

ARE YOU HIRING YOUR NEXT INJURY?

Musculoskeletal injuries account for 25-60% of workers compensation claims across Canada. The following white paper will provide details on the benefits of developing a legally compliant Post Offer of Employment Testing Program.

White Paper

Introduction

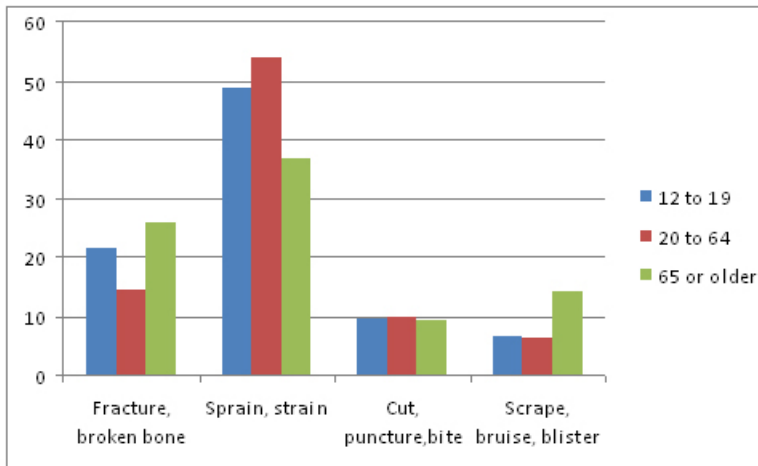
The prevalence of workers who are performing jobs beyond the level of their safe functional ability is a risk for employers and employees. The employee pool that employers draw from is representative of the greater population. With the increase in sedentary lifestyles and growing obesity issues, a more deconditioned applicant population than in years past is becoming a bigger challenge for hiring managers. For safety managers, preventing injuries of new hires and the existing workforce is critical in the overall success of the organization. The biggest opportunity to avoid new hire injuries is to hire those individuals who can demonstrate their ability to perform the job requirements.

Understanding who can perform the job tasks begins with defining the physical demands required to perform specific job tasks. Once the jobs have been measured and documented, measuring the ability of the job candidate against that job criteria and hiring those individuals who have demonstrated the specific capacity in a validated test is the first step in preventing new hire injuries. This process is a benefit to the prospective job candidate by removing them from a situation of potential job injury and is a benefit to the employer in injury prevention and claims cost reduction.

Musculoskeletal Injuries Today

In Canada, musculoskeletal disorders (MSD) account for the majority of lost time injuries, the most costly lost-time claims, and the highest lost time work days of any type of injury. Worker's compensation board data from various jurisdictions indicate that MSDs account for 25% to 62% of their total annual claims in 2011. According to Statistic Canada, 18.4% of 20-64 year olds in 2009-2010 experienced work related injuries. Of these injuries, 51% of them were related to sprains and strains, or in other words, approximately 1.9 million people in Canada in this age group experienced a MSD at work during this timeframe. A large majority of these injuries occur within the first year of tenure with an employer. A study (Breslin and Smith, 2012), examining a 10 year period in Ontario, found workers with a shorter job tenure were more at risk for an injury than those with over a year's job experience. This was particularly true for older workers, men and those in the Goods Sector.

Type of injury, by age group, household population aged 12 or older, Canada, 2009–2010



Source: Canadian Community Health Survey - Annual component. 2009–2010 combined.

What are Musculoskeletal Injuries?

MSDs are injuries and disorders that involve the musculoskeletal system. These injuries occur when a force or lift is beyond the physical capability of an individual and/or when an exertion is performed in an awkward or fixed posture or position and/or if the same body parts are used repeatedly. These three factors, force, fixed or awkward postures and frequency can lead to fatigue, tissue damage and eventually pain, discomfort and disability if not controlled/prevented or managed.

Musculoskeletal Injury Prevention - Post Offer of Employment Testing



Post Offer of Employment Testing (POET) is a program that more and more employers are initiating as a means to prevent musculoskeletal injuries in the workplace and reduce turnover. POET is defined as the measurement of an individual’s functional ability to perform the physical demands of the essential functions of the job. This test is used post offer, pre-hire, thus the test is administered following a

conditional offer of employment.

A typical assessment would involve a candidate going to a clinic where they would sign a consent form and a determination would be made if they were safe to be tested or not. The POET protocol is usually 40-60 minutes in duration and will typically include test components related to the essential job tasks such as lifting, carrying, pushing, pulling, and positional tolerance (e.g. above shoulder reaching, kneeling etc.), etc.



Benefits and Results of Post Offer of Employment Testing Programs

Injury Prevention



The most obvious benefit is prevention of injury. Job candidates who have demonstrated the ability to perform the demand requirements of the job are less likely to be injured. Testing individuals to protocol(s) that have been designed to represent the actual forces, movements and lifting requirements of an employer specific job or group of jobs will remove those candidates that are not physically able to perform these tasks in the work setting. Those that can perform the requirements are less likely to be injured.

