



“The zipper effect”: Exploring the interrelationship of mental toughness and self-compassion among Canadian elite women athletes

Danielle Wilson^a, Erica V. Bennett^{a,*}, Amber D. Mosewich^b, Guy E. Faulkner^a, Peter R.E. Crocker^a

^a School of Kinesiology, The University of British Columbia, 210-6081 University Blvd., Vancouver, BC, V6T 1Z1, Canada

^b Faculty of Kinesiology, Sport, and Recreation, University of Alberta, 1-105 University Hall, Van Vliet Complex, Edmonton, AB, T6G 2R3, Canada

ABSTRACT

Objectives: The purpose of this study was to explore how elite women athletes

perceived and experienced mental toughness and self-compassion and their compatibility in the pursuit of athletic success and stress management.

Method: Adopting an interpretivist constructionist approach, we conducted two semi-structured interviews with seven participants (14 interviews), aged 22 to 34. Through a thematic analysis, we identified and analyzed patterns within the data related to how the athletes experienced and perceived self-compassion and mental toughness.

Results: Three overarching themes were identified, including the role of mental toughness as critical for coping with sport-related adversity, the role of self-compassion as critical for coping with sport-related adversity, and self-compassion and mental toughness as compatible. Participants experienced mental toughness as a coping resource, which included perseverance through adversity, remaining present, maintaining perspective, and adequate competition preparation. They perceived that common humanity, mindfulness, and self-kindness were also key to coping with sport-related adversity. Finally, the women identified self-compassion and mental toughness as compatible and contextual processes. Self-compassion was critical to the development of mental toughness, and mindfulness was key to developing and maintaining both self-compassion and mental toughness.

Conclusions: The findings revealed that self-compassion and mindfulness are worthy of investigation in elite women athletes, particularly with regards to their utility in coping with sport-related adversity and in achieving a mentally tough mindset. Self-compassion and mental toughness are compatible processes that may both require mindfulness, and if used in an effective and complementary balance could create optimal mindsets for the pursuit of athletic success.

1. Introduction

Sport participation can be highly evaluative and stressful for elite women athletes (Hanin, 2010; Mosewich, Crocker, & Kowalski, 2014). Although our understanding of gender differences in coping is incomplete, there is some evidence that women deal with stress differently than men (Hanin, 2010; Kaiseler, Polman, & Nicholls, 2013). Evaluations related to performance and appearance can invoke stress and may result in fear of failure, fear of negative evaluation, body dissatisfaction, social physique anxiety, shame, and guilt (Mosewich, Kowalski, Sabiston, Sedgwick, & Tracy, 2011; Mosewich, Vangool, Kowalski, & McHugh, 2009). Additionally, the demanding and pressurized situations inherent in elite level sport make stress and resultant emotional difficulty inevitable (Sarkar & Fletcher, 2017). How athletes deal with emotional difficulties can influence their performance and overall well-being, making appropriate coping mechanisms essential for athletes, especially those at an elite level, to reach their sport-related goals (Crocker, Tamminen, & Gaudreau, 2015; Hanin, 2010). Mental toughness and self-compassion are two psychological processes that

have been receiving research attention as they both seem to help athletes cope with sport-related stressors (e.g., Connaughton, Hanton, & Jones, 2010; Gucciardi, 2017; Mosewich, Crocker, Kowalski, & DeLongis, 2013); however, their interrelationship is not well understood.

1.1. Mental toughness

Mental toughness has been identified as a critical psychological process for managing stressful high-performance demands and achieving success in elite sport (Anthony, Gucciardi, & Gordon, 2016; Connaughton et al., 2010; Gucciardi & Gordon, 2011). Mental toughness is associated with self-confidence and motivation, the ability to manage competition and training stress, and the ability to maintain and regain focus when distracted (Jones, 2002). Although much debate exists over the definition, measurement and overall conceptual clarity of mental toughness (e.g., Gucciardi, 2017) it is most commonly theorized as a set of positive attributes that allow an athlete to persevere through difficult situations to achieve goal-directed pursuits

* Corresponding author.

E-mail addresses: daniwilson17@gmail.com (D. Wilson), erica.bennett@ubc.ca (E.V. Bennett), amber.mosewich@ualberta.ca (A.D. Mosewich), guy.faulkner@ubc.ca (G.E. Faulkner), peter.crocker@ubc.ca (P.R.E. Crocker).

<https://doi.org/10.1016/j.psychsport.2018.09.006>

Received 12 April 2018; Received in revised form 24 September 2018; Accepted 24 September 2018

Available online 27 September 2018

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(Connaughton et al., 2010; Gucciardi, 2017). However, mental toughness has also been associated with less adaptive characteristics, such as harsh self-criticalness, self-judgment, and stubbornness (Andersen, 2011; Jaeschke, Sachs, & Dieffenbach, 2016).

Athletes and coaches report that the ability to cope with stress and a belief in one's ability to cope with stress are key to mental toughness (e.g., Gucciardi, Gordon, & Dimmock, 2009; Gucciardi, Hanton, Gordon, Mallett, & Temby, 2014; Levy, Nicholls, & Polman, 2012). It is unclear whether the link between mental toughness and coping is due to the use of different coping strategies, the effectiveness of certain coping strategies, or the appraisal of the stressor. However, recent findings suggest that mentally tough athletes cope more effectively because they perceive that they are capable of successfully coping with stress (Gucciardi et al., 2014; Levy et al., 2012), and report higher levels of perceived control and perceived coping ability and lower levels of perceived distress and anxiety intensity. Overall, mental toughness is highly related to effective coping in sport (e.g., Kaiseler, Polman, & Nicholls, 2009; Nicholls, Polman, Levy, & Backhouse, 2008).

1.2. Self-compassion

Self-compassion entails being kind and non-judgmental towards oneself when faced with pain, inadequacy, suffering, and failure (Neff, 2003a). Self-compassion has three components, including self-kindness, relating to oneself with an open and understanding attitude and without harsh self-criticism in the face of difficulty; common humanity, recognizing that no one is alone in their suffering; and mindfulness, objectively accepting painful thoughts and emotions without over-identification (Neff, 2003a). Some sport researchers (e.g., Ferguson, Kowalski, Mack, & Sabiston, 2014; Mosewich et al., 2013, 2011; Sutherland et al., 2014) have conceptualized self-compassion as a coping resource, suggesting that it can help in regulating emotion and cognition by buffering against the “negative effects of self-judgement, isolation, and rumination” (Neff, 2003b, p. 85). Considering the many stressors inherent in sport participation (e.g., Crocker et al., 2015; Hanin, 2010), self-compassion can enable an athlete to approach, embrace, and move forward after setbacks with a positive, balanced, and accurate perspective that is void of over-identification, isolation, and self-condemnation (Ferguson et al., 2014; Mosewich et al., 2011, 2013).

