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Briefs

Submission to the WCB: BCFED response to PPRD Discussion Paper and Recommendations for ASTD Policy Changes

See a pdf of the complete submission here.

And see here for our letter to the WCB with an overview of worker advocates on workers' compensation policy Activity-Related Soft Tissue Disorders (ASTDs) consultation.

The BC Federation of Labour

The Federation represents more than 500,000 members of our affiliated unions, from more than 1,100 locals working in every aspect of the BC economy. The Federation is recognized by the Workers' Compensation Board (the "Board" the "WCB") and the government as a major stakeholder in advocating for the health and safety of all workers in BC and full compensation for injured workers.

Janet Patterson

Janet Patterson is a retired lawyer who has worked in the compensation field for many years.? Prior to her retirement, she was an Appeal Commissioner in the Appeal Division and a Vice Chair at WCAT.? In 2005, she joined the law firm of Rush, Crane Guenther where she represented injured workers in compensation matters. In 2019, she was appointed by the Minister of Labour to review

aspects of the compensation system and in the Review, she researched key issues, conducted public hearings around the province and reviewed hundreds of submissions from stakeholders.? Her?report, New Directions, was issued in August 2020.

Submission

This submission is made to the Policy, Regulation and Research Department ("PPRD") of the Workers' Compensation Board of BC ("WCB," "Board") in response to their public consultation about compensation policy on Activity-Related soft Tissue Disorders of the Limbs (ASTDs) in the *Rehabilitation Services and Claims Manual, Volume II* (RSCMII).

For its consultation, the PPRD issued a Discussion Paper, dated April 26, 2024. The Discussion Paper describes two options: Option 1 – keep the Status Quo, and Option 2 – amend ASTD policy as set out Appendix B. The Appendix B appendments are based on research summarized in Appendix A regarding Shoulder, Elbow, Tendon Disorders of the Hand and Wrist, Hand-Arm Vibrations, Carpel Tunnel Syndrome and Knee Bursitis & Plantar Fasciitis.

This submission has three parts:

1. Problems with the Discussion Paper's Methodology as a basis for the policy;
2. Current Barriers and Problems with Options 1 and 2; and
3. Recommendations for Policy Changes.

Part I: The Discussion Paper and Systemic literature reviews: A flawed methodology

The Discussion Paper states that the PPRD review of ASTD policy was in response to two recommendations in the Petrie Report, *Restoring the Balance: A Worker-Centered Approach to Workers' Compensation Policy* [1]. The two Petrie recommendations were:

> **#36.** *To ensure that relevant risk factors in the workplace are fully considered in the adjudication of ASTD claims, I recommend that the Board of Directors consider an amendment*

to policy #27.00 that the use of relevant risk analysis data from the workplace be considered in the adjudication of these claims.

#37. *I recommend the Board of Directors consider developing an ASTD policy specific to the risk factors consistent with the ergonomic requirements in the Regulation and guidelines.*

The PPRD considered these two recommendations – essentially to harmonize the risk factors in compensation policy with those identified in the regulation - but rejected them because (in their view) prevention and compensation have two different lenses and mandates.[2] Instead, the PPRD commissioned several systemic literature reviews "to evaluate whether work-related physical and psychosocial exposures cause certain ASTDs".

Attached are two expert reports by Dr. Dan Robinson of Robinson Ergonomics who identifies this approach as a flawed methodology for developing compensation policy.[3]

Dr. Robinson's qualifications and experience are included in his first report of August 10, 2023 ("Robinson Report"), which addressed an earlier version of the Discussion Paper. Dr. Robinson added an Addendum, dated April 3, 2024, to address the current Discussion Paper ("Robinson Addendum").

