absentee time (Public Services Health and Safety Association, 2013) <p>Costs</p> <ul style="list-style-type: none"> • Cost per claim (Worksafe Alberta & Government of Alberta, 2011) (key informants) • Insurance premium rates (Worksafe Alberta & Government of Alberta, 2011) • Staff turnover rate (key informants) <p>Health and Safety Violations</p> <ul style="list-style-type: none"> • Number of workplace health and safety citations (Worksafe Alberta & Government of Alberta, 2011) <p>Composite Indicators</p> <ul style="list-style-type: none"> • Index that is calculated based on lost time claims, disabling injuries, days lost due to injury, and occurrence of fatalities. Points on the index are scored when the employer is 100% or more above the industry average on any of these metrics (Alberta Department of Jobs, 2014)

Topic/Area: **General Health and Safety**

Leading Indicators	Lagging Indicators
<p>Composite Indicators</p> <ul style="list-style-type: none"> The Institute for Work and Health (IWH) has developed a composite leading index for workplace safety performance. The index is the sum of the score of responses on eight items: formal safety audits; organization value of safety improvement; importance of safety in relation to production/quality; workers/supervisors have the information needed to work safely; employee's involvement in decisions affecting health and safety; authority of those in charge of safety to make changes; recognition for safe behaviour; tools and equipment to complete work safely. Each item is scored from 1 to 5 and a summative measure gives the overall score. Scores are then divided into tiers: Tier 1 – score of 40; Tier 2 – score of 36 to 39; Tier 3 – score of 32 to 35; and Tier 4: Score of 8 (the lowest score possible) to 31 (Institute for Work and Health, 2011). The Institute for Safety, Compensation and Recovery Research in Australia has developed a similar composite indicator to assess organizational performance on health and safety (De Cieri, Shea, Cooper, Donohue, & Sheehan, 2015) 	

Topic/Area: **Program-specific Indicators**

Leading Indicators	Lagging Indicators
<p>Hazard Assessment and Control</p> <ul style="list-style-type: none"> The accuracy and presence of assessments specific to the identified risk (e.g., violence, moving clients) (Nova Scotia Health Research Foundation, 2013) <p>Training/Competence</p> <ul style="list-style-type: none"> Staff competence in the topic area (Nova Scotia Health Research Foundation, 2013) Number of employees attending training sessions related to the topic (Nova Scotia Health Research Foundation, 2013; Worksafe Alberta, n.d., p. 31) (key informants) Staff knowledge of procedures, and skill in performing procedures in the workplace related to the topic area (e.g., knowledge of lifting techniques, knowledge of violence prevention techniques) (Nova Scotia Health Research Foundation, 2013) 	<p>Incident/Injury Rates</p> <ul style="list-style-type: none"> Rates of injury associate with the risk of interest (Nova Scotia Health Research Foundation, 2013; Worksafe Alberta, n.d.), e.g., back and shoulder claims (Saskatchewan Association for Safe Workplaces in Health, 2016) Number of short and long-term disability claims related to the risk in the last year (Worksafe Alberta, n.d.) Staff injury rates (including near misses), separated by the task or issue that caused them (e.g., lift, transfer, or reposition tasks in moving clients safely) (Nova Scotia Health Research Foundation, 2013)

Leading Indicators	Lagging Indicators
<p>Use of Equipment (specific to client lift and transfer)</p> <ul style="list-style-type: none"> • Number of lifts where lifting devices have been used (Worksafe Alberta, n.d., p. 31) • Availability, accessibility, and maintenance of equipment (Nova Scotia Health Research Foundation, 2013) • The use of equipment (frequency), separated by types of lifting equipment (Nova Scotia Health Research Foundation, 2013) / equipment usage (key informants) <p>Inspection and Audit</p> <ul style="list-style-type: none"> • Percentage of incident investigations that have led to correction of root causes (Worksafe Alberta, n.d., p. 31) <p>Staff Perceptions</p> <ul style="list-style-type: none"> • Employee perception survey results (Worksafe Alberta, n.d., p. 31) • Psychological and physical stressors of job demands including client to staff ratios (Nova Scotia Health Research Foundation, 2013) <p>Leadership Support</p> <ul style="list-style-type: none"> • Number of senior management communications issued regarding the program (Worksafe Alberta, n.d., p. 31) <p>Policies</p> <ul style="list-style-type: none"> • Presence and strength of related policies and accountability measures (Nova Scotia Health Research Foundation, 2013) <p>Patient Experience</p> <ul style="list-style-type: none"> • Client comfort, safety, injury reports and potential health benefits when using safe practices (Nova Scotia Health Research Foundation, 2013) 	<p>Lost Time</p> <ul style="list-style-type: none"> • % of lost time injuries in the last year related to the issue compared to all lost time injuries (Worksafe Alberta, n.d.) • Average number of days/hours missed in the last year due to the issue (Worksafe Alberta, n.d.) • Staff time off work (including modified duty days) related to the issue (Nova Scotia Health Research Foundation, 2013) <p>Costs</p> <ul style="list-style-type: none"> • Total costs to date and in the last year of lost time injuries in in the last year related the issue (Worksafe Alberta, n.d.) • Average cost of lost time injuries in in the last year related to the issue (Worksafe Alberta, n.d.) • Costs of lost time injuries in in the last year related to the issue divided by number of full time equivalents (FTE) (Worksafe Alberta, n.d.) • Total cost of immediate modified work opportunity/plans in the last year related to the issue divided by number of FTEs (Worksafe Alberta, n.d.) • Costs related to short and long-term disability claims related to the issue in the last year (Worksafe Alberta, n.d.) • Cost savings as a result of the program (Nova Scotia Health Research Foundation, 2013) (key informants) • Program payback period (Nova Scotia Health Research Foundation, 2013)

Data Collection

Whenever performance indicators are developed/selected, the availability and quality of the data that will inform the indicator is a critical factor. Nova Scotia does not have extensive data collection systems for workplace health and safety, particularly in the area of leading indicators. The data for most indicators identified as leading indicators in the above table is simply not available. Opportunities for collection of data will be explored further during the development of the evaluation framework for the Action Plan.