Self-compassion might be especially useful for women athletes. Women report lower levels of self-compassion, mindfulness, and perceived control over stressors than men (Neff & McGehee, 2010). In a sport context, women report more coach, teammate, and communication related stressors than men (Anshel, Sutarso, & Jubenville, 2009; Nicholls & Polman, 2007). Other stressful scenarios women athletes commonly report include poor performance, performance plateau, and injury (Mosewich et al., 2014). Women athletes also report unique stressors related to rumination, self-judgement, self-criticalness, isolation, over-identification, and evaluations based on both performance and appearance (Mosewich et al., 2009, 2011). These evaluations can invoke stress and may result in maladaptive cognitions and emotions (Mosewich et al., 2009, 2011). Furthermore, women athletes report that self-criticism and rumination are particular barriers to coping effectively (Mosewich et al., 2014).

Self-compassion might be an effective coping resource for women athletes because it can buffer against the negative evaluations and emotional difficulties they experience in sport (Ferguson et al., 2014; Ingstrup, Mosewich, & Holt, 2017; Mosewich et al., 2013; Reis et al., 2015). Self-compassion has been useful in reducing rumination, excessive self-criticism, concern over mistakes, and has been negatively related to catastrophizing and personalizing thoughts, behavioural equanimity, and negative affect in women athletes (Mosewich et al., 2009; Reis et al., 2015). Self-compassion has also been negatively related to self-conscious emotions (shame proneness and guilt-free shame proneness) and maladaptive self-evaluative thoughts and behaviours (social physique anxiety and fear of failure) (Mosewich et al., 2011), as

well as positively related to eudemonic well-being in women athletes (Ferguson et al., 2014). Self-compassion may therefore be useful for managing negative thoughts and emotions, and for promoting positive psychological functioning in women athletes.

1.3. Self-compassion and mental toughness

Self-compassion and mental toughness are conceptualized as different constructs in a sport context. Self-compassion is related to self-kindness and acceptance in the face of sport-related difficulties that is void of harsh self-criticalness and self-judgment (Mosewich et al., 2011). Conversely, mental toughness is related to a resilient pursuit of achievement striving in the face of sport-related difficulties that may be inclusive of harsh self-criticalness and self-judgment (Andersen, 2011; Gucciardi & Gordon, 2011). The discrepancy between the usefulness of self-criticism and self-judgment versus self-kindness in the pursuit of managing stress and facilitating athletic achievement suggests mental toughness and self-compassion could be incompatible in managing stressful sport encounters.

Some athletes report that being self-critical is key to their athletic success and voice concern that being overly self-compassionate might lead to complacency in their sport (Ferguson et al., 2014; Mosewich et al., 2014; Sutherland et al., 2014). Neff (2003b) would argue, however, that self-compassion encourages a desire to alleviate personal difficulties. Research has also suggested that self-compassion can help women athletes strive to reach their sport potential through proactive behaviours grounded in personal initiative and responsibility, and the desire to improve as an athlete and as a human being (Ferguson et al., 2014). While self-criticism is often essential to solve problems and allow for improvement, athletes seek a “constructive self-criticism” (Mosewich et al., 2014, p. 18), in which they learn from their mistakes without over-identification or rumination. Self-compassion might be useful in obtaining such constructive self-criticism (Mosewich et al., 2014, 2013; Neff, Kirkpatrick, & Rude, 2007).

Similarly, Andersen (2011) suggests that too much mental toughness could potentially be detrimental for athlete well-being. In terms of pain and threat appraisals, mentally tough athletes may be more likely to play through injury and less likely to seek medical support and to adhere to rehabilitation (Crust, 2007; Levy, Polman, Clough, Marchant, & Earle, 2006). Psychological well-being may be threatened for mentally tough athletes who silence emotional difficulty (Andersen, 2011). Andersen (2011) attributes mental toughness to a fantasy-like fallacy built on masculine traits that are unobtainable for most athletes. With the fear of appearing ‘soft’ or ‘weak’, athletes may attempt to adhere to unobtainable mental toughness expectations. While Andersen (2011) raises some interesting points, his claim that mental toughness and mental health are incompatible is highly debated. Gucciardi, Hanton, and Fleming (2017) point out that conceptually, mental health and mental toughness overlap in terms of positive functioning, overcoming stress and adversity, and fulfilling one's potential. While sport environments present athletes with multiple stressors and adversities that could impact mental health, an athlete's ability to overcome sport-related stressors may be dependent on their personal resources, such as those associated with mental toughness (Gucciardi et al., 2017).

Although self-compassion and mental toughness are unique constructs that may seem incompatible in a sport environment, they share similarities. Both assist in coping with sport-related difficulties (e.g., Connaughton et al., 2010; Mosewich et al., 2011). Both are used by athletes to manage stress, focus and re-focus attention, regulate thoughts and emotions, and persevere despite setbacks. Both are related to achievement striving, adaptive functioning outcomes such as positive affect, thought control, and intrinsic motivation, and with a strong desire to proactively rectify maladaptive situations (e.g., Gucciardi et al., 2014; Neff et al., 2007). The mindfulness component of self-compassion is closely related to focusing attention and concentration, two elements that are key to mental toughness. Similarly, the self-

kindness aspect of self-compassion includes an optimistic mindset and strong self-belief, which are attributes essential to mental toughness. Although the common humanity aspect of self-compassion is not a direct attribute of mental toughness, both are related to social connectedness (Kaiseler et al., 2009; Neff, 2003a, 2003b; Neff et al., 2007). Furthermore, both self-compassion and mental toughness have been theorized as sets of psychological skills that are somewhat learned and somewhat innate (Gucciardi et al., 2017; Neff, 2003a, 2003b).

Self-compassion and mental toughness share many similarities, and both may be important for elite women athletes' coping processes. However, the two processes also share a key difference that may render them incompatible. While self-compassion entails being kind, accepting and understanding towards the self, mental toughness often involves being self-judgmental and self-critical. Therefore, it is possible that athletes who use self-compassion may not have the self-critical edge needed to be considered mentally tough. It is also possible that perceptions of mental toughness and being hard on oneself could prevent an athlete from using self-compassion. Thus, the purpose of the current research was to explore elite women athletes' perceptions and experiences of self-compassion and mental toughness, and their compatibility in the pursuit of athletic achievement.