The importance of Dr. Robinson's Report and Addendum cannot be overstated. As a highly qualified ergonomist, and an expert in the research in this field, he is uniquely qualified to comment on the Discussion Paper's approach. His opinion on this methodology can be briefly summarized as follows:

1. The reliance on epidemiological data to determine the likelihood of work-relatedness is flawed when adjudicating the work-relatedness of an individual's claim. This is because the lack of epidemiological evidence does not diminish the relevance of work-related risk factors in the determination of biological plausibility for individual injury causation.
2. a. A strong epidemiological association between risk factors and an ASTD, or between occupation and an ASTD, is indicative that occupational risk factors are likely to be relevant for an individual claim but still requires an individual assessment of those risk factors for the

specific work scenario.

b. A weak epidemiological association between risk factors and an ASTD, or lack of evidence of an association within epidemiological research, does not indicate that risk factors are likely to be irrelevant. In both cases, the same assessment of risk factors in the workplace is warranted. (Robinson Report, p. 4)

2. The conclusions of the Systematic Review may be misinterpreted as indicating a lack of association between occupational risk factors and ASTDs. This is not what the Systematic Review found**.**

The Research Snapshot more accurately represents the key findings of the Systematic Review and the primary conclusion that "WorkSafeBC cannot conclude that exposures do not play a causal role in the development of the assessed ASTDs." This promotes consideration of occupational risk factors and biological plausibility that exposure could lead to an ASTD. The evidence does not support a conclusion that occupational risk factors are trivial. (Robinson Report, p. 2-3)

This submission does not rely on systemic literature reviews, for the reasons provided by Dr. Robinson. Rather, it refers to effective ergonomic and compensation practices in other jurisdictions[4] and to well-accepted ergonomic practices in BC.

Part II: Current barriers and problems with Options 1 and 2

I.What is the Injury?

Background

In the past, clinicians struggled with a group of disorders of tendons, joints, nerves and muscles in the upper extremities, neck, and back. One occupational medicine specialist explained that the term – "repetitive strain injury" – was not a diagnosis but an umbrella term referring to common disorders, not all of which had distinct International Classification of Diseases ("ICD") codes; conversely more than 165 ICD codes were being used for Repetitive Strain Injuries ("RSI")[5].

Eventually, most of RSI conditions came to be referred to as “musculoskeletal disorders” or MSDs, described as including:

> *…a wide range of inflammatory and degenerative conditions affecting the muscles, tendons, ligaments, joints, peripheral nerves and supporting blood vessels. These include clinical syndromes such a tendon inflammations and related conditions (tenosynovitis, epicondylitis, bursitis), nerve compression disorders (carpel tunnel syndrome, sciatica) and osteoarthritis, as well as less well standardized conditions such as myalgia, low back pain and other regional pain syndromes…Body regions most commonly involved are the low back, neck, shoulder, forearm, and hand….**[6]***

The imprecision in diagnostic coding systems was particularly highlighted as work-related RSI type injuries began to increase in the late 1980s and 1990s. In Ontario, the number of RSI compensation claims in 1991 was nearly double those in 1986 and these trends were reflected in reports from compensation systems in the US, Europe, Japan, and Australia. While some of this increase was due to better reporting, it also correlated to work practices which were becoming more segmented, repetitious, and fast-paced.

These types of disorders can be multi-factor so in the early days there was debate about the causative role of work activities. By 2004, it became clear that preventive measures in the workplace seemed very effective in preventing, managing, and treating these conditions.

> *Thus, there is an international near-consensus that musculoskeletal disorders are causally related to occupational ergonomic stressors, such as repetitive and stereotyped motions, forceful exertions, non-neutral postures, vibration, and combinations of these exposures. A number of government and non-governmental agencies have codified this evidence in the form of ergonomics rules designed to prevent work-related MSDs, among them the American Conference of Governmental Industrial Hygienists (1999+); the European Agency for Safety and Health at Work, EU (1999); the SALTSA Join Programme for Working Life Research in Europe (2000); and the Washington State Department of Labor and Industries (2000). A sizable proportion of MSDs among exposed workers are preventable, and protective action is*

both warranted and necessary.[7]

Most conditions in this group of gradual onset disorders are referred to by medical professionals as musculoskeletal injuries (“MSIs”), musculoskeletal disorders (“MSDs”) or repetitive strain injuries (“RSIs”) or through an individual diagnosis, e.g., tendonitis, bursitis, carpel tunnel syndrome (“CTS”), epicondylitis, etc.). In the 1990s, the BC compensation system was engaged in a multi-year, multi-stakeholder review of the *Occupational Health and Safety Regulations* and enacted the ergonomic prevention regulations, using the terms MSIs or MSDs.