Conclusion

This report has presented findings on the current state of health and safety performance in the home care, LTC and community services sectors in Nova Scotia, as well as identifying best practices for improving health and safety in these sectors. The findings demonstrate that there are many initiatives and supports for workplace health and safety available to employers and staff. However, there are also factors that continue to have a negative impact on health and safety such as a workplace culture that does not prioritize and support safety, barriers to accessing safety-related training and education, or the physical environment in which staff work. Best practices that could help to increase the positive supports for safe and healthy workplaces and reduce the negative influences include enhancing workplace safety culture and leadership by implementing and using safety management systems and continuous improvement practices, providing adequate supports to meet the needs of both staff and clients, ensuring access to effective safety-related training and support to implement what is learned, and implementing strong accountability mechanisms.

This research provides important scoping and contextual information for the development of the Workplace Safety Action Plan for Nova Scotia's Health and Community Services Sectors. This work, combined with the stakeholder consultations conducted in the fall of 2016 will help to inform the selection of priority areas to be addressed through the Action Plan. As the project continues to evolve, further research will be conducted to gather and evaluate evidence more specific to the actions in the identified priority areas.

Appendix

Project Committee Members

Steering Committee Members

Name	Title	Organization
Steve Ashton	Vice President, People and Organizational Development	IWK Health Centre
Cindy Cruickshank	Director, Health Workforce Policies and Programs	Dept. of Health & Wellness
Susan Dempsey	Executive Director	AWARE-NS
Judy LaPierre	Director, Disability Support Program	Dept. of Community Services
MJ MacDonald	Executive Director, Continuing Care	Dept. of Health & Wellness
Carolyn Maxwell	Interim Executive Director, Continuing Care	Dept. of Health & Wellness
Christine Penney	Senior Executive Director, Safety Branch	Dept. of Labour & Advanced Education
Katrina Philopolous	Manager, Health, Safety and Wellness	Nova Scotia Health Authority
Shelley Rowan	Vice President	Workers' Compensation Board of Nova Scotia
Wendy McVeigh	Director, Continuing Care	Nova Scotia Health Authority

Advisory Committee Members

The following individuals are members of the project Advisory Committee. An Advisory Committee member may also designate an alternative to attend meetings on their behalf.

Name	Title	Organization
Dr. Alice Aiken	Dean	Faculty of Health Professions, Dalhousie University
Jim Balcom	Director of Operations	GEM Health Care Group
Heather Beaudoin	Director, Employee Wellness	MacLeod Group
Jenna Brookfield	Health and Safety Representative	CUPE Nova Scotia
Angus Campbell	Executive Director	Caregivers Nova Scotia
Millie Colbourne	Chair	Association of Adult Residential Centres (ARCs) and Regional Rehabilitation Centres (RRCs)
	CEO	Breton Ability Centre
Annette Fougere	Chair	Continuing Care Council
Greg Green	Manager, Technical Services	Dept. of Labour & Advanced Education
Janet Hazelton	President	Nova Scotia Nurses' Union
Karen Lake	Executive Director	Nova Scotia Residential Agencies Association (NSRAA) King's Meadow Residence Society
Sheila Landry	Director, Labour Relations	Labour Relations, DCS
Jason MacLean	President	Nova Scotia Government Employees Union
Linda MacNeil	Area Director / VP at Large	UNIFOR
Helen Marsh	Representative	Home Support Network
	Executive Director	New Waterford Homecare Service Society
Susan Rath-Wilson	Vice President, People and Organization	VON
Jason Shannon	CEO	Shannex
Janet Simm	CEO	Northwood Inc.
Alexandra Smith	Director, Health Sector Labour Relations and Compensation	Department of Health and Wellness
Lisa Smith	Chair	Community Governed Organizations Nova Scotia
	CEO	Glen Haven Manor
Mike Townsend	Executive Director	DIRECTIONS Council for Vocational Services Society
Andrea Vardy	Director, Large Workplace Services	Workers' Compensation Board of Nova Scotia
Mike Walsh	President	Continuing Care Association of Nova Scotia

Data Collection Tools

Environmental Scan of Best Practices Interview Guide

Environmental Scan of Best Practices – Key Informant Interview Guide
Workplace Safety Action Plan for Nova Scotia's Health and Community Services Sectors

August 5, 2016

Purpose of the Guide

This document will be used by the interviewer to guide the interview discussion and ensure all areas of interest are covered. Items printed in italics are scripts for the interviewer.

Introduction and Purpose

Workplace injuries and fatalities can have significant negative consequences for workers and their families, and they can also negatively affect work productivity and increase costs for government and businesses. In Nova Scotia, the health and community services sector has one of the highest rates of injury and the largest number of claims to the WCB for time lost from work due to injury. Stakeholders including AWARE-NS (Nova Scotia Health and Community Services Safety Association), the Workers' Compensation Board of Nova Scotia, the Departments of Health and Wellness, Community Services, and Labour and Advanced Education, the Nova Scotia Health Authority and the IWK Health Centre, and industry representatives are coming together to develop a Workplace Safety Action Plan for Nova Scotia's Health and Community Services Sectors. The Action Plan will provide overall direction for the health and community services sectors, with particular focus on publicly-funded home care, long term care and community services. We have engaged a consulting firm, Research Power Inc. (RPI), to help us conduct this work.

As part of developing this Action Plan, RPI is undertaking an environmental scan to identify best practices in workplace health and safety in the health and community services sectors, focusing on publicly-funded home care, long term care and community services. An important component of this environmental scan is key informant interviews with those who have experience and expertise in this area, such as yourself.

The purpose of this interview is to gather your feedback on best practices in workplace health and safety in these sectors. Information collected through this interview will be compiled into a report, and this report will be reviewed by the Project's Sponsors, Steering Committee and Advisory Committee. The report may also potentially be made publicly available at some point. All key informants who participate in the interviews will be listed by name in the Appendix of the report, but opinion-based information that you provide (e.g., opinions about issues in the sector) will be aggregated across all interviews and will not be associated with you personally in the report. You may be referenced as the source for factual information that you provide (e.g., description of programs/services currently available or planned).