2. Method

Adopting an interpretive constructionist approach, we conducted semi-structured interviews and analyzed the data through a thematic analysis (Clarke & Braun, 2016) to explore the elite women athletes' perceptions and experiences. We adopted a relativist ontological position thereby considering reality to be multiple, contextual, and denoted by the meanings athletes attributed to their experiences of self-compassion and mental toughness (Creswell & Poth, 2017). From a constructionist epistemological approach, we acknowledged that the research process, including our interpretations of the participants' meaning-making, were shaped by our social identities, our lenses and backgrounds as researchers in sport and exercise psychology, and our personal experiences engaging in high performance sporting pursuits (Sparkes & Smith, 2014).

2.1. Participants

Ethical approval was obtained from the University's Behavioural Research Ethics board. Seven elite women athletes were purposefully sampled to take part in two semi-structured interviews (total of 14 interviews) with the goal of exploring information rich cases related to the research question (Patton, 2002). Through criterion-based sampling, we sought to speak to elite women athletes who had competed internationally at a major championship (the Olympic Games or the World Championships), and who continued to be involved in international competition. Participants were recruited through gatekeepers, including coaches, community contacts, and National Sport Institutes. The women ranged in age from 22 to 34 years ($M = 28.3$ years; $SD = 5.1$). Two participants were half pipe snowboarders and the remaining five included a swimmer, an ice skater, a downhill mountain biker, a trampolinist, and a rock climber. Each athlete had been competing in their respective sport for an average of 18.6 years.

2.2. Data collection

Participants completed a demographic questionnaire electronically and then took part in two semi-structured interviews conducted by the first author. Semi-structured interviews offered some structure yet flexibility to probe when topics in relation to the research question arose and were useful in exploring the meanings participants assigned to the complex processes of mental toughness and self-compassion (Smith & Sparkes, 2016). Eleven interviews were conducted in person in coffee shops and three interviews were conducted via Skype due to

geographical location. All participants were offered a \$20 stipend as compensation for their time and to cover travel-related costs. First time interviews ranged in length from 56 min to 1hr 35 min ($M = 1hr 7 min$), and second time interviews from 39 min to 1hr 25 min ($M = 42 min$). The two interviews with each participant were conducted approximately one month apart to allow time for the transcription and analysis of the first interview before moving onto the second. All interviews were audio recorded and transcribed verbatim by the first author.

The first interview guide questions were grounded in pre-existing literature and focused on the athletes' understanding, perceptions, and experiences with mental toughness. Topics included the meaning of mental toughness, the components of mental toughness, the role of mental toughness in athletic pursuits, personal experiences with mental toughness, and examples of other athletes who may (not) be mentally tough. To give participants the opportunity to reflect on the components of self-compassion without preconceived notions, biases, or misunderstandings (e.g., Mosewich et al., 2014; Sutherland et al., 2014), self-compassion was not formally introduced to participants or defined until the second interview, and perceptions of its components (self-kindness, common humanity, and mindfulness) were probed with questions informed by pre-existing literature. At the beginning of the second interview, participants were provided with a summary of the first author's interpretations of their experiences with mental toughness and were asked for their reflections. They were also asked to elaborate on certain topics discussed during the first interview. Self-compassion was then introduced to participants via multiple learning modalities: a video (<http://self-compassion.org/>), a handout summarizing the video content, and a verbal discussion, in an attempt to assist with understanding of the concept as some research has suggested that the construct of self-compassion can be inaccessible to some (e.g., Mosewich et al., 2013). Athletes were then asked to describe if and when they used self-compassion in their sport experience, how they perceived it in relation to sporting performance, and if and how they perceived self-compassion to be compatible with mental toughness.¹ Meeting for a second interview also provided an opportunity for rapport building and for the exploration of topics arising over time, moving beyond a drive-by-interviewing approach (Chamberlain, 2012; Smith & Sparkes, 2016).

2.3. Data analysis and quality criteria

A thematic analysis (Clarke & Braun, 2016) was conducted to identify and analyze patterns within the data related to how the athletes experienced and perceived self-compassion and mental toughness. The first author began by familiarizing herself with the data through the reading and re-reading of transcripts and reflexive note taking about meaning and potential patterns in the data. She then generated codes abductively, driven by the data as well as informed by the extant literature on mental toughness and self-compassion, highlighting data extracts in colour and making notes in the transcript margins. She did this until she perceived that the codes captured patterns of meaning as well as differing perceptions across the data set in relation to the research question. A list of coded data was generated for each participant in which the codes, their meaning, and corresponding data extracts were outlined. Thirteen "candidate themes" (Clarke & Braun, 2016, p. 110) were identified and codes were sorted into each theme accordingly and sub themes were constructed. To clarify the sorting process and to represent the relationships between different codes and themes, a thematic map was generated. Each theme was reviewed and refined so that they were congruent with the collated extracts as well as the entire data set. The candidate themes then were refined into three overarching themes. Although the overarching themes were in alignment with the research questions, they were identified based on broad patterns of

¹ The full interview guide is available from the authors upon request.

meanings across the codes. During the analysis and writing process, the first author moved back and forth flexibly and iteratively between identified themes, codes, and data excerpts, which often stimulated further exploration of the data and re-working of themes and sub-themes.

Criteria to ensure research quality included the worthiness of topic given that mental toughness and self-compassion are two psychological processes that may play an important role in how athletes cope in sport. Throughout the research process, the authors demonstrated commitment and rigour; time, care, and thoroughness in data collection and analysis and an audit trail was kept. To enhance the breadth and depth of data collection, two pilot interviews were conducted to ensure the interview questions were appropriately constructed and related to the research question. Member reflections were invited during the second interview; participants were asked to provide comments and critiques related to the researcher's interpretations of the first interview data. This created a space for discussion regarding the relevance of the findings and prompted deeper analysis and interpretation (Smith & McGannon, 2017). Co-authors acted as 'critical friends' (Smith & Sparkes, 2016) throughout the data collection, analysis, and writing up of the manuscript to encourage deep exploration and alternative interpretations of the data.

To remain cognizant of how her own personal values, preconceived notions, and decisions shaped the topic of study, data collection, analysis, and interpretations, the first author engaged in reflexive journaling throughout the research process (Sparkes & Smith, 2014). She shares here some of these reflexive thoughts:

I acknowledge that the combination of my experience as a high-performance athlete, coupled with my work as a mental performance consultant led me towards this topic of study. As an athlete, remaining positive was always part of my coping repertoire when facing emotional difficulties; however, as a competitive athlete, being hard and judgmental towards myself were common ways I would deal with setbacks. I had the tendency to ruminate over mistakes and attach personal meaning to them. I often worried about how I was being perceived as an athlete and as a person. In a consulting role, I observed that athletes often carried with them an athletic identity embodying a toughness ideal and sometimes neglected to deal with their emotions as they feared being perceived as weak. They shared the same ruminative thought patterns I experienced as an athlete and placed harsh self-criticisms and judgments on themselves. I also had the opportunity to introduce, observe, and discuss coping strategies with athletes who found self-compassion to be useful in dealing with adversity. At the same time upon reviewing the literature, I found gaps in the research that pertained to these experiences and became curious as to how elite level women athletes negotiated the tension between the effectiveness of using self-kindness versus self-criticalness in the pursuit of managing setbacks and athletic success, leading me to the topic of the proposed study, and to the framing of self-compassion and mental toughness as potential coping mechanisms in sport contexts. I also recognize that I chose to study self-compassion in part because of my spiritual beliefs and my personal values surrounding self-compassion, which I believe is central to healing and coping with adversity throughout the lifespan in and beyond the sport context.