BC compensation policy had, by then, adopted the term “Activity Related Soft-Tissue Disorder” or “ASTD.” ASTD is a term of Board art. It does not correlate with medical terminology, and it is largely unknown to medical practitioners. It is not a diagnosis. In the 1990s, there was extensive ergonomic training of case managers and the development of a detailed ASTD reference guide in 1996 [archived in 2004 but still available on the Board website].

In 2002, BC implemented policies and practices which imposed significant barriers to recognizing these ASTD injuries as work-related (explained below). This restrictive approach was out of sync with BC’s ergonomic regulations and guidelines and resulted in the distinct denial profile for these types of injuries, noted in the *New Directions* report.[8]

- For the period 2015-2019, the Board’s initial acceptance rate for ASTD injuries was usually below 50%, well below the general acceptance rate of about 90%.
- There was a dramatic difference in the acceptance rate of ASTDs by gender. About 60% of men had their ASTD claims accepted compared to just over 35% of women.
- It is highly likely that the gender divide in accepted ASTD claim reflects the Board’s firm view that repetition alone in extensive computer work cannot cause ASTDs. Many more women than men are engaged in this type of work. In 2018, less than 2% of accepted ASTD claims were from computer use – 23 claims out of over 5,000.
- Statistics for the period 2015-2019 show that ASTD appeals were largely unsuccessful[9]. At the Review Division, almost 84% were upheld (16% success rate); at WCAT, about 60% were upheld (40% success rate). Almost all ASTD appeals are by workers.

The Canadian Centre for Occupational Health and Safety ("CCOHS") identifies these type of injuries as "Work-related Musculoskeletal Disorders" ("WMSDs"). Their research shows that WMSDs happen to a variety of workers from all types of industries and while doing ordinary movements which are not particularly harmful – gripping holding, typing, clenching, etc. What makes these activities hazardous in work situations is the continual repetition of the movements although there may be other contributing factors as well (awkward postures, force, fast pace, lack of breaks, etc.).

The CCOHS publication - *Work-related Musculoskeletal Disorders* – reviews the types of WMSDs (muscle, tendon, and nerves) and how these parts of the body become injured by certain gradual or repetitive motions.[10]

The medical field also increasingly recognizes MSDs and promotes "transformational change" in this area. [11] In Canada, these developments have been embraced and implemented in Ontario, including by the Ontario Ministry of Labour and the Ontario compensation board.[12] To some extent, compensation policy in BC has acknowledged some medical changes. For example, earlier versions of ASTD policy recognized **"tendonitis**" (which is an inflammatory disease) as an ASTD but did not recognize **"tendinosis**" (which is not inflammatory and which is caused by repeated microtraumas, which fail to heal). The amended policy now recognizes **"tendinopathy,"** a term which encompasses both tendon conditions. However, the policy still imposes significant barriers to recognizing most WMSDs (as discussed below) and does not harmonize or integrate with the prevention of these preventable injuries.

An important starting point for sound policy is to recognize the nature of the injury itself. Gradual onset soft-tissue injuries are now well-recognized in other jurisdictions and in the medical field. The use of anything but the standardized medical and ergonomic terms for the injury itself is unnecessary, confusing and a potential barrier to integration with prevention and diagnosis.

It is also important to note that the current ASTD policy also leaves other body parts, also affected by these injuries, unaddressed.[13]

Part III: Recommendations for policy changes

Recommendation #1:

That the term "ASTD" be removed and replaced by the term "musculoskeletal disorder" ("MSD") or "work-related musculoskeletal disorder" ("WMSD") in compensation policy to harmonize the term with accepted medical, ergonomic and prevention practices.

