



# The body satisfaction and psychological well-being of retired women athletes: A long-term qualitative analysis of Bodies in Motion



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## ABSTRACT

We conducted a qualitative evaluation of Bodies in Motion (BIM), a dissonance, mindful self-compassion-based program that addresses the unique experiences and needs of female athletes with respect to their bodies and their well-being. Using semi-structured interviews, 12 collegiate female athletes (retired 2 – 6 years) reflected and provided feedback on the enduring impact of BIM on their body image, relationship to food and exercise, and overall psychological well-being. Through thematic analysis, we found that these retired athletes, extending from their initial program learning, reported increased awareness of sport and societal messages and their impact on body image, shifted perspectives in their view of themselves and their bodies, and used learned skills to manage body image in their lives. Further, with the passage of time, athletes emphasized how what they had learned in BIM remained essential as they navigated challenging life transitions, such as their retirement from collegiate sports. Our findings indicate that the benefits female athletes report accruing in the immediate aftermath of BIM remain with them, even growing and becoming more salient as they continue to reflect on the program and its impact on their body awareness and how they navigate their lives as women and former athletes.

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## 1. Introduction

Socioculturally-based theories on eating disorder (ED) etiology propose that risk is heightened through exposure to appearance-related pressures that emanate from various sources (e.g., media, social media, parents, peers; [Ata et al., 2015](#); [Thompson et al., 1999](#)). When individuals, especially women, are consistently exposed to such socially-constructed appearance ideals (e.g., flat stomach, thin waist, muscular definition, large breasts, flawless skin; [Calogero et al., 2007](#)), they can internalize them and then create a standard to which they make ongoing comparisons with their own bodies (e.g., [Polivy & Herman, 2002](#)). Because most women will perceive their bodies (and themselves) as falling short of these societal appearance ideals, they will often experience body dissatisfaction and, for some,

increased negative affect, dietary restraint, and other ED symptoms (e.g., [Puccio et al., 2016](#); [Schaefer & Thompson, 2018](#)).

Although female athletes, collegiate and elite, generally endorse a more positive body image (e.g., [Varnes et al., 2013](#)) and have lower prevalence of disordered eating behaviors (e.g., [Martinsen et al., 2010](#)) than nonathlete controls, they are considered a subpopulation with unique risks for body dissatisfaction and the development of EDs ([Bratland-Sanda & Sundgot-Borgen, 2013](#); [de Bruin, 2017](#)). For example, prevalence rates for clinical and subclinical EDs, respectively, among female collegiate athletes have ranged from 2.0 % to 6.3 % and 20.9–28.9 % ([Anderson & Petrie, 2012](#); [Greenleaf et al., 2009](#)) and body dissatisfaction has been related to higher levels of bulimic symptomatology (e.g., [Anderson et al., 2011](#)). In addition to general sociocultural pressures, women athletes are exposed to body, weight, performance, and appearance-related ideals and expectations specific to the sport environment (e.g., revealing uniforms, mandatory weigh-ins, messages from coaches about physical size; [Thompson & Sherman, 2010](#)); these sport-specific ideals also contribute to, and are perhaps more important than general sociocultural pressures in explaining, their body image concerns and ED symptoms ([Anderson et al., 2011; 2012](#); [de Bruin et al., 2011](#); [de Bruin & Oudejans, 2018](#); [Reel et al., 2013](#)). For example, in a cross-

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sectional study of over 400 female collegiate athletes, Anderson et al. (2011) found that although general sociocultural pressures were associated with the athletes' body dissatisfaction, effects were only indirect through thin-ideal internalization. However, the sport-specific pressures they experienced related directly to their body dissatisfaction and dietary restraint, and then indirectly to negative affect and bulimic symptomatology. Temporally, over a five-month sport season, sport-specific pressures predicted increases in the collegiate female athletes' body dissatisfaction even after controlling for baseline body dissatisfaction (Anderson et al., 2012). In regards to body image, elite female athletes have differentiated their bodies in daily life and in sports, identifying the latter as the key factor in the development of their EDs (de Bruin & Oudejans, 2018).