To help with the analysis of the information, I would like to take notes during the interview. You will have an opportunity to review these notes in order to ensure accuracy and validate the information provided (if you wish to do so). The notes from your interview will be kept confidential (i.e., only consultants from RPI will see them).

Do you have any questions?

Do you consent to participate in the interview?

___Yes ___No

Questions

Opening

1. Please briefly describe your current role and your involvement with workplace health and safety in the health and community services sectors.

Sub-Questions:

- In which of the sub-sectors of interest (long term care, home care, and/or community services) have you worked?

Current Work

2. Please describe any action plans or strategies you have implemented in your organization/ jurisdiction related to workplace health and safety in the sectors of interest (long term care, home care, and/or community services). This can be work you are aware of or in which you are directly involved.

Sub-Questions:

- If you have not implemented any action plans/strategies, please describe any other key initiatives in your organization/jurisdiction related to workplace health and safety.
- If the work is targeted at addressing a specific issue (e.g., patient lifts/transfers, violence, etc.), please describe.
- What resources and supports are/were required to implement these interventions/ programs/ changes?

3. How did you decide which issues to address and/or what initiatives/actions to implement?

Sub-Questions:

- Did the decision-making process included engagement of stakeholders (e.g., frontline staff, industry representatives, etc.)? If so, please describe the engagement process you used.
- What role did evidence/research play in the decision-making process? Are you able to share any of the evidence/research you used?

4. How is the success of these interventions/programs/changes being measured? Are you able to share any evaluation results?

5. What challenges occurred, if any, in implementing these initiatives/actions?

Sub-Questions:

- How were these challenges addressed?

Best Practices

6. Other than the work underway within your own organization/sector that you've already described, are there other best or promising practices to improve workplace health and safety in the sectors of interest?

7. What are the best opportunities for change to reduce workplace injuries in the health and community services sectors?

8. What indicators or outcome measures (leading or lagging) on health and safety performance do you think it is important to track? Are any of these tracked by your organization?

Sub-Questions:

- How often are indicators measured? How often should they be measured?
- How are results reported?
- What supports are needed to ensure that performance measurement/evaluation takes place?

Closing

9. Are there any key documents on this topic that we should review? If yes, please to forward the information via email (clare@researchpowerinc.com) or fax (902-463-2772).
10. Any additional thoughts or comments?

Thank you for your thoughtful input and time.

Assessment of Current State in Nova Scotia Interview Guide

Assessment of Current State in NS – Key Informant Interview Guide
Workplace Safety Action Plan for Nova Scotia's Health and Community Services Sectors

August 4, 2016

Purpose of the Guide

This document will be used by the interviewer to guide the interview discussion and ensure all areas of interest are covered. Items printed in italics are scripts for the interviewer.

Introduction and Purpose

Workplace injuries and fatalities can have significant negative consequences for workers and their families, and they can also negatively affect work productivity and increase costs for government and businesses. In Nova Scotia, the health and community services sector has one of the highest rates of injury and the largest number of claims to the WCB for time lost from work due to injury. Stakeholders including AWARE-NS (Nova Scotia Health and Community Services Safety Association), the Workers' Compensation Board of Nova Scotia, the Departments of Health and Wellness, Community Services, and Labour and Advanced Education, the Nova Scotia Health Authority and the IWK Health Centre, and industry representatives are coming together to develop a Workplace Safety Action Plan for Nova Scotia's Health and Community Services Sectors. The Action Plan will provide overall direction for the health and community services sectors, with particular focus on publicly-funded home care, long term care and community services. We have engaged a consulting firm, Research Power Inc. (RPI), to help us conduct this work.

As part of developing this Action Plan, RPI is undertaking a jurisdictional review. The purpose of this review is to assess the current state of occupational health and safety within the health and community services sectors in Nova Scotia, including identifying possible root causes of work-related injuries. An important component of this review is key informant interviews with those working in these sectors (specifically home care, long term care and community services), such as yourself.

The purpose of this interview is to gather your feedback on this topic from the perspective of your own organization and/or your sector more broadly. Information collected through this interview will be compiled into a report, and this report will be reviewed by the Project's Sponsors, Steering Committee and Advisory Committee. The report may also potentially be made publicly available at some point. All key informants who participate in the interviews will be listed by name in the Appendix of the report, but opinion-based information that you provide (e.g., opinions about the challenges or issues in the sector) will be aggregated across all interviews and will not be associated with you personally in the report. You may be referenced as the source for factual information that you provide (e.g., description of programs/services currently available or planned).

To help with the analysis of the information, I would like to take notes during the interview. You will have an opportunity to review these notes in order to ensure accuracy and validate the information provided (if you wish to do so). The notes from your interview will be kept confidential (i.e., only consultants from RPI will see them).

Do you have any questions?

Do you consent to participate in the interview?

___Yes ___No

Questions

11. Please briefly describe your current role and your involvement with workplace health and safety in the health and community services sector.

Workplace Health and Safety Activities

12. What activities, if any, are planned or currently underway to improve workplace health and safety and/or reduce workplace injuries in your organization?

Sub-Questions:

- Who is involved in these activities?
- What resources are required to implement these activities?
- What supports are needed to ensure these activities are successful?
- How will you know these activities have been successful?

13. How is employee health and safety reflected in the organization's mission/vision/ values and/or strategic plan?

14. Please describe any other activities you are aware of that are planned or currently underway to improve workplace health and safety and/or reduce workplace injuries in your sector more broadly?

Sub-Questions:

- Who is involved in these activities?
- What resources are required to implement these activities?
- What supports are needed to ensure these activities are successful?
- How will the success of these activities be measured?

15. What are the best opportunities for change to prevent workplace injuries in your organization? In your sector?

16. Does your organization/industry track any indicators or data on health and safety performance? If so, what are the indicators?

Sub-Questions:

- Are you able to share any of this data with us?

Challenges and Supports

17. What are the factors that contribute to workplace injuries in your organization? In your sector?
18. What are the challenges related to improving workplace health and safety in your organization? In your sector?