Recommendation #2:

That the term MSD not be confined in policy to the limbs but include soft tissue injuries of the neck and back, consistent with MSIs in the Regulation.

Identification and measurement of risk factors

In ergonomic assessments, there are two separate issues:

- The identification of potentially relevant risk factors for a particular ASTD/MSD (based on biological plausibility); and
- The measurement of each relevant risk factor in a particular case.

However, in this ASTD policy review, these two issues must be addressed together. This is because the Board consistently uses pre-determined risk factor thresholds to exclude biologically plausible risk factors as relevant to individual ASTD cases.

This approach, not spelled out in policy, is deeply entrenched in the applicable Practice Directive – PD #C4-2 *Activity-Related Soft Tissue Disorder ("ASTD") Claim* ("C4-2") and its Appendix (which sets measurement standards for risk factors). Historically, the Board, and some appeal panels, engage in a "hard application" of the C4-2 measurements, using them as pre-conditions or thresholds, which a risk factor was required to meet before it was a relevant factor at all.

This approach and practice was fully criticized in WCAT 2011-002371, a case now cited in WCAT training materials. The 2011 WCAT panel reasoned that, **in effect, this approach imported the preconditions in Schedule 1 into the risk factor analysis,** whereas a lesser standard was clearly intended by the Act. WCAT #2015-01667 followed this lead and found that this use of C4-2 standards was unreasonable and unfair. C4-2 was slightly amended in 2020 but while the (non-binding), C4-2

guidelines advise against this practice, the application of the C4-2 measurements remain substantially unchanged.

This practice of using the C4-2 thresholds as a pre-condition is particularly egregious because the C4-2 thresholds are higher than those in in the *Occupational Health and Safety Regulation* (OHSR). [14] Yet the Board and the appeal bodies resist giving any weight to the Regulation thresholds in compensation claims. It is striking how the definitions, measurement and weight given to identified risk factors for the same MSDs are quite different in the two contexts.

Dr. Robinson makes a strong case that "**biological plausibility**" should be the basis for identifying relevant occupational risk factors within a single claim. This standard should be applied based on the well-understood biomechanics and functional anatomy and should not be superseded by weakness of association or lack of epidemiological evidence for causation, which is primarily an issue of weak research.

This approach would clarify and simplify the identification of occupational risk factors in individual claim adjudication.

Recommendation #3

That compensation policy states that occupational risk factors must be biologically plausible and of causative significance for the individual and for the particular ASTD/MSD at issue.

There is also no rationale for having separate thresholds for measuring risk factors between compensation policy and the Regulation. While the two areas of WorkSafeBC have different purposes, the injuries and the mechanism of injury under scrutiny remain the same and the CRP recommendations - to integrate and harmonize with the risk factors - should be accepted.

Also, the scientific basis for the OHSR was the final result of a multi-year, multi-stakeholder regulation review and it is based on the 1997 National Institute of Occupational Safety and Health (NIOSH) scientific review of MSIs.[15] They are also subject to a rigid review process. Given this, where thresholds are needed in a compensation claim, the thresholds in the Regulation should apply and be

referenced in policy.

Recommendation #4

*That compensation policy should harmonize and/or integrate the risk factors for ASTDs/MSDs as identified in the Regulation.**[16]***

Single Risk Factor: The ongoing issue of computer injuries and gender bias

Appendix B recommends the following addition to compensation policy:

However, for some ASTDs and under certain conditions, a single risk factor may be of causative significance if the exposure to that risk factor is of a particularly high degree of intensity, magnitude or duration. (Appendix B, page 6)

This is a positive change, although C4-2 measurements are already set as “single risk” factor thresholds, which may be lower in the presence of multiple risk factors. However, this amendment is not sufficient to address the substantial barriers that are located in this area of a “single risk factor” and its application to computer work. The significant gap in accepted claims from computer-related injuries vs. other types of injuries, and the attached gender gap, is complex and needs significant policy attention and a GBA+ lens. To refer again to the *New Directions* report,[17]

- There was a dramatic difference in the overall acceptance rate of ASTDs by gender. About 60% of men had their ASTD claims accepted compared to just over 35% of women.
- In 2018, less than 2% of accepted ASTD claims were from computer use – 23 claims out of over 5,000. It is highly likely that the gender divide in accepted ASTD claims is partially a result of the Board’s view that computer work cannot cause ASTDs. Many more women than men are engaged in this type of work.

