

Guest Editorial

Performing Artists, Part 2

Welcome to the second of a two-part special issue on Health and the Performing Arts. Performing arts health (PAH) as a field of research may be relatively unknown to some readers. It is my intent in this second editorial, therefore, to highlight some of the similarities and differences between this field and the field of work disability (WD), broadly construed (as in this journal) to include prevention, assessment and rehabilitation.

Readers will be familiar with the significant economic and societal burden of work-related health concerns. In 1999, the World Health Organization (WHO) estimated that occupational injury and disease globally accounted for 800,000 deaths and 38 million disability-adjusted life years (DALYs) [1]. Closer to my home, in Canada, the total direct and indirect costs of occupational injuries to the Canadian economy was estimated at \$19 billion in 2008, or \$567 per Canadian [2]. These data include only costs associated with claims that were processed. We know, of course, that many injuries and illnesses are not claimed, and in a socialized system of healthcare, those costs are considerable.

A better reflection might be obtained in looking at the data in British Columbia (BC), a Canadian province whose compensation system makes eligible all workers, including those who are self-employed (and often excluded from workers' compensation schemes). In Canada, as in many other western societies, many performing artists are self-employed; approximately 50% of musicians in North America are in this category [3]. Despite the potential increase in the number of claims and claimants when self-employed workers are included in a compensation system, the costs in BC (and in all western Canadian provinces) were considerably lower than the Canadian average. Incidentally, in 2009, dancers were the second highest injured group in the performing arts industry in BC, behind grips, who suffered injuries from being struck by rolling or falling objects and ergonomic repetitive strain injuries (RSI) [4].

Searching the PAH literature can be a challenge for the uninitiated. Since PAH crosses many disciplinary

lines, I have found the most successful strategy for compiling a comprehensive list is to use broad search terms (e.g. music*; health; injur*), and hand-sort the findings, including the reference lists of significant papers, to ensure most references will be found. This is a painstaking process, but the results are far more comprehensive than using more targeted terms. In addition, it is necessary to have access to the journal *Medical Problems of Performing Artists*. Finally, I search several databases; the most comprehensive in my experience is Scopus, but I often also include PubMed, CINAHL, Web of Knowledge, Social Sciences Citation Index, and PsychINFO, to name a few.

Injury prevalence in performing artists is quite high. Lifetime prevalence of performance-related injuries in dance ranges from 40 to 89% [6,7]; in music, from 39 to 92% [8,9]. Clearly, this reflects some methodological issues, primarily of definition, which is also the case in RSI. It also reflects great variation in response rates. Recent, rigorous studies with high response rates across a number of professional orchestras in Australia under Dr. Bronwen Ackerman (an author in issue 1) suggest that the prevalence is approximately 84% (data presented at PAMA symposium, 2011). Despite these alarming figures, consultation of health professionals in musicians is abysmally low. In recent years, elite symphonies and dance companies more frequently do have more access to specialized care; but many hours and years are spent achieving those positions. Many artists are injured by the time they achieve such status; many others never reach those elite organizations; and those who are more seriously injured may have even left the profession altogether. In discussing this article with ActSafe, this opinion was shared: "we will be successful in the performing arts when the reported injury rates increase." Under-reporting is certainly an issue in other work settings. However, those of us in PAH know that those high prevalence rates, low rates of access to compensation, and low rates of consultation with the

few health professionals with knowledge of how to approach performing artists, is a self-fulfilling prophecy that creates the high prevalence and chronicity of conditions that are seen in PAH practice.

Effective treatments for PAH problems is also a concern. Like our WD colleagues, evidence-based practice is hampered by a lack of evidence for treatments that are commonly used, let alone consistent definitions and diagnoses. How does one effectively treat work-related injuries? If you think the literature on the efficacy of treatments for lateral epicondylitis in medical transcriptionists is sparse, imagine how sparse it is for percussionists! And yet, PAH can learn much from what is well known in the WD literature. Similarities, such as the need to cope with pain in order for RTW to be successful, can be drawn upon in order to structure treatment and management. Ergonomic interventions may be helpful in reducing the need to take time off work, and may help performing artists be productive. Considering the work context more broadly, workplace intervention is advised where possible; as well, links between care providers and the workplace, and bringing stakeholders together, are important factors in RTW. In other words, PAH professionals need to be on-site, working with management and artistic directors, advising on tour schedule and facilities, and providing care where and when it is needed. Rarely, if ever, is this available in the performing arts world. In the WD literature, we learn that therapeutic return to work needs to include agreement among the parties, needs to be gradual and progressive, and the worker's work should be supplemental to 'production'. PAH professionals need to be creative in how to translate these recommendations to the studio and stage.