19. What supports are needed to address the challenges you have described?

Sub-Questions:

- Who should provide these supports?

Closing

20. Are there any key documents related to improving workplace health and safety in Nova Scotia that we should include in this jurisdictional review? If yes, please to forward the information via email (clare@researchpowerinc.com) or fax (902-463-2772).

21. Any additional thoughts or comments?

Thank you for your thoughtful input and time.

Key Informants

Environmental Scan of Best Practices Key Informants

Name	Title	Organization	Location
Sandra Cripps	CEO	Saskatchewan Association for Safe Workplaces in Health	Saskatchewan
Leon Genesove	Chief Physician	Ontario Ministry of Labour	Ontario
David Hurford	Acting Executive Director	SafeCareBC	British Columbia
Darryl Kutschinski	Executive Director	Continuing Care Safety Association	Alberta
Kelly Lovely (with Judith Leacock)	Director & Consultant	KLRM (health, safety, change and organizational culture firm)	Australia
Judith Leacock (with Kelly Lovely)	General Manager	Summitcare	Australia
Kathleen McPhaul	Chief Consultant, Public Health, Occupational Health Services	US Dept. of Veterans Affairs	United States
Mark Stipic	Consultant	Preventia	Australia
Stephen Symon	ILS Manager: Health Care, Social Services and Education	WorkSafeBC	British Columbia
Henrietta van Hulle	Executive Director, Health & Community Services	Public Services Health & Safety Association (PSHSA)	Ontario

Assessment of Current State in Nova Scotia Key Informants

Name	Title	Organization
Joanne Bailey (with Paul Cormier)	Servicing Coordinator for Community Care	NSGEU
Louise Barker	Health and Community Services Sectors Relationship Manager	Workers' Compensation Board of Nova Scotia
Jenna Brookfield	Health and Safety Representative	CUPE Nova Scotia
Harold Carroll	Executive Direct, OHS	Dept. of Labour & Advanced Education
Mike Carter	Zone Lead, Occupational Health,	KLRM (health, safety, change and organizational culture firm)
Safety & Wellness, Western Zone	Nova Scotia Health Authority	Summitcare
Paul Cormier (with Joanne Bailey)	OHS Lead	NSGEU
Cindy Cruickshank	Director, Health Workforce Policies and Programs	Dept. of Health & Wellness
Patricia Bland	Administrator	Riverview Homes
Tracy Bonner	Administrator	Rosecrest Homes
Carol Ann Brennan	Executive Director	Regional Residential Services Society
Lisa Briers	OHS Lead	VON
Lindsay Fenton	Health and Safety Coordinator	Shannex
Shelley James	OHS Lead	Northwood Inc.
Judy LaPierre	Director, Disability Support Program	Dept. of Community Services
Laura MacMaster (with Paula Withrow)	Interim Manager, Investigation and Compliance, Continuing Care	Dept. of Health & Wellness
Heather Matthews	OHS Specialist	AWARE-NS
Carolyn Maxwell	Interim Executive Director, Continuing Care	Dept. of Health & Wellness
Wendy McVeigh	Director, Continuing Care	Nova Scotia Health Authority
Christine Penney	Senior Executive Director, Safety Branch	Dept. of Labour & Advanced Education
Courtney Richardson	CEO	Breton Ability Centre
Krista Stultz	Safety Consultant	IWK Health Centre
Paula Withrow (with Laura MacMaster)	Interim Director, Liaison & Service Support, Risk Mitigation – Continuing Care, System Strategy and Performance	Dept. of Health & Wellness

References

- Alavi, H., & Oxley, J. (2013). *Return to Work and Occupational Illness and Injury Rehabilitation*. Melbourne, Australia: Monash University Accident Research Centre, Institute for Safety, Compensation and Recovery Research, and Return to Work Division, WorkSafe Victoria.
- Alberta Department of Jobs, Skills, Training and Labour. (2014). 2014/2015 OHS Index Healthcare Program.
- American College of Occupational and Environmental Medicine. (2006). ACOEM Guideline – Preventing needless work disability by helping people stay employed. Retrieved Oct. 4, 2016, from <http://www.acoem.org/PreventingNeedlessWorkDisability.aspx>
- American Nurses Association. (2016). Workplace Violence. Retrieved Sept. 5, 2016, from <http://nursingworld.org/workplaceviolence>
- Amick, B. C., 3rd, Lee, H., Hogg-Johnson, S., Katz, J. N., Brouwer, S., Franche, R. L., & Bultmann, U. (2016). How Do Organizational Policies and Practices Affect Return to Work and Work Role Functioning Following a Musculoskeletal Injury? *J Occup Rehabil*. doi: 10.1007/s10926-016-9668-8
- Arnetz, J. E., Hamblin, L., Ager, J., Luborsky, M., Upfal, M. J., Russell, J., & Essenmacher, L. (2015). Underreporting of Workplace Violence: Comparison of Self-Report and Actual Documentation of Hospital Incidents. *Workplace Health & Safety*, 63(5), 200-210. doi: 10.1177/2165079915574684
- AWARE-NS. (n.d.-a). AWARE-NS website. Retrieved Jul. 6, 2016, from <http://awarens.ca/>
- AWARE-NS. (n.d.-b). Workplace Violence Prevention: Steps for Safety. Retrieved Jul. 6, 2016, from <http://awarens.ca/initiatives/workplace-violence-prevention/>
- Bernacki, E. J., Guidera, J. A., Schaefer, J. A., & Tsai, S. (2000). A facilitated early return to work program at a large urban medical center. *J Occup Environ Med*, 42(12), 1172-1177.
- Blando, J., Ridenour, M., Hartley, D., & Casteel, C. (2015). Barriers to Effective Implementation of Programs for the Prevention of Workplace Violence in Hospitals. *Online Journal of Issues in Nursing*, 20(1), 5.
- Bluteau DeVenney. (2013). *Soteria Strains Strategy – Findings and Recommendations Report*
- Bonner, T. (August 26, 2016). [Administrator, Rosecrest Communities, Nova Scotia].
- Brewer, S., King, E., Amick, B., Delclos, G., Spear, J., Irvin, E., . . . Williams, R. (2007). *A systematic review of injury/illness prevention and loss control programs (IPCs)* Retrieved from https://www.iwh.on.ca/system/files/sys-reviews/sys_review_ipc_programs_2007_0.pdf
- Campbell, C. L., McCoy, S., Burg, M. A., & Hoffman, N. (2014). Enhancing Home Care Staff Safety Through Reducing Client Aggression and Violence in Noninstitutional Care Settings: A Systematic Review. *Home Health Care Management & Practice*, 26(1), 3-10 18p. doi: 10.1177/1084822313497364
- Canadian Centre for Occupational Health and Safety. (2016a). OSH Answers Fact Sheets: Violence in the Workplace. Retrieved Aug. 20, 2016, from <http://www.ccohs.ca/oshanswers/psychosocial/violence.html>
- Canadian Centre for Occupational Health and Safety. (2016b). Violence in the Workplace Legislation and Standards. Retrieved Aug. 10, 2016, from http://ccinfoweb2.ccohs.ca/legislation/documents/notes/oshleg/leg_viol.htm
- Canadian Standards Association, Bureau de normalisation de Quebec, & Mental Health Commission of Canada. (2013). CAN/CSA-Z1003-13/BNQ 9700-803/2013 - *Psychological health and safety in the workplace - Prevention, promotion, and guidance to staged implementation* Retrieved from <http://www.csagroup.org/z1003>