Dr. Robinson identifies certain practices in the ergonomic assessment of computer work, and how these practices create an almost insurmountable barrier to the acceptance of computer-related injuries. These barriers, in turn, contribute greatly to the gender gap in accepted claims.

He states that there are two main problems in the Board's evaluations of computer work [18] - incorrect repetition thresholds in C4-2 and inaccurate risk factor evaluations from job site visits. The problems are highly specific and may be summarized as follows:

- In the Practice Directive C4-2, the stated repetition threshold is an incorrect interpretation of the research and leads to an inadequate evaluation of repetitive finger movements as a single risk factor. This primarily affects ASTD claims from computer work. C4-2 sets a repetition threshold of 200 movements/finger (100 keystrokes/finger) for more than four hours, whereas research indicates that this rate should refer to 200 movements/minute over all eight fingers or 25/minute per finger (it does not include the thumb).
- Risk factors other than finger repetition are frequently not recognized, including awkward postures of the wrist, repetitive wrist movements, and awkward postures. For just one example, in *Rutter v. WCAT* 2015 BCSC 862, a judicial review of WCAT 2013-03319 the court found that WCAT had narrowed its work-related risk assessment to one factor – repetition (imposing a higher standard of causation than was provided for by policy) and did not consider other factors involving the shoulder.

Given the dramatic denial rate for computer injuries and the unsupportable ergonomic practices used to assess computer work, we submit that compensation policy should specify that many risk factors can be involved in a computer-related injury and clarify the correct way to measure the risk factor of repetition. This is particularly important to bring a GBA+ lens to ASTD policy.

Recommendation #5

That compensation policy clarify the several risk factors for computer work and to set out how to appropriately measure the risk factor of the repetition in this work.

Weighing risk factors and GBA+ analysis

The barriers to the accurate assessment of computer-related injuries are not the only source of gender bias in ASTD adjudication. There is deep bias in how risk factors are weighed.

The “causative significance” test is now clearly stated in the proposed amendments to Appendix B and this is a welcome addition. However, even with a clarified legal standard and well-defined risk factors, there is still an issue of how to weigh occupational risk factors with non-occupational risk factors within the burden of proof required by section 339 of the *Workers Compensation Act*.

In practice, there is significant unpredictability and variance in the weighing of risk factors.

One approach was offered in a WCAT decision - 2016 WCAT A16024. In that case, the panel identified the general factors for and against work causation, without preconditions or thresholds, and then posited two “theories” about how the factors could have interacted to cause the ASTD. The panel found that their task was to determine which “theory” of causation was “as likely as not” (with any tie going to the worker - section 339) and to the “modest” causation standard of causative significance. In my view, this “theory of the cause” approach to weighing risk factors is the one most aligned with the original “common sense” approach used for this common work injures. Because this approach was quoted in subsequent WCAT decisions and in WCAT training materials, I have set out the panel’s reasoning in detail below:

> *[25] As I am often driven to do in cases like this where it is easy to lose sight of the larger picture in the minutiae of calculating angles, planes of movement and cycles of time, I have considered the alternative ‘theory of the case’ and the one that, of necessity, underlies the two decisions before me.*
>
> *[26] This postulates that the worker goes to work for the first time in a manufacturing facility where the work is unfamiliar and bilaterally hand intensive. She is working 8 hours a day making pasta and washing dishes. She develops pain in her hands immediately which worsens over the next 13 working days. In the last 5 days, the employer is filling a large order and all the affected employees, including the worker are busier than usual. Spontaneously and unrelated to the kind of employment or the unaccustomed nature of the work, the worker develops bilateral tendonitis. The timing, the location of the symptoms and the nature of the disorder is completely coincidental. This, I find is the less tenable or credible explanation for the onset and development of the worker’s symptoms.*