Collectively, these experiences and reflections allowed the first author to empathize with participants and to understand the complexities and nuances of their experiences. However, she also was careful throughout the interviews, analysis, and writing process to ensure that her personal experiences did not limit the lens with which she considered the participants' perspectives, doing so by remaining open to multiple realities, by consistently challenging her preconceptions, and by discussing with co-authors challenging viewpoints and interpretations of the data.

3. Results

In this section, we present three overarching themes to describe how the athletes perceived and experienced mental toughness and self-compassion, including (1) mental toughness as critical for coping with sport-related adversity; (2) self-compassion as critical for coping with sport-related adversity; and (3) self-compassion and mental toughness as compatible.

3.1. "Falling and getting back up": Mental toughness as critical for coping with sport-related adversity

Here we focus on the participants' experiences of mental toughness as a coping resource in the face of sport-related challenges, which includes perseverance through adversity, remaining present, maintaining perspective, and adequate competition preparation.

Perseverance. The most common way in which the women experienced mental toughness was through their will to carry on despite sport-related difficulties. "Resilience" was often used to describe mental toughness, which participants defined as the ability to persevere through difficulties, to bounce back from challenges, and to manage intrusive thoughts and emotions accompanying hardship. When Morgan was asked what it meant to be a mentally tough athlete, she recounted: "Being able to overcome challenges. Sort of in the physical way of falling and getting back up ... and also getting over all the emotions". The participants' perseverance was often unrelenting and met with a certain level of stubbornness, or the drive to strive for goal achievement even when facing obstacles, explained by Jordanna:

I: What are the components or characteristics of mental toughness?

J: I'm sure lots of people who are mentally tough are stubborn. They don't get swayed out of their way very easily. I think they go hand-in-hand. I always say that in [sport type], it takes the most stubborn people to continue in that sport.

Presence. Having an ability to focus and re-focus attention in the present moment towards the self and the task at hand without being distracted by extraneous variables was another way in which participants experienced mental toughness. Morgan's best performances were met with a focus so direct that she was unaware of her surroundings:

I: Could you describe how you focus your attention and deal with distractions under pressure?

M: You get in that zone and you can't hear anything. You are so focused on that task at hand. You know what your goal is and when you set that intention, nothing is going to get in the way of you accomplishing it. At the games, [my friend] was like, "I love it when you drop in ... the crowd goes insane!" And I was like, "well they do that for everyone!" And she was like, "no!" And I didn't even know because I was so focused on the task at hand, I couldn't hear anyone else.

Perspective. The athletes' experiences of mental toughness were also underpinned by their maintenance of perspective, which meant having the ability to "see the big picture," or to approach sport-related setbacks with an attitude that was process-oriented. Deanna used perspective to regulate her emotions during difficult situations by maintaining a positive outlook grounded in gratitude for the ability to pursue her passion:

I: Could you describe how you control your emotions under pressure?

D: In [city], I had a really terrible warm up and I was obviously a bit rattled, so I closed my eyes and was going through my routine and opened my eyes and saw my family in the stands, and to see my family in the stands of 17,000 people, is not a high likelihood! It was a reminder that no matter what happened the day of, I could land on

my face or have the meet of my life and those anchors will never change, so that helped me a little bit.

Participants also took on a process-oriented perspective that valued continuous improvement, personal bests, and growth and development. Clara perceived that her shift in perspective from one that valued results to one that valued personal development may have facilitated performance outcomes:

I: Could you describe what motivates you to strive in your sport?

C: I think it's the feeling of continued personal improvement. Always trying to be better than I've been the time before. If there was ever a point where I personally wasn't improving anymore, I just wouldn't be competing anymore. So, the motivation is really from within and personal ... For me it's more about doing the best that I can and if I finish my program at a competition and I feel proud of what I did, even if I come in fourth, I'm going to be really happy.

Preparation. Preparation was also key to the women's experiences of mental toughness. They always exerted maximal effort and simulated competition settings as closely as possible, which included physical training (conditioning, skill acquisition) as well as mental training (goal setting, imagery, meditation). Jade approached training with the same focus and intensity as competition:

I: How do you work on mental toughness or how do you think athletes should work on mental toughness?

J: Treating each day as if it were a competition. Each day, you try your hardest and you do your best. If you didn't perform at your highest, why not? And take that experience and bring it into the next. Next training ask, "did you perform at your best? No? Why not?" And then take both those days and figure out how you can get to where you need to be to be able to perform on the day that counts.

Proactive endeavors, such as planning and preparing for competition, required mental toughness to endure the intensity and duration of training, and also developed mental toughness by increasing confidence and reducing anxiety. Veronica's preparation for competition involved visualization and studying the race course, which enabled her to feel focused on race day:

I: You mentioned that being focused and not letting the outside distractions get to you were important for being mentally tough. So how do you deal with those sorts of things? Do you have any techniques that you use?

V: A race where it's very busy, I'll always go somewhere quiet, close my eyes and do visualization, then after that, it's kind of like whatever time, just enjoy it. Because you've done the homework, so when you go into your race, the only thing you need to feel is that you have done what you had to do to be successful right now, so your mind is just free going into it. So, it doesn't matter if you get distractions as long as you have done what you need to get done ... I need to do my homework to be mentally tough.

To develop presence, perspective, and perseverance, participants ensured they were diligent in their preparation.

3.2. "We are all human and we all have emotions": Self-compassion as critical for coping with sport-related adversity

Here we recount how the women perceived self-compassion to be critical for coping with adversity and discuss how common humanity, mindfulness, and self-kindness were utilized to cope with difficulties.

Lack of pre-existing knowledge. While none of the athletes had previous knowledge of the definition of self-compassion, they all used self-compassion and acknowledged its importance in coping with adversity and achieving athletic success. After being introduced to the

concept of self-compassion, we asked Morgan:

I: Do you use any of the three components of self-compassion in [sport type]?