- Carroll, H. (August 17, 2016). [Executive Director, Occupational Health and Safety, Department of Labour and Advanced Education].
- Carter, M. (August 24, 2016). [Zone Lead, Occupational Health, Safety & Wellness, Western Zone, Nova Scotia Health Authority].
- Collie, A. (2014). Where can employers act to improve RTW outcomes? An overview and results of a systematic review. *Return to Work Forum 2014, Return to Work - Evidence on What Works, Friday 7 November, 2014, Monash University Conference Centre, Melbourne*. Retrieved Oct. 3, 2016, from http://www.iscrr.com.au/_data/assets/pdf_file/0020/342542/return-to-work-forum-presentation-Collie-Iles-Cooney-2014.pdf
- Collins, J., Canadian Standards Association, & Mental Health Commission of Canada. (2013). *Assembling the Pieces: An Implementation Guide to the National Standard for Psychological Health and Safety in the Workplace* Retrieved from <http://shop.csa.ca/en/canada/occupational-health-and-safety-management/canca-z1003-13bnq-9700-8032013/inv/27037012014>
- Cripps, S. (August 24, 2016). [CEO, Saskatchewan Association for Safe Workplaces in Health].
- Curry, P. (2015). Broken Homes: Nurses speak out on the state of long-term care in Nova Scotia and chart a course for a sustainable future. Dartmouth, NS: Nova Scotia Nurses' Union.
- De Cieri, H., Shea, T., Cooper, B., Donohue, R., & Sheehan, C. (2015). *Early indicators of injuries and accidents at work: An analysis of leading indicators as predictors of WSV data for Victorian workplaces* Retrieved from http://www.iscrr.com.au/_data/assets/pdf_file/0008/297269/Early-Indicators-of-injuries-and-accidents-at-work-leading-indicators-of-predictors-of-WSV-Data-OPM-Organisation-Performance-Metric.pdf
- Eggert, S. (2010). Psychosocial factors affecting employees abilities to return to work. *AAOHN J*, 58(2), 51-55. doi: 10.3928/08910162-20100118-01
- Enmarker, I., Olsen, R., & Hellzen, O. (2011). Management of person with dementia with aggressive and violent behaviour: a systematic literature review. *International Journal of Older People Nursing*, 6(2), 153-162 110p. doi: 10.1111/j.1748-3743.2010.00235.x
- European Commission. (2010). *Occupational health and safety risks in the healthcare sector: Guide to Prevention and Good Practice* Retrieved from <http://ec.europa.eu/social/BlobServlet?docId=7167&langId=en>
- European Parliament. (2003). Directive 2003/88/EC of the European Parliament and of the Council of 4 November 2003 concerning certain aspects of the organisation of working time. Retrieved Aug. 16, 2016, from <http://eur-lex.europa.eu/legal-content/EN/TXT/?qid=1484577493897&uri=CELEX:32003L0088>
- Genesove, L. (September 16, 2016). [Chief Physician, Ontario Ministry of Labour].
- Gershon, R. R. M., Pogorzelska, M., Qureshi, K. A., Stone, P. W., Canton, A. N., Samar, S. M., . . . Sherman, M. (n.d.). *Home Health Care Patients and Safety Hazards in the Home: Preliminary Findings* Retrieved from http://www.ahrq.gov/downloads/pub/advances2/vol1/advances-gershon_88.pdf
- Gutmanis, I., Snyder, M., Harvey, D., Hillier, L. M., & LeClair, J. K. (2015). Health Care Redesign for Responsive Behaviours—The Behavioural Supports Ontario Experience: Lessons Learned and Keys to Success. *Canadian Journal of Community Mental Health*, 34(1), 45-63. doi: 10.7870/cjcmh-2015-001
- Hanson, G. C., Perrin, N. A., Moss, H., Laharnar, N., & Glass, N. (2015). Workplace violence against homecare workers and its relationship with workers health outcomes: a cross-sectional study. *BMC public health*, 15, 11-014-1340-1347. doi: 10.1186/s12889-014-1340-7 [doi]
- Harris, S. (2013). Safety Culture in Healthcare: The \$13 Billion Case.
- Harrison, M. B., Keeping-Burke, L., Godfrey, C. M., Ross-White, A., McVeety, J., Donaldson, V., . . . Doran, D. M. (2013). Safety in home care: A mapping review of the international literature. *International Journal of Evidence-Based Healthcare*, 11(3), 148-160. doi: 10.1111/1744-1609.12027