> *[27] The causation standard is modest. The contribution of the work activities to the condition needs to be more than trivial. Dr. Ross has provided an opinion that the work the worker was doing was capable of stressing the tissues in the affected area and causing the condition. This opinion coupled with the facts, leads me to conclude that it is at least as likely as not that the worker's unaccustomed and repetitive employment activities in the two and half weeks she was working in this manufacturing facility were causatively significant in the development of her bilateral tendonitis.*

While this approach is reasonable, there is still wild unpredictability in this area, and the process of weighing risk factors needs to be more fully addressed in the policy itself.

But policy must also address the significant gender discrimination and bias that is involved in weighing non-occupational risk factors, which substantially contribute to the gender gap in accepted ASTD claims. Dr. Robinson sets out the mechanism by which systemic discrimination is embedded in ASTD adjudicative under the current and proposed policy. He states:

> *In my experience, there has also been denial of claims based on an assumption that being female and over 40 years of age presents a greater level of risk for certain ASTDs than the identifiable risk factors in the workplace. As such, the claim is denied. The proposed policy change in C27.10, that "all relevant individual characteristics must be considered" **[19]**has the potential to work counter to the intent of gender equity in the adjudication of claims if being female and over 40 is interpreted as more significant than repetitive or forceful awkward should postures for shoulder tendinopathies, for example.**[20]***

Dr. Robinson offers the opinion that with the additional description of "causative significance" in the policy, as proposed in Appendix B, there is actually no longer a need to interpret the relative balance between occupational and non-occupational risk factors.[21] He states that the addition of the "causative significance" standard

> *… eliminates the need to interpret the relative balance between occupational and non-occupational risk factors. When occupational risk factors are present in a non-trivial manner,*

this presents causative significance even if there are other non-occupational risk factors. In my opinion, this could result in greater gender equity in claims acceptance.

In our view, this is the better approach, leading to simpler and more consistent adjudication in ASTD/MSD adjudication. It also charts a firmer path to removing embedded discriminatory attitudes and promoting gender equity.

Recommendation #6

That compensation policy state that while considering the "causative significance" of occupational risk factors, there does not have to be a weighing of non-occupational risk factors. The focus of the assessment is on whether the work activity was of causative significance for the worker's particular ASTD/MSD.

The cost of inadequate ergonomic assessments - Reversing the onus of proof

Another significant barrier for injured workers arises from the Board's ergonomic assessment practices. Standards for these assessments should be addressed in compensation policy.

The Board's current practice is to have a Case Manager ("CM") conduct an ergonomic assessment of the worker's workplace and work activities. In the last two decades, CMs are given minimal ergonomic training and typically conduct inadequate or poor to very poor ergonomic assessments, an approach compounded when a Board Medical Advisor bases an opinion on this assessment. Routinely, on appeal, Board assessments are successfully challenged by advocates when they can afford to engage the expert opinion of a professional ergonomist.

External expert opinions are accessible to only a small number of injured workers. Yet, they are necessary if the Board engages in routinely poor assessments. The courts have found that when it comes to an appeal and the worker knows why their claim was denied, there is an onus on the worker to prove their case to the tribunal. *Steadman v. WCAT* 2021 BCSC 477.

In effect, the Board's poor ergonomic practices place the burden of proving a WMSD onto the worker and effectively reverse the onus of proof. This is unfair and contrary to Policy #97.00 RSCM II which

explains there is no burden of proof on the worker.

These practices are more than “operational” decisions. They go fundamentally to the Board’s integrity as an investigative body. Routinely poor investigations and inadequate ergonomic assessments now play a key role in denying workers’ compensation and reversing the onus of proof of a work injury. This matter should be addressed in compensation policy.