A meta-analysis of 175 pre/post validation studies indicated a 41% reduction in workers compensation injuries (Anderson and Briggs, 2008). Another study (Scott, 2002) compared a plant that completed POET with new hires and a plant that did not. The group that received POET had an injury rate of 1% and the group that was not tested had an injury rate of 23%. Nassau (1999), found that the mean frequency of injury per 100 full time equivalents was 0.58 injuries in the POET screened employees as compared with 0.97 injuries in the unscreened population.

Reduced Claim Severity



If an injury does occur on a POET tested candidate, the severity of the claim is typically lower than those injuries that occur in populations who have not been tested. The reduction in severity is a result of their demonstrated capacity to do the demands of the job. Although they may have been injured, the injury is likely due to situational or worker practice issues rather than strength or endurance inadequacies.

A study by Harbin et al, found that the average cost of a claim was 7 times higher in both control groups in contrast to the group that completed a POET. They also found that the work-related medical costs dropped from 60% to 25% of the total school district's worker's compensation costs, a savings of \$401,982 over three years. Nassau (1999) found that the mean rate of lost work days was 0.83 days per 100 full time equivalents for the screened employees and 3.83 days for the unscreened employees. The incurred medical expense per 100 full time equivalents, for the screened employees was \$311.15, versus \$1,432.57 for the unscreened employees.

Reduction in Turn-Over

It is not uncommon to see a reduction in early turn-over in heavier jobs. Early tenure turn-over is often the result of an individual believing that they can tolerate more physical work than they actually can, or inadequate job descriptions provided to the job candidate at the time of hire may not adequately represent all of the demands of the job. Either scenario can result in early injuries or individuals quitting the job after a few days or short time on the job. The POET process reduces the likelihood of these individuals being hired and research shows that retention rates can be over three times as high for candidates that pass the POET (Anderson and Briggs, 2008).



Baseline Testing

In addition to determining which new hire candidates are suitable for the job demands, the POET test can also serve as a baseline test in situations where an employee is later injured. This

provides a snapshot of functionality at time of hire to be used during the rehabilitative process. Baseline range of motion (ROM) measures can also reduce impairment ratings through the apportionment process.

Job Satisfaction/Employee Morale



Finally, positive impact is often seen in the day to day operations. Many line supervisors and managers, as well as their workforce, have reported higher job satisfaction associated with having workers who are physically capable of performing the job. The need to cover for an individual who is in a job that they cannot physically perform is a strain on the rest of the workforce and creates tension and at times animosity toward the individual. Placement of individuals

according to their demonstrated physical abilities and the requirements of the job have lessened the burden of improper placement on both operations and human resource departments.

Cost Effective

In addition to preventing injuries, POET programs can deliver a significant return on investment. Prior to initiating a program, it is advisable for employers to examine their claims costs, determine if a POET program is needed and utilize the claims information to establish benchmarks for program evaluation. Research and experience has shown that a net return on investment is likely if an employer has injury claims involving musculoskeletal injuries. In a study completed by Harbin et al, examining shoulder injury in a school setting, they found that for every dollar spent on the program, the school district saved \$14 in work-related medical costs. Littleton found that over a three year period, for every dollar spent on the program there was a cost savings of \$18. Other programs have found returns between \$3 and \$10 in direct cost return on investment. Measuring known indirect costs adds to that savings evaluation.

Legal Defensibility

Since the POET program is part of the hiring process it is essential that provincial and federal human rights and employment equity legislation are considered when developing a POET program. How the POET program is developed and managed is crucial to reduce risk of litigation to the employer.

The Canadian Human Rights Act (CHRA), the Employment Equity Act (EEA) and the related provincial legislation define what is considered discrimination, how disability is defined, and what the employer and employee's responsibilities are. Those developing POET programs and providing on-going management need to be cognizant of these regulations and case law related to POET to ensure the program is legally compliant. Identification of essential functions and creating a validated testing protocol are extremely important. Regularly checking for adverse impact and making program changes based on changes in the workplace are among a few of the practices needed to be done on an on-going basis to ensure compliance.



Summary

Post offer of employment testing programs reduce musculoskeletal injuries, reduce claims costs, decrease turnover, and are cost effective. They also provide a baseline of the candidate's functional abilities which is useful data if they get injured in the future and having capable workers increases morale. It is important to consider the legislation that affects the development and management of the program. Employer's considering these programs should select a vendor with expertise in the area of physical demands analysis and post offer of employment testing, with an understanding of the legal compliance required in the program development and management of such a program.

About BTE Workforce Solutions

BTE Workforce Solutions provides employers with superior processes and technology that reduce injuries, minimize turnover, and lower claims costs. BTE has been providing POET testing in Canada and the United States since the late 1990's and has exceeded 100,000 tests. BTE excels in this industry through the use of its processes, technology and expertise. Some of the industries represented from BTE clients include:



- Manufacturing
- Transportation (including air and rail)
- Distribution
- Healthcare
- Energy & Utilities
- University/School systems
- Retail
- Food processing
- Postal Services

To learn more about BTE, visit us at www.btetech.com or contact Elizabeth Chapman, BTE Business Development Manager – Canada at 1-800-331-8845 X161 or echapman@btetech.com.

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