- Health and Safety Executive. (n.d.). Nurses/care workers: Work-related violence case studies: Community mental health staff. Retrieved Sept. 5, 2016, from <http://www.hse.gov.uk/violence/hslcasestudies/birmingham.htm>
- Hesketh, K. L., Duncan, S. M., Estabrooks, C. A., Reimer, M. A., Giovannetti, P., Hyndman, K., & Acorn, S. (2003). Workplace violence in Alberta and British Columbia hospitals. *Health Policy*, 63(3), 311-321.
- Institute for Work and Health. (2007). Safety climate has "great potential" in reducing workplace injury rates. *At Work*, 49 (Summer 2007).
- Institute for Work and Health. (2011). *Benchmarking organizational leading indicators for the prevention and management of injuries and illnesses: Final Report* Retrieved from http://www.iwh.on.ca/system/files/documents/benchmarking_organizational_leading_indicators_2011.pdf
- Institute for Work and Health. (2014). *Seven 'Principles' for Successful Return to Work* Retrieved from https://www.iwh.on.ca/system/files/documents/seven_principles_rtw_2014_0.pdf
- International Association of Oil and Gas Producers. (2013). *Shaping safety culture through safety leadership Report No. 52* Retrieved from <http://www.ogp.org.uk/pubs/452.pdf>
- Judy LaPierre (September 30, 2016). [Director, Disability Support System Planning, Nova Scotia Department of Community Services].
- Kutschinski, D. (September 21, 2016). [Executive Director, Continuing Care Safety Association (CCSA), Alberta].
- Lancôt, N., & Guay, S. (2014). The aftermath of workplace violence among healthcare workers: A systematic literature review of the consequences. *Aggression and Violent Behavior*, 19(5), 492-501. doi: 10.1016/j.avb.2014.07.010
- Leacock, J. (August 16, 2016). [General Manager, Operations, SummitCare, Australia].
- Lim, B. C. E. (2011). A systematic literature review: managing the aftermath effects of patient's aggression and violence towards nurses. *Singapore Nursing Journal*, 38(3), 6-12 17p.
- Macdonald, M., Lang, A., & MacDonald, J.-A. (2011). Mapping a Research Agenda for Home Care Safety: Perspectives from Researchers, Providers, and Decision Makers. *Canadian Journal on Aging*, 30(2), 233-245. doi: <http://dx.doi.org/10.1017/S0714980811000055>
- Manitoba Department of Labour. (2013). *Review of Prevention Services: The Report of the Chief Prevention Officer of the Province Of Manitoba* Retrieved from https://www.gov.mb.ca/labour/safety/pdf/2013_report_of_the_chief_prevention_officer.pdf
- Marine, A., Ruotsalainen, J. H., Serra, C., Verbeek, J. H., Ruotsalainen, J. H., Verbeek, J. H., . . . Serra, C. (2015). Preventing occupational stress in healthcare workers. *Cochrane Database of Systematic Reviews*(4), N.PAG-N.PAG 1p. doi: 10.1002/14651858.CD002892.pub5
- McCaughey, D., McGhan, G., Kim, J., Brannon, D., Leroy, H., & Jablonski, R. (2012). Workforce implications of injury among home health workers: Evidence from the National Home Health Aide Survey. *The Gerontologist*, 52(4), 493-505. doi: 10.1093/geront/gnr133
- McLaren, C., Reville, R., & Seabury, S. (2010). *How Effective are Employer Return to Work Programs?* Retrieved from http://www.rand.org/content/dam/rand/pubs/working_papers/2010/RAND_WR745.pdf
- McMaster, L. (August 16, 2016). [Monitoring and Evaluation, Continuing Care, Department of Health and Wellness].
- McPhaul, K. (August 17, 2016). [Chief Consultant, Public Health, Occupational Health Services, US Dept. of Veterans Affairs].
- McPhaul, K., London, M., & Lipscomb, J. A. (2013). A framework for translating workplace violence intervention research into evidence-based programs. *Online Journal of Issues in Nursing*, 18(1), 4.

- Mental Health Commission of Canada. (2014). *Advancing Workplace Mental Health: The Standard One Year Later* Retrieved from http://www.mentalhealthcommission.ca/sites/default/files/mhcc_workplace_standard_1year_eng_press_release_0.pdf
- Morschhäuser, M., & Sochert, R. (2006). *Healthy Work in an Ageing Europe: Strategies and Instruments for Prolonging Working Life* Retrieved from <http://www.ageingatwork.eu/resources/health-work-in-an-ageing-europe-enwhp-3.pdf>
- Mullen, J., & Kelloway, E. K. (2009). Safety leadership: A longitudinal study of the effects of transformational leadership on safety outcomes. *Journal of Occupational and Organizational Psychology*, 82(2), 253-272. doi: 10.1348/096317908X325313
- Mullen, J., & Kelloway, E. K. (2011). Leading to occupational health and safety. In J. Campbell Quick & L. Tetrick (Eds.), *Handbook of Occupational Health Psychology*. Washington, DC: APA Books.
- National Health Service. (2009). *'Not Alone': A guide for the better protection of lone workers in the NHS* Retrieved from http://www.nhsbsa.nhs.uk/Documents/SecurityManagement/Lone_Working_Guidance_final.pdf
- Nielsen, K. J. (2014). Improving safety culture through the health and safety organization: A case study. *Journal of Safety Research*, 48, 7-17. doi: <http://dx.doi.org/10.1016/j.jsr.2013.10.003>
- Nova Scotia Department of Community Services. (2008). Adult Service Centres, Disability Support Program. Retrieved July 28, 2016, from <http://novascotia.ca/coms/disabilities/AdultServiceCentres.html>
- Nova Scotia Department of Community Services. (2013). Licensed Homes for Special Care, Disability Support Program. Retrieved July 28, 2016, from <http://novascotia.ca/coms/disabilities/HomesForSpecialCare.html>
- Nova Scotia Department of Health and Wellness. (2013). *Challenging Behaviour Program Manual* Retrieved from <http://novascotia.ca/dhw/ccs/policies/Challenging-Behaviour-Program-Manual.pdf>
- Nova Scotia Department of Health and Wellness. (2015a). Home Care, Continuing Care. Retrieved July 28, 2016, from <http://novascotia.ca/dhw/ccs/home-care.asp>
- Nova Scotia Department of Health and Wellness. (2015b). Long Term Care, Continuing Care. Retrieved July 28, 2016, from <http://novascotia.ca/dhw/ccs/long-term-care.asp>
- Nova Scotia Department of Health and Wellness. (2016). *Long Term Care Program Requirements: Nursing Homes and Residential Care Facilities* Retrieved from <http://novascotia.ca/dhw/ccs/policies/Long-Term-Care-Facility-Program-Requirements.pdf>
- Nova Scotia Department of Health and Wellness, Nova Scotia Department of Labour and Advanced Education, Nova Scotia Department of Community Services, AWARE-NS, & Workers' Compensation Board of Nova Scotia. (2016). Development of a Workplace Safety Action Plan for Nova Scotia's Health and Community Services Sectors: Statement of Work. Violence in the Workplace Regulations (2007).
- Nova Scotia Department of Labour and Advanced Education. (2014). Occupational Health and Safety Trust Fund. Retrieved Sept. 30, 2016, from <http://novascotia.ca/lae/healthandsafety/ohstrustfund.asp>
- Nova Scotia Department of Labour and Advanced Education. (2016a). *Internal Activity and Order Data*.
- Nova Scotia Department of Labour and Advanced Education. (2016b). Occupational Health and Safety Legislation. Retrieved Aug. 25, 2016, from <http://novascotia.ca/lae/healthandsafety/legislation.asp>
- Nova Scotia Department of Labour and Advanced Education. (2016c). Workplace Violence Codes of Practice. Retrieved Sept. 25, 2016, from <http://novascotia.ca/lae/healthandsafety/CodesofPractice.asp>
- Nova Scotia Health Research Foundation. (2013). Musculoskeletal Injury Tracking and Prevention, Jurisdictional Review: Literature Review.