M: I use all of those! Recovering from my concussion ... I think I really hit rock bottom and I just wasn't getting better, so I was like, "okay you need to check yourself, this isn't right." I didn't know I was depressed and I was totally depressed. So, I think self-kindness was important, and to have self-compassion and to care enough about myself and my body to reach out for help was the key to my recovery.

Despite the lack of knowledge surrounding self-compassion, each athlete identified aspects of self-compassion as an important part of their coping process.

Common humanity. Participants employed common humanity to draw strength from other athletes' experiences. Common humanity normalized the process of coping with adversity in sport and reminded participants that they were not alone in their suffering. Sidney explained: "We all are humans and we all have emotions. Knowing that you are not alone in things and how you deal with things is helpful to not only move on, but to be okay with yourself". Jordanna learned from sharing experiences with other athletes:

I: Does knowing that other athletes have similar experiences as you affect how you deal with difficulty in sport?

J: There's always comfort in numbers and especially when they are willing to share their story and share tricks that they've learned about how to deal with their situations. I do believe in talking to other people about their experiences because you never know what they've learned to help better their situation.

Mindfulness. All participants used mindfulness to cope with sport-related adversity and perceived it as an important part of their athletic success. The women primarily utilized mindfulness to focus or re-focus their attention in the present moment by relating to their thoughts and emotions with understanding and objectivity. Remaining neutral and objective allowed Veronica to move forward after a setback:

I: Speaking to the mindfulness piece, how might having a non-judgmental and neutral outlook help or hinder your athletic success?

V: I always try and stay neutral towards others but also towards myself. If I'm trying to evaluate why I'm feeling a certain way and how I can help myself get back to being happy and focused and okay and confident, then I have to see, from the outside, what is making me like this and how can I overcome and not get overwhelmed with things, or what can help me calm myself back down and re-focus ... emotionally in your baggage you have to be back to neutral ... you first need to handle the first process, close the book and then deal with the other one.

Mindfulness was also important for training, competition, and during rest times. The women most often used mindfulness during training and competition to develop presence and to let thoughts and emotions pass without judgement or attachment and during rest times to re-evaluate thoughts and emotions objectively. Jade explained:

I: How do you deal with emotions after competitions?

J: I think it would be re-evaluating what happened during competition. But taking that and reflecting on what happened, instead of dwelling on what actually happened during the comp when you actually have to keep focusing on performing. There is no point in reflecting during. If something goes wrong, put it in a box, move it to the side, open the box when you are all done with the comp.

Self-checks were used by the women to promote presence and to regulate thoughts and emotions, which involved bringing awareness to

how they were feeling and directing those feelings towards ones that were functional for personal performance needs. Deanna recounted:

I: You use mindfulness in both training and competition. Would that be something that you would do before or after or during?

D: Part of my routine is doing a self-check to see where I am physically, emotionally and mentally. I know what state I need to be in and I know what things can help me get there. If I'm too tired or worked up, I don't necessarily meditate before I compete, but I am very focused on what my routine is and going through it in my head and then a lot of the other times spent doing deep breathing or pacing around to keep my legs warm.

Self-kindness. Athletes utilized self-kindness to cope with sport-related adversity in the form of positive self-talk and managing self-criticisms. Jade used self-kindness in the form of positive self-talk:

I: Do you think extending kindness towards yourself when you are in an instance of adversity, failure, or any sort of setback would be useful in a sport environment?

J: Yes. [Self-kindness] would be like self-talk, positive thinking. If you were to make a mistake and all of the sudden you go through the, "oh I can't do this, I can't do this!" And just going flip, like, "I am strong, I can do this!" Even if I haven't messed up yet, before I get [started], "I can do this, I am fast, I am speedy!"

Self-kindness enabled participants to forgive themselves for inadequacies, to relate to themselves with an accepting and understanding attitude, to re-evaluate situations, and to move forward with a positive mindset. Jordanna extended kindness to herself after adversity to foster understanding and acceptance:

I: Do you think there are any specific times when it's more important to be more self-kind or more self-critical?

J: After you have tried and put a lot of effort into one thing and then it doesn't go your way, then you probably should be a little bit more self-kind to yourself. Because you put a lot of work in and you just have to understand, it's just how the cookie crumbles and it's about learning experiences versus successes and failures.

3.3. "The zipper effect": Self-compassion and mental toughness as compatible

Here we recount participants' perceptions of the compatibility of self-compassion and mental toughness, which includes their perceptions of self-compassion and mental toughness as contextual, self-compassion as critical to the development of mental toughness, and mindfulness as key to developing and maintaining self-compassion and mental toughness.

Self-compassion and mental toughness as contextual. Participants identified mental toughness and self-compassion as compatible and integral for coping with sport-related stressors and achieving athletic success. Participants acknowledged the joint contributions of being both self-critical and self-kind; neither being more important than the other. Rather, the process of using mental toughness and self-compassion depended on the timing, the situation, and the meaning it held for each athlete. They used mental toughness during training and competition to persevere through and bounce back after difficulties, to exert and accept nothing less than maximal effort, to regulate thoughts and emotions, and to focus and re-focus attention. At the same time, they used self-compassion during taper time to cope with difficulties through reflection, acceptance, understanding, self-care, personal detachment, and re-appraisal. Sidney often used mental toughness to persevere through difficult physical pursuits and self-compassion during taper time to manage self-criticisms, prevent rumination, and enhance self-belief:

I: Are there any other final thoughts or comments you have on self-compassion or mental toughness?

S: It's important to be mentally tough, like hard training and getting through hard workouts. I can be a little bit hard on myself during the taper time where you expect everything to go smoothly. At that point you have to use self-compassion. You've already done the training and you have been mentally tough, but then you have to change your mind so you trust what you have done and believe that it has worked and you bring down the volume and start to feel better ... I'm not saying that during hard training you don't have self-compassion or even within the taper time you don't need to be mentally tough. But I think in the timing, sometimes I'll just instinctively use one more than the other.

For Morgan, the relationship between mental toughness and self-compassion was more linear; she used mental toughness for physical pursuits and subsequently employed self-compassion for emotional regulation and self-care:

I: Are there specific times or scenarios that you would prefer to use self-compassion or mental toughness?

M: I'm not going to be self-compassionate when I'm [about to compete] or if I'm trying a new trick. The self-compassion piece comes after. Mental toughness is me [in competition] and self-compassion is after, it's separating the emotion as well as taking care of yourself and your health. It's every day, it's like mental toughness and then self-compassion.

Veronica described using self-compassion to deal with adversity through managing self-criticisms, understanding and re-appraising, and mental toughness to shift back into focus:

I: Are there specific times or scenarios that you would prefer to use self-compassion or mental toughness?