Recommendation #7

That compensation policy require that all ergonomic assessments be done by professional ergonomists or by similarly qualified or highly trained individuals.

Integration of risk assessments with prevention

It is helpful to look at what an approach of integrating risk assessments between prevention and compensation might look like. The common view is that WSMDs are largely preventable injuries, and when they cannot be prevented, they can be recognized in an early stage and be interrupted and treated before they become severe or permanent. These injury events can also be used as “signals” to flag workplace hazards.

The Ontario Worker Safety and Insurance Board (“WSIB”) offers one vision. Like in other Canadian jurisdictions, musculoskeletal injuries (“MSI”) or musculoskeletal disorders (“MSD”) are considered as personal injuries with a scheduled presumption for bursitis and tenosynovitis. The three most common MSDs being Carpel Tunnel Syndrome (“CTS”), tendonitis and bursitis. [22]To address the large number of claims, WSIB has developed several specialized streams, including:

- Specific “Programs of Care” for specialized treatment for each of the most common MSDs. These programs have been developed in partnership with treating health professionals; and
- A specialized program for complex Upper Extremity MSD conditions, as one of eight “Specialty Programs” to provide fast access to expert specialists for injured workers with more complex injuries.

The Ontario government separately hosts a website “Ergonomics in the Workplace.” The website identifies different types of activities that commonly lead to MSDs such as manual material handling (in construction and industrial workplaces), client handling activities in the health care sector and working on a computer.[23]

They promote using the recognition of MSDs as an opportunity to start a “loop back” reaction to a workplace assessment. Through the MSD Prevention Guideline, employers and workers are encouraged to use MSD injuries as a “learning moment” and engage in something called “Root Cause Analysis.”

The Guidelines explain that this is an approach to understand the contributing factors in the workplace to the development of an MSD, to remove hazards and sustain change.

The Canadian Centre for Occupational Health and Safety (“CCOHS”) publishes documents outlining mechanism of injury (“MOI”) for different types of WMSD injuries, i.e., muscle, tendon, and nerve injuries and, most importantly, identifies three general stages of WMSD injuries for the purposes of intervention and treatment.

- Early Stage – symptoms disappear at night;
- Intermediate Stage – symptoms persist at night and reduce work capacity; and
- Late Stage – symptoms persist. Inability to sleep or perform light duties.

A CCOHS publication links the signs and symptoms of the onset of an WMSD at different stages to treatment and return-to-work issues in a “*Medical History Checklist: Symptoms Survey for WMSDs*. This is the type of information that would be helpful to reference in policy, and include in a Practice Directive.

Such approaches are possible with an integrated perspective. In keeping with the CPR recommendations, we submit that there should be harmonization of risk factors between compensation and prevention.

It is also submitted that ASTDs/MSDs should essentially be treated as a personal injury and they should be so designated in compensation policy. This would make BC consistent with the compensation boards in other jurisdictions and facilitate the integration with prevention efforts around MSDs.

Recommendation #8

That compensation policy for ASTD/s/MSDs be located within the personal injury sections of the RSCM II, while accommodating the presumptions in Schedule 1.[24]

It is also a concern that increasingly workers are not able to have timely access to health care providers and physicians are reluctant to provide “sick notes.” These developments, outside of the compensation system, are having an increasing impact on the ability of workers (and employers) to identify developing ASTD/MSDs and obtain early and/or preventative treatment.

With the early identification and acceptance of a developing ASTD/MSD, more treatment options are available. It would be a good use of Board resources to offer special clinics or “Programs of Care” for assessing and treating these injuries, even on a provisional basis (#96.21 RSCM II).

Conclusion

In BC, the Board’s ASTD policies have imposed many barriers to the acceptance of work-related musculoskeletal injuries as compensable work injuries. Workers must spend a lot of time or money to prove what should be simple cases.