- Occupational Health and Safety Division, Nova Scotia Department of Labour and Advanced Education. (2015). Health care sector plan 2015.
- Occupational Safety and Health Administration, U.S. Department of Labor. (2015a). *Guidelines for Preventing Workplace Violence for Healthcare and Social Service Workers* Retrieved from <https://www.osha.gov/Publications/OSHA3148.pdf>
- Occupational Safety and Health Administration, U.S. Department of Labor. (2015b). Workplace Violence Prevention and Related Goals: The Big Picture Retrieved from <https://www.osha.gov/Publications/OSHA3828.pdf>
- Ontario Ministry of Health and Long-Term Care. (2016). Late Career, Health Workforce Planning and Regulatory Affairs Division. Retrieved Jul. 18, 2016, from http://www.health.gov.on.ca/en/pro/programs/hhrsd/nursing/late_career.aspx
- Ontario Ministry of Labour. (2016a). Healthcare Sector Plan, 2016-2017 <https://www.labour.gov.on.ca/english/hs/sawo/sectorplans/health/index.php>
- Ontario Ministry of Labour. (2015b). News Release: Ontario Taking Action to Better Protect Health Care Workers. Retrieved Aug. 7, 2016, from <https://news.ontario.ca/mol/en/2015/08/ontario-taking-action-to-better-protect-health-care-workers.html>
- Ontario Ministry of Labour. (2016). *Code of Practice to Address Workplace Harassment Under Ontario's Occupational Health and Safety Act* Retrieved from <https://www.labour.gov.on.ca/english/hs/pdf/harassment.pdf>
- Ontario Nurses' Association. (2014). *Workplace Violence and Harassment: A Guide for ONA Members* Retrieved from https://www.ona.org/wp-content/uploads/ona_workplaceviolenceandharassmentguide_201610.pdf
- Public Services Health and Safety Association. (2013). *Healthy and Safe Healthcare Workplace Indicators Project: Final Report* Retrieved from <http://www.healthyworkenvironments.ca/LiteratureRetrieve.aspx?ID=171696>
- Public Services Health and Safety Association. (2015). *2014-15 Annual Report: Action in Motion* Retrieved from https://www.pshsa.ca/wp-content/uploads/2015/09/PSHSA-AnnualReport-2014-2015-action-in-motion_wb.pdf
- Quinlan, E., Robertson, S., Miller, N., & Robertson-Boersma, D. (2014). Interventions to reduce bullying in health care organizations: A scoping review. *Health Services Management Research*, 27(1), 33-44 12p. doi: 10.1177/0951484814547236
- Robinson, K. M., & Tappen, R. M. (2008). Policy recommendations on the prevention of violence in long-term care facilities. *J Gerontol Nurs*, 34(3), 10-14.
- Robson, L., Stephenson, C., Schulte, P., Amick, B., Chan, S., Bielecky, A., . . . Grubb, P. (2010). *A systematic review of the effectiveness of training & education for the protection of workers* Retrieved from https://www.iwh.on.ca/system/files/sys-reviews/sys_review_education_training_2010.pdf
- Rueda, S., Chambers, L., Wilson, M., Mustard, C., Rourke, S. B., Bayoumi, A., . . . Lavis, J. (2012). Association of returning to work with better health in working-aged adults: a systematic review. *Am J Public Health*, 102(3), 541-556. doi: 10.2105/ajph.2011.300401
- Safe Work Australia. (2012). *Australian Work Health and Safety Strategy 2012-2022* Retrieved from <http://www.safeworkaustralia.gov.au/sites/SWA/about/Publications/Documents/719/Australian-WHS-Strategy-2012-2022.pdf>
- SafeWork SA. (2014). *Community Workers: Work health and safety guidelines* Retrieved from https://www.safework.sa.gov.au/uploaded_files/CommunityWorkers.pdf
- Saskatchewan Association for Safe Workplaces in Health. (2016). 2016 Healthcare Strategy.
- Shaw, W. S., Robertson, M. M., Pransky, G., & McLellan, R. K. (2003). Employee perspectives on the role of supervisors to prevent workplace disability after injuries. *J Occup Rehabil*, 13(3), 129-142.