V: When using self-compassion, I was actually using it for adversity. You have an [equipment problem] or you have a crash or an injury, right away you beat yourself up for it, and then you'll use self-compassion for understanding, re-evaluating what happened and then accepting it, and moving on. Mental toughness to go right back to where you want to be in terms of focus, readiness, confidence. So, they are totally related.

Morgan perceived self-compassion and mental toughness to be compatible and described their relationship as the "zipper effect", which entailed switching back and forth between an intensely focused, mentally tough mindset that used avoidance emotional regulation, and a self-compassionate mindset that fostered self-care and dealing with emotions. The timing of when she switched back and forth was key:

I: So, when you fall, there are these raw emotions that you might be feeling? How would you deal with those emotions in that scenario?

M: Your mental toughness takes over and you shake it off and you're so focused on the task at hand, you don't let your emotions get in the way of things until you have a moment to breathe ... I had a concussion so my emotions were all over the place. I got up and I was pissed off, so bad, and then I took a lap and then the next time they came up I was crying but then I knew I had to turn it on. So again, it's like the zipper effect of being mentally tough and self-compassionate, it coincides. I had three runs to do, I was being mentally tough and then I had a moment to take care of myself, and then I had to be mentally tough again.

Maintaining an effective balance between self-compassion and mental toughness involved maintaining equilibrium between being self-kind and self-critical. Deanna valued self-criticalness as it promoted continuous improvement and allowed her to reach her unrelenting self-standard, yet also valued self-kindness as it allowed her to accept,

forgive, and move forward when she did not achieve such standards:

I: Do you think that either of [self-kindness or self-criticalness] is more important or do you think that they are compatible?

D: You do need to balance both [self-kindness and self-criticalness] for what your needs are at that moment. I'm very critical of myself but for me it helps me be the athlete that I am. If I wasn't as critical, I wouldn't have that strive to be - I guess the perfectionist tendencies that have allowed me to get to the level that I'm at. But at the same time, I have had to learn to adopt that other piece, self-kindness, accepting that mistakes happen and accepting that it won't always go well, and I may not always be where I want to be.

The role of self-compassion in building mental toughness. All participants perceived that self-compassion was required for mental toughness. Through self-compassion, participants could understand, re-appraise, and move forward after facing adversity. Participants indicated that if they did not use self-compassion, they would not be able to move forward after facing adversity and thus, would not be able to shift back into a mentally tough mindset. Jordanna explained:

I: What are your thoughts on how self-compassion might be related to mental toughness?

J: I definitely think that it's [self-compassion] related [to the development of mental toughness] in the sense of - you need that compassion to keep on going, because if you're too hard on yourself and you break yourself then you're going to give up, versus, just kind of understanding or trying to understand where you went wrong at least, and then seeing it as growth. Giving yourself just enough kindness to get over the hump. Seek out corrections and move on.

For Veronica, being mentally tough required a focused and emotionally neutral mindset. To achieve this mindset, she used self-compassion to forgive herself for inadequacy, regulate emotions, and to re-appraise adversity objectively:

I: So, what are your thoughts on how self-compassion might be related to mental toughness?

V: To me mental toughness is really focus on what it is you are using mental toughness for. So, if I want to focus on my success and my performance, I need tools to get there which include focus and ... 'do what you gotta do to get there,' but you also have to make sure you are mentally happy and healthy going into it. If someone doesn't have self-compassion and they only stick into their focus mind, they might not forgive themselves for certain things and that's just not a positive outcome to keep them moving forward.

Clara perceived that self-compassion was a component of mental toughness; being strong mentally required self-awareness, self-support, self-kindness, and extending compassion towards one's thoughts and emotions. She questioned how she would be able to be mentally tough if she was not supporting herself with compassion:

I: So, what are your thoughts on how self-compassion might be related to mental toughness?

C: I think people who are mentally tough, like a piece of that would be from self-compassion. If I think about moments where I feel mentally tough, I have a positive reflection and feel compassionate towards my emotions and my feelings because without having awareness and being compassionate about myself and the situations that might be going on, how would it be possible to support myself to be strong enough mentally?

Upon further reflection, Clara explained how using self-compassionate coping mechanisms such as being kind, compassionate, and aware of one's physical, emotional, and mental states, built foundational qualities, such as resilience, that lead to mental toughness:

I: Do you have any final thoughts on how self-compassion and mental toughness might be related?

C: I'm thinking that being kind to yourself and being compassionate and being in tune with your body and how you're feeling and how situations affect you, that is what's going to build up the qualities that lead to mental toughness. By being able to be kind and compassionate to yourself, you build up resilience. This foundation of resilience allows you to be mentally tough. So, maybe in some way, through self-compassion I develop mental toughness, without even knowing it. Maybe that's been kind of like a link or a bridge that's connected.

Mindfulness as the key connector. Participants perceived that their abilities to be self-aware, neutral, objective, and present in the face of sport-related challenges were vital in fostering the effective use of both mental toughness and self-compassion. Clara conceptualized mindfulness as a key component to both self-compassion and mental toughness, and to her overall success as an athlete:

I: How do you think mindfulness relates to self-compassion and mental toughness?

C: The way I see it, it could be a triangle where mindfulness is the peak and it branches out to connect the other two [self-compassion and mental toughness]. I can't be self-compassionate if I'm not mindful about how I feel in my surroundings and what's going on. That's kind of the pillar of them. I think that they are important qualities to hone and to try to improve upon so that your setbacks are less ginormous and your success comes more frequently and you have a better understanding of what brings yourself to that ability to get in the zone ... it just seems like mindfulness is kind of one key ingredient to achieving your potential and performing at your best.

Sidney perceived that being mindful enhanced her ability to be mentally tough. Through self-awareness and presence, she could regulate her behaviour to align with her performance goals:

I: How might mindfulness relate to mental toughness?

S: I find the less mindful I am, the less mentally tough I am because my goals are a little bit more out of sight. But if I am almost strict with myself, then I'm aware of how I am acting in the present. Then the actions that follow will be aligned with how I want to be in the now.

Deanna described how she used mindfulness to approach setbacks objectively and without personal attachment, to calm her mind, and to obtain an optimal level of focus. She used mindfulness during all phases of sport engagement, including training, competition, and post-competition:

I: Could you describe when you might use mindfulness?

D: In training, learning new skills, I do a lot of breathing, a lot of visual prep-imagery preparation. Breaking down the tricks and then I guess trying to keep myself in a state of mind when I'm jumping because a lot of the times I'll be getting ready to jump and then the last second, I'm like, "[forget] it, no!" [laugh]. But eventually coming to a point where you have to trust in your body and in your capability and calm your mind, so you can push through it. And being able to look at a setback for what it is and to have this understanding that this is how life works, this happens to other people, and it's not personal. In competition, if I get nervous and especially in competitions where there's more on the line, like World's or an Olympic qualification or something like that, the ability to kind of remind yourself why you do the sport. It's all about putting yourself into a mind frame or a mental state where you are a bit more calm and you can focus on the task at hand rather than all the other extraneous things.