Given the theoretical framework, and empirical evidence, linking sociocultural variables (e.g., pressures, thin-ideal internalization) to the development of body image concerns and ultimately ED symptoms (e.g., Stice, 2002; Thompson & Stice, 2001), researchers have developed interventions that target these 'upstream' (i.e., antecedent) variables to improve the 'downstream' (i.e., resultant) ones. Reviews of such programs (e.g., Bar et al., 2016; Stice et al., 2019) have found that most, but not all, effective ED prevention programs are selective (i.e., targeting individuals at elevated risk for EDs), primary (i.e., intervening before negative health outcomes occur), voluntary, interactive, experiential, multi-session, gender-matched, group-based, facilitated by professionals, and grounded in cognitive dissonance theory (Festinger, 1957). Within cognitive-dissonance based interventions, participants are provided opportunities to endorse attitudes and engage in behaviors that are counter to the ideals and perspectives about beauty/appearance that they have internalized; such endorsement and engagement promote cognitive dissonance and, ultimately, reduce the strength of the maladaptive appearance schema. Although there is extensive empirical support for dissonance-based interventions, particularly for adolescent and young adult women, changes in the outcome variables (e.g., thin-ideal internalization, body satisfaction) over time, and compared to control groups, have generally been small to moderate (e.g., Stice & Shaw, 2004; Stice et al., 2019). This reality suggests that integrating other psychological strategies, such as mindfulness (Atkinson & Wade, 2015), into dissonance-based interventions may expand their effectiveness.

Although ED prevention has been extensively studied and reviewed within nonathlete samples (e.g., Pennesi & Wade, 2018; Stice et al., 2019), less has been done with athletes, particularly at the collegiate level (e.g., Abood & Black, 2000; Becker et al., 2012). For example, Becker et al. (2012) found reductions in female collegiate athletes' thin-ideal internalization ( $\eta^2 = .07$ ,  $p < .001$ ), dietary restraint ( $\eta^2 = .06$ ,  $p < .001$ ), bulimic symptomatology ( $\eta^2 = .10$ ,  $p < .001$ ), shape ( $\eta^2 = .09$ ,  $p < .001$ ) and weight concerns (i.e., body dissatisfaction;  $\eta^2 = .05$ ,  $p < .001$ ), and negative affect ( $\eta^2 = .05$ ,  $p < .001$ ) six weeks following a 3-session dissonance-based ED prevention program. Further, the reductions in bulimic symptomatology, shape concern, and negative affect were maintained at 1-year follow-up, though effect sizes were small to moderate. More recently, Stewart et al. (2019) tested the Female Athlete Body (FAB) project, an interactive, small-group, discussion-based, three-session manualized intervention for female athletes that encourages striving for the athlete-specific healthy ideal through cognitive and behavioral changes in eating, nutrition, and body image. Within this study, entire sport teams were randomly assigned to condition (i.e., FAB or waitlist control). Overall, athletes from teams who completed the FAB protocol reported significant reductions in ED pathology and other risk factors (e.g., thin-ideal internalization [ $d = -2.72$ ;  $p < .05$ ], dietary restraint [ $d = -1.34$ ,  $p < .05$ ]) through 18-month follow-up compared to those in the waitlist control. Although both studies had promising results, they also were limited by the use of within-team

groups (as opposed to mixed-sport), lower statistical power, and participant attrition (Becker et al., 2012; Stewart et al., 2019).