A significant amount of the WD literature focuses on low back injuries. This is likely because of the discrepancy in these types of injuries between physical findings and subjective experience of pain, which leads to an inability to predict workers' ability to return to work (RTW) or the cost to a system, leading to the assertion of an international epidemic of back pain [10]. However, low back pain is not the most prevalent of injuries in performing artists; many musicians complain of upper extremity injuries, and dancers suffer from injuries to the lower extremity. Both suffer from mental illness in high numbers. Both groups are deeply affected by the inability to perform, due to conditions such as performance anxiety, or depression, whether related to physical injury or not. Dancers are especially vulnerable to eating disorders, which affect 50% at some point in their careers [11]. It is also important in both PAH and

WD to consider somaticism, not in the traditional medical use of the word, with its implication of fault on the patient. Rather, it should be considered in an informed fashion, thoughtfully and rigorously weighing the implications of what we know about the influence of mental health on physical health, and vice versa. This is too often underemphasized in compensation schemes and in health professional education. Clinicians in PAH such as Dr. John Chong, medical director of the Musicians Clinics of Canada, have helped us to understand how powerful an impact early, strenuous training that emphasizes perfection can have on the developing child and future adult. Moreover, psyche and soma are deeply intertwined in the performing arts, perhaps most in dance. A significant question remains to be asked in both the PAH and WD fields: To what extent has a Cartesian approach to health, separating mind from body, limited our success in providing effective prevention and treatment of occupational injuries?

It has been postulated that the high rate of mental health concerns in PAH may be related to the strong vocational element in this type of work [12]. I would suggest that personal investment in the occupation of performing artists varies rather more than we might initially believe, and that this personal investment is reflective of the degree to which the artist's identity is defined by what they do. Not all performing artists are willing to sacrifice themselves, physically and emotionally, for the sake of art to the same degree. This tie between identity and occupation continues to be explored in the field of occupational science, the study of human occupation [13]. In that field, occupation is construed more broadly than work; it includes daily activities, such as feeding and dressing oneself, leisure, and paid and unpaid work. Occupational science has strong connections to notions of justice in relation to choice of how and when to engage in the occupations one chooses [14]. These choices, for performing artists, can support continuation in a given occupation, to the point even of potential detriment to the artist's health – at least, in the view of the health professionals who might be treating them. However, this view can change if a broad view of health is taken, such as that proposed by the Ottawa Charter, where health is defined as “a resource for everyday life, not the objective of living. Health is a positive concept emphasizing social and personal resources, as well as physical capacities” [15]. On this view, occupational choice (justice) is also an important element of health. As Dr. Rhysa Leyshon, a WD researcher and occupational therapist, stated, “consideration of the contextual factors, such

as where and how an individual needs and wants to function, play far more important roles in identifying disability and ill health than medical information alone does” [16].

Since we have been relatively unsuccessful in creating specialized training programs for healthcare practitioners (or getting said practitioners interested in PAH), and since we are in the early stages of evaluating effective treatments, many PAH professionals have called for an emphasis on prevention. As Loisel noted, at least in WD, “we know quite well what to avoid and what should be addressed by disability management, but we do not really know *how to do it* [implementation]” [17]. This is where the fields differ somewhat: training for performing artists begins quite early, for many by age 5 or younger. Normal growth and development are not aspects of the training of many teachers; in fact, many teachers in the performing arts have no formal training at all, learning from their own teachers and teaching what works and doesn’t work for them. Preliminary data I have collected on injury prevalence rates in student and professional musicians, using the same survey question, seems to suggest a dropout effect, where professional musicians seem to have lower injury prevalence rates than trainees. Given this finding, it is important to consider a second difficult question: Is the oral teaching tradition in the PAH contributing to the development of injuries? Certainly, educating educators is a worthy cause; there is a strong need for teachers to be aware of basic ergonomic principles, and a little anatomy and physiology would also be welcomed. However, as in WD, we have little evidence to demonstrate that primary prevention efforts are successful.

More knowledge is needed about the workers that surround the performing artists, too. As I alluded to in the data from BC, many technical staff as well as administrators and managers support the performing arts. Aside from statistics that such organizations might collect; which have yet to be reported in academic journals, there have been no attempts to discern the types of injuries sustained; whether claims – *if* the workers are eligible – are made for these workers; and even whether the organizations for which they work are aware of their legal responsibilities to their workers. Much work remains to be done, which will require partnerships between researchers and clinicians in WD and those in PAH, in partnership with performing artists and arts organizations. We are in the infancy of the possibilities in this fascinating field, and I encourage readers to continue to investigate these and other important questions about work, performance and health.

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