These barriers have especially disadvantaged women and workers engaged in computer work, and we submit, the status quo embodies systemic gender bias. While some of the amendments in Appendix B improve on this situation, the amendments do not address the fundamental problems inherent in the Board’s definition of risk factors and their application within the ASTD framework for occupational disease.

The result? Unlike other jurisdictions, BC workers commonly are exposed to ongoing harm on the job and then are denied compensation for the resulting WMSDs. The statistics for these most-common-of-workplace injuries are stark, especially in comparison to other jurisdictions.

It is time that these work-related soft tissue injuries (WMSDs) were taken seriously in BC, and the impact of modern work activities on the human body be recognized. If workers are to be protected from injury in the workplace, then their work injuries must be recognized, interrupted if possible, treated and compensated.

> Encls: (see pdf attachment) Robinson Ergonomist Perspective Aug 2023; Robinson Ergonomist Perspective Addendum

[1] *Restoring the Balance: A Worker-Centered Approach to Workers' Compensation Policy* (Paul Petrie), April 25, 2018, (CPR).

[2] Discussion Paper, page 10.

[3] Dr. Robinson's reports are addressed to Mr. Jim Parker of the B.C. Nurses Union, who requested them in preparation for this policy consultation. Mr. Parker has generously shared these reports with other advocates and I acknowledge and thank him for this contribution.

[4] Most Canadian jurisdiction adjudicate MSDs as personal injuries - Discussion Paper, p. 9.

[5] *Repetitive Strain Injuries,* Dr. Annalee Yassi, Occupational Medicine, Vol. 349 – March 29, 1997. The article has a helpful, plain English summary of the common RSI disorders and the signs, symptoms, and risk factors of upper extremity conditions.

[6] *Work-related musculoskeletal disorders: the epidemiologic evidence and the debate*. L. Punnett and D. Wegman, Journal of Electromyography and Kinesiology 14 (2004) 13-23.

[7] Ibid, page 19.

[8] *New Directions,* pages 200-201.

[9] ASTD Discussion Paper (2019), page 7.

[10] In recognition of the pervasive and prevalent nature of these work injuries, the CCOHS also sponsors the “International Repetitive Strain Injury (RSI) Awareness Day on February 29th – the only “non-repetitive” day of the year.

[11] The University of Toronto has introduced a graduate program for “Collaborative Specialization in the Musculoskeletal Sciences” to conduct and coordinate research in this area.

[12] See the Centre of Research Expertise for the Prevention of Musculoskeletal Disorders (CRE-MSD) website, their MSD Prevention Guidelines which include definitions, hazards, symptoms and reporting guidance.

[13] WCAT panels accept these on a case-by-case basis.

[14] This can easily be seen by comparing thresholds in the C4-2 Appendix with those in the *MSI Risk Factor Identification Worksheet A* (“Worksheet A”) and the *MSI Risk Factor Assessment Worksheet B* (“Worksheet B”), prepared by Prevention.

[15] *Musculoskeletal Disorders and Workplace Factors: A Critical Review of Epidemiological Evidence for Work Related Musculoskeletal Disorders of the Neck, Upper Extremity, and Low Back* DHHS (NIOSH) Publication Number 97-141, July 1997.

[16] https://www.worksafebc.com/en/law-policy/occupational-health-safety/searchable-ohs-regulation/ohs-regulation/part-04-general-conditions#SectionNumber:4.46

[17] *New Directions,* pages 200-201.

[18] Robinson Report, pages 4-5

[19] This quote was based on an earlier draft policy. Appendix B now states that decisions “must take into account all of the relevant facts and circumstances relating to the case before it, including the

worker's individual characteristics." The point remains.

[20] Robinson Report, page 6.

[21] Robinson Addendum, page 2.

[22] Ontario Safety Group (OSG) is a training and research group for Ontario organizations. Their website provides UpToDate information and training resources.

[23] Workplace Safety North, https://workplacesafetynorth.ca/en has an excellent website for the prevention of MSDs with protocols for Physical Demands Analysis (PDA).

[24] As recommended in *New Directions,* Recommendation #84.