4. Discussion

We explored seven elite level women athletes' experiences and perceptions of self-compassion and mental toughness and their compatibility in the pursuit of stress management and athletic achievement. Key findings included the compatibility of self-compassion and mental toughness, the role of self-compassion in building mental toughness, and the role of mindfulness in using both self-compassion and mental toughness. Findings from this study are in line with current research identifying self-compassion and mental toughness as effective psychological processes for managing stressful transactions in sport (Ferguson et al., 2014; Gucciardi et al., 2009; Levy et al., 2012; Mosewich et al., 2011; Nicholls et al., 2008), and extend our knowledge surrounding how elite women athletes perceive, experience, and conceptualize self-compassion and mental toughness and their compatibility in pursuit of sport achievement.

Consistent with current literature, participants identified mental toughness as an important part of coping with sport-related stressors and achievement (e.g. Gucciardi, Hanton, & Fleming, 2017). Four interrelated categories of mental toughness were discussed by the women, including perseverance, presence, perspective, and preparation, drawing similarities to the current literature in terms of having the ability to manage competition and training stress, maintain and regain focus when distracted (Jones, 2002), persevere through difficult situations, engage in long-term goal-directed behaviour (Gucciardi et al., 2017), maintain an optimistic mindset (Gucciardi et al., 2009), and appraise adversity as necessary to athlete development (Clough, Earle, & Sewell, 2002; Kobasa, 1979). Findings extended the literature by offering unique perspectives from women athletes, suggesting that stubbornness, presence, mindfulness, gratitude, purpose, and a process-oriented attitude may be important components of mental toughness.

All participants identified stubbornness as a key component of mental toughness, which they attributed to their ability to persevere through adversity. Although similar, stubbornness is less practical than perseverance and can involve taking desperate actions regardless of foreseeable maladaptive consequences. A recent study exploring ultramarathon runners' perceptions of mental toughness also identified stubbornness as a trait of mental toughness (Jaeschke et al., 2016). Perhaps this sort of "extreme persistence" or willingness to do whatever it takes to achieve one's goals is specific to individual sport populations (Jaeschke et al., 2016, p. 248). Without the support of, or reliance on teammates, individual sport athletes may be more accustomed to taking personal initiative to push boundaries and practice extreme measures to achieve their sport-related goals. Future research might aim to unpack this notion of stubbornness with regards to mental toughness in individual versus team sport athletes.

To persevere, to gain perspective, and to engage in preparation, participants recounted the need to be present. Current mental toughness literature does not utilize the term presence. However, the literature does align with how participants described presence; namely, as having an ability to remain calm and regulate thoughts, emotions, and attention (Gucciardi et al., 2009; Gucciardi et al., 2014; Jaeschke et al., 2016). Perhaps what distinguishes findings from this study is the notion of presence and its role in mental toughness; being fully engaged and connected with the task at hand, rather than simply regulating mental processes and remaining calm. To embody this sort of presence, participants reported that they required a disciplined mind (through preparation; e.g. Kaiseler et al., 2009; Nicholls et al., 2008) as well as purpose, and inherent enjoyment for their sport.

One strategy for cultivating presence was mindfulness. Participants' ability to create presence was often enhanced by their ability to be mindful - to recognize that they were separate from their ruminative thoughts and to be able to redirect maladaptive thoughts and emotions without judgement or attachment. The abilities to remain present and mindful are likely key to mental toughness and may be factors that separate elite and non-elite athletes. Although there is increasing

interest in adopting mindfulness to enhance sport performance (i.e., Baltzell, Caraballo, Chipman, & Hayden, 2014; Gardner & Moore, 2004; Kaufman, Glass, & Arnkoff, 2009), future research might also examine the relationship between mental toughness and mindfulness. Perhaps mindfulness interventions could lead to the development of mental toughness as well as the enhancement of mental toughness and sport performance.

To sustain a perspective that valued growth and development independent of extrinsic reward or incentive and despite the adversity that is common in elite sport, athletes reported being grateful for their sporting experiences and that their sport participation had to generate meaning and purpose in their lives. This worked as a psychological buffer against sport-related difficulties. This finding builds on previous theoretical perspectives that have identified valuing growth and development, such as Kobasa's Hardiness Theory (1979) and on previous research that has associated mental toughness with harmonious passion, or an autonomous internalization of participation in sport (Gucciardi, Jackson, Hanton, & Reid, 2015). This finding also parallels Dweck's (2015) Growth Mindset, which suggests that belief in one's capability to learn will foster an attitude that values learning despite outcomes and that embraces challenges, mistakes, and feedback, thereby increasing passion, motivation, effort, and even performance.

The findings also compliment previous research identifying self-compassion as a coping resource that can buffer against the negative evaluations and emotional difficulties women experience in sport (Ferguson et al., 2014; Mosewich et al., 2013, 2011; Sutherland et al., 2014). In line with work by Allen and Leary (2010), participants used self-compassion components across various stages of the stress and adaptation process, including the appraisal of a situation, perceived coping resources, coping efforts employed, and overall coping effectiveness. While at times participants may have engendered some components of self-compassion more than others, each participant acknowledged self-compassion as critical for coping with sport-related difficulty. In addition, despite some resistance to using too much self-compassion, participants did report that self-compassion was integral to coping with sport-related difficulty and expressed desire to learn more about coping resources.

Findings from the current study add to the literature by suggesting that self-compassion and mental toughness are compatible. To the best of our knowledge, no other published studies have explored self-compassion and mental toughness together. It is not surprising that participants in the present study perceived self-compassion and mental toughness to be compatible considering the many similarities they share (e.g., both are used by athletes to manage stress, regulate thoughts and emotions, focus and re-focus attention, persevere despite setbacks) and their utility in coping with sport-related difficulty. The differences between self-compassion and mental toughness also likely contribute to their compatible use. Participants reported that there were specific times to utilize self-kindness and specific times to use self-criticalness and correspondingly, specific times to use mental toughness and specific times to use self-compassion. Which process they used was dependent on the timing, the situation, and the meaning it held for each individual.