- Smith, P., Beaton, D., Hogg-Johnson, S., Ibrahim, S., Koehoorn, M., McLeod, C., . . . Scott-Marshall, H. (2013). *Examining Determinants and Consequences of Work-related Injuries among Older Workers* Retrieved from http://www.wcb.ns.ca/Portals/wcb/Smith_Injuries_Older_Workers_2013.pdf
- Soteria Strains Working Group. (2013a). Evidence-Based Practice Review White Paper: A contextual review of working programs and strategies for safe patient handling activities *Soteria Strains: A provincial strategy for healthcare workplace musculoskeletal injury prevention*.
- Soteria Strains Working Group. (2013b). Soteria Strains Perception Survey Results *Soteria Strains: A provincial strategy for healthcare workplace musculoskeletal injury prevention*.
- Stichler, J. F. (2013). Healthy work environments for the ageing nursing workforce. *Journal of nursing management, 21*(7), 956-963. doi: 10.1111/jonm.12174 [doi]
- Symon, S. (September 19, 2016). [Manager, Industry and Labour Services, Health Care, Social Services and Education Sectors, WorkSafe BC].
- The Joint Commission. (2012). *Improving Patient and Worker Safety: Opportunities for Synergy, Collaboration and Innovation* Retrieved from <https://www.jointcommission.org/assets/1/18/TJC-ImprovingPatientAndWorkerSafety-Monograph.pdf>
- Tjulin, A., MacEachen, E., Stiwnne, E. E., & Ekberg, K. (2011). The social interaction of return to work explored from co-workers experiences. *Disabil Rehabil, 33*(21-22), 1979-1989. doi: 10.3109/09638288.2011.553708
- Transport Canada, 2015. TP 13844 - Score Your Safety Culture. Retrieved January 16, 2017 from <https://www.tc.gc.ca/eng/civilaviation/publications/tp13844-menu-275.htm>
- Tucker, S. (2016). *Leading to Safety: How Top Organizational Leaders Impact Safety* Retrieved from http://www.worksafesask.ca/wp-content/uploads/2013/11/SK-Leadership-Charter-Project_Final-Report_final-version.pdf
- Tucker, S., & Diekrager, D. (2013). *Saskatchewan Leadership Charter Project* Retrieved from http://www.worksafesask.ca/wp-content/uploads/2013/12/SK-Leadership-Charter-Project_Final-Report_2013.pdf
- van Duijn, M., & Burdorf, A. (2008). Influence of modified work on recurrence of sick leave due to musculoskeletal complaints. *J Rehabil Med, 40*(7), 576-581. doi: 10.2340/16501977-0215
- van Hulle, H. (August 24, 2016). [Executive Director, Health & Community Services, Public Services Health & Safety Association (PSHSA)].
- Westermann, C., Kozak, A., Harling, M., & Nienhaus, A. (2014). Burnout intervention studies for inpatient elderly care nursing staff: Systematic literature review. *International journal of nursing studies, 51*(1), 63-71 69p. doi: 10.1016/j.ijnurstu.2012.12.001
- Williams-Whitt, K., Bultmann, U., Amick, B., 3rd, Munir, F., Tveito, T. H., & Anema, J. R. (2016). Workplace Interventions to Prevent Disability from Both the Scientific and Practice Perspectives: A Comparison of Scientific Literature, Grey Literature and Stakeholder Observations. *J Occup Rehabil*. doi: 10.1007/s10926-016-9664-z
- Wong, J. H. K., Kelloway, E. K., & Makhan, D. W. (2015). Safety Leadership *The Wiley Blackwell Handbook of the Psychology of Occupational Safety and Workplace Health* (pp. 83-110): John Wiley & Sons, Ltd.
- Workers' Compensation Board of Nova Scotia. (2015a). Safe Resident Handling: What long-term care administrators need to know. Retrieved June 28, 2016, from http://www.wcb.ns.ca/Portals/wcb/Health%20Care%20Handout_web.pdf
- Workers' Compensation Board of Nova Scotia. (2015b). WCB 2015 Annual Report: Leading through Change. <http://www.wcb.ns.ca/Portals/wcb/AnnualReports/2015AnnualReportFinal.pdf>
- Workers' Compensation Board of Nova Scotia. (2016). *Internal WCBNS Data*.

- Workers' Compensation Board of Nova Scotia, & Nova Scotia Department of Labour and Advanced Education. (2013). A workplace safety strategy for Nova Scotians, 2013-2017.
- Workers Compensation Board of Nova Scotia. (2015). 30 NS CEOs sign groundbreaking health & safety charter. *Safety Matters Blog*. Retrieved Jul. 18, 2016, from <http://worksafeforlife.ca/Home/About-Us/Safety-Matters-Blog/PostId/188/30-ns-ceos-sign-groundbreaking-health-safety-charter>
- Workers' Compensation Board of Nova Scotia. (2016). Injury Statistics by Injury Type. Retrieved July. 18, 2016, from <http://worksafeforlife.ca/Home/Getting-Started/Injury-Statistics/Industry-Type>
- Worksafe Alberta. (n.d.). No Unsafe Lift Workbook.
- Worksafe Alberta, & Government of Alberta. (2011). *Overview of Best Practices in Occupational Health and Safety in the Healthcare Industry* Retrieved from https://work.alberta.ca/documents/WHS-PUB_bp009.pdf
- Worksafe Victoria. (2006). *Working Safely in Community Services* Retrieved from https://www.worksafe.vic.gov.au/_data/assets/pdf_file/0006/9528/Working_Safely_in_Community_Services.pdf
- WorksafeBC. (2015). *2015 High Risk Strategy: Healthcare* Retrieved from <https://www.worksafebc.com/en/resources/health-safety/books-guides/2015-high-risk-strategy-for-health-care>
- Yassi, A., & Hancock, T. (2005). Patient safety--worker safety: building a culture of safety to improve healthcare worker and patient well-being. *Healthc Q, 8 Spec No*, 32-38.
- Zhang, Y., Flum, M., Kotejoshyer, R., Fleishman, J., Henning, R., & Punnett, L. (2016). Workplace Participatory Occupational Health/Health Promotion Program. *Journal of gerontological nursing*, 42(6), 34-42 39p. doi: 10.3928/00989134-20160308-03