One way to describe the relationship between self-compassion and mental toughness is through Morgan's conceptualization: "the zipper effect." Though self-compassion and mental toughness are different processes, if they are used in an effective balance, they have the potential to create optimal mind sets for coping with sport-related difficulty and achieving athletic success. While athletes reported that mental toughness was important for difficult physical pursuits, maintaining focus and persevering despite difficulty, self-compassion was equally important for self-care, re-appraisal, and moving forward after difficulty. The two processes complement each other in a way that creates a balanced perspective between the relentless, evaluative and self-critical pursuit of elite athletic achievement and relating to oneself as the object of care without self-condemnation or over-identification in

the face of sport-related difficulty. Future research might aim to unpack what an effective and complementary balance between self-compassion and mental toughness entails and its implications for coping, performance, and overall athlete well-being.

Findings suggest that self-compassion may facilitate the effectiveness of mental toughness. Using self-compassion to cope with sport-related difficulty helped participants shift into a mentally tough mindset and maintain goal directed pursuits. This is consistent with research suggesting that using self-compassion can promote perseverance towards goals and prevent giving up by enabling an individual to accept, learn, and grow from adversity rather than over-identify with it (Neff et al., 2007; Neff & McGehee, 2010). Although no previous literature suggests that self-compassion is required to utilize mental toughness, mental toughness has been associated with strategies inherent in self-compassion, such as thought, emotion, and attention regulation (e.g., Gucciardi et al., 2014).

Participants also reported that self-criticalness was key to mental toughness and athletic achievement, as long as criticisms were not maladaptive, leading to negative rumination and over-identification. This is in line with current research suggesting self-criticism is prevalent and necessary for athletic achievement, as long it is constructive in nature; if it is used as a means for reflecting and learning rather than personalizing and ruminating (Mosewich et al., 2014). However, some athletes can be destructively self-critical and harsh towards themselves in such a way that can negatively impact performance and overall well-being (Rodriguez & Ebbeck, 2015). Our findings suggest that self-compassion can act as a buffer against the negative effects of rumination and self-criticism (Mosewich et al., 2014, 2013; Neff et al., 2007) and extend the literature by suggesting that using self-compassion to manage criticisms might play a role in obtaining a mentally tough mindset.

The relationship between self-compassion and mental toughness is likely underpinned by mindfulness. Participants reported that possessing the ability to remain present, objective, neutral, unattached, and non-judgmental in the face of sport-related difficulty were vital in using both self-compassion and mental toughness. This finding complements the growing body of literature placing mindfulness as a component of self-compassion that is useful for objectively accepting painful thoughts and emotions without over-identifying with them (e.g., Neff, 2003b; Neff & Dahm, 2015). Additionally, this finding extends the literature by suggesting that mindfulness may be a component of mental toughness and may contribute to the compatibility of self-compassion and mental toughness. Gucciardi et al. (2009) suggested that mindfulness may be a component of mental toughness and prescribed mindfulness meditation as a means to develop mental toughness. The current study's findings are in line with Gucciardi and colleague's (2009) suggestion and are the first (to our knowledge) to provide evidence that mindfulness may be a component of mental toughness. Furthermore, mindfulness has been correlated with several aspects associated with mental toughness, such as increased dimensions of flow, objective and subjective measures of performance, training intensity, acceptance, non-judgmental awareness, and positive self-perceptions, and decreases in pessimism, worry, and anxiety (Gooding & Gardner, 2009; Kaufman et al., 2009; Sappington & Longshore, 2015; Scott-Hamilton, Schutte, & Brown, 2016). Considering the many correlates between mindfulness and mental toughness and the notion that one must be present, aware, objective, and non-judgmental in order to overcome adversity and shift into a mentally tough mindset, it is not surprising that mindfulness is likely a component of mental toughness. Additionally, participants reported using mindfulness during all phases of sport engagement, including before, during and after training and competition, suggesting the importance of adopting mindfulness in high-performance settings.

Methodological reflection is necessary to explicate how and why the presentation of the participants' experiences of mental toughness, self-compassion, and their compatibility in the results were reflective of the research question posed and of the conceptual categories of both

constructs. As denoted in the methods, the analysis process was rigorous and systematic in that it involved working through each transcript several times until the first author perceived that the codes were data driven and captured patterns of meaning as well as differing perceptions across the data set in relation to the research question. It was then necessary to organize the data in the results in such a way that told the full depth and breadth of how participants perceived and experienced self-compassion and mental toughness separately to then understand and explicate how they perceived them to be compatible. For example, to fully understand how the athletes experienced self-compassion, it was necessary to describe how they experienced each component (self-kindness, mindfulness, and common humanity). Similarly, to fully understand how the athletes experienced mental toughness, it was necessary to report the components participants described during the interviews (perseverance, presence, perspective, and preparation). Themes one (related to mental toughness) and two (related to self-compassion) in the results were therefore the foundation for understanding and presenting theme three (the compatibility of mental toughness and self-compassion).

A potential limitation of this study has to do with the conceptual clarity surrounding self-compassion and mental toughness. Participants had difficulty grasping the meaning of self-compassion and often reduced its meaning to one of its three components. Although the first author made concerted efforts to remind participants of all three components, at times it may have been difficult to determine if participants were eluding to self-compassion explicitly or if they were simply reflecting on an experience in which they were, for example, kind to themselves but not necessarily mindful and aware of common humanity. Participants demonstrated an aligned and profound understanding of what mental toughness meant to them yet there is no existing definition that is agreed upon by researchers and practitioners, making it difficult to determine exactly what it is, how it develops, as well as how to integrate research into practice.

Another potential limitation of this study had to do with the conceptualization of self-compassion as a coping resource. The decision to conceptualize self-compassion from a coping lens was reflective of previous research demonstrating the usefulness of self-compassion for managing difficulties women experience in sport, such as rumination and overidentification (e.g., Mosewich et al., 2014). We acknowledge that self-compassion is not limited to coping with adversity; it has the potential to promote positive emotions, goal directed behaviours, and psychological flourishing in sport (i.e., Ferguson et al., 2014; Neff, Hsieh, & Dejitterat, 2005). We may have limited our exploration of participants' experiences by not fully considering other ways in which to conceptualize self-compassion; namely, staying within the state perspective, as an attitude, an emotion, or a belief about one's self, or from a trait perspective, as a personality trait. Future research might aim to consider self-compassion from both state and trait perspectives and consider alternative positionings of the construct.

Overall, the current research demonstrates that self-compassion and mindfulness are worthy of investigating in elite women athletes, particularly with regards to their utility in coping with sport-related stressors and achieving a mentally tough mindset. Findings suggest that self-compassion and mental toughness are compatible processes that may both require mindfulness. An effective and complementary balance between self-compassion and mental toughness might create optimal mindsets for athletic pursuits.

Acknowledgements

This research was supported by a UBC Humanities and Social Sciences Research Grant awarded to Dr. Peter R. E. Crocker.

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