Addressing these limitations and incorporating recommendations from Arthur-Cameselle et al. (2017), Voelker et al. (2019) developed the Bodies in Motion (BIM) program. Through BIM, which is facilitated by extant women professionals in athletic departments (e.g., sport psychologists, sport nutritionists, athletic trainers), athletes from women's sport teams are introduced to psychological strategies, tools, and perspectives to help them respond to ubiquitous pressures (i.e., general sociocultural and sport-specific) in healthier and more functional ways, and ultimately develop a more positive and compassionate perspective toward themselves and their bodies. BIM is grounded in cognitive dissonance theory (Festinger, 1957), but also incorporates the tenets and skills of mindful self-compassion (Neff, 2003a; 2003b; Germer, 2009; see Voelker et al., 2019; 2021] for a detailed discussion of the theoretical rationale for integrating these two perspectives). Through the program, female athletes are given opportunities to actively and experientially challenge societal appearance ideals with one another, as well as body, appearance, and performance expectations that exist within the sport environment. Through the application of mindful self-compassion tools and perspectives, athletes learn how to become more present-focused and aware, nonjudgmental of their internal reactions (e.g., thoughts, feelings), and kind and compassionate towards themselves (as opposed to self-critical) when exposed to appearance ideals. BIM also incorporates the positive elements of social media, specifically providing athletes with a platform where they can support each other as they practice the strategies taught in each session, contribute content that challenges societal beauty standards and affirms their current bodies as athletes and women, and promote a culture of body acceptance that goes beyond the time spent in session (Korda & Itani, 2013).

Through a series of quantitative and qualitative studies with female athletes from nine NCAA athletic departments, Voelker et al. (2019; 2021) examined the effectiveness of BIM in improving body image and reducing ED symptoms. In their quantitative analysis, Voelker et al. (2019) found the intervention group athletes ( $N = 57$ ), but not the control athletes ( $N = 40$ ), experienced significant reductions in thin-ideal internalization through the 3–4-month follow-up (partial  $\eta^2 = .06$ ). Although non-significant, they also noted expected differences in response trajectories over time for the two groups (i.e., means in the expected directions) on body appreciation, body satisfaction, shape and weight concerns, bulimic symptomatology, and negative affect. Intervention group athletes, who represented different sports in each group, also provided written, open-ended responses regarding what they had learned from their participation and how they now saw themselves and their bodies as a result; they provided these open-ended responses immediately after completion of the program and again 3–4 months later. Data collections were conducted by a research assistant at each participating site and did not involve BIM program leaders.

Using thematic analysis with a social constructivist lens, Voelker et al. (2021) identified three overarching themes, and several sub-themes, based on the athletes' responses: (a) becoming aware (i.e., recognizing the value of body function over appearance; realizing other women can provide support; understanding beauty is socially constructed; and acknowledging the magnitude of their self-criticism); (b) changing attitudes toward themselves and their bodies (i.e., finding love, acceptance, and appreciation for themselves and their bodies; viewing their bodies as unique and beautiful; becoming more confident and comfortable with their bodies; and identifying themselves as being defined by more than their bodies); and (c) developing new skills and ways of relating to themselves (i.e., countering body negativity and practicing body-positivity; being more present and mindful; being kinder and more compassionate

toward themselves and their bodies; and suspending judgement of others' bodies while avoiding body comparison). These themes continued across the two time points. Additionally, at Time 2 (i.e., three to four month follow-up), the athletes commented on how BIM had helped them better cope with adversity and navigate life transitions (e.g., injury recovery). These data provided initial empirical support that BIM may be helpful in lessening athletes' risk through statistically significant reductions in a crucial 'upstream' variable (i.e., thin-ideal internalization), provided a foundation for future inquiry to investigate positive, but currently non-significant, findings, and offered rich descriptions of how the athletes came to view themselves and their bodies in more positive, functional ways by applying dissonance and self-compassion-based psychological strategies.

Although initial research, both quantitative and qualitative, has provided support for the effectiveness of ED prevention programming for female athletes (e.g., Becker et al., 2012; Stewart et al., 2019; Voelker et al., 2019; 2021), two main limitations exist. First, studies that have examined intervention effects over time have done so for relatively short periods (i.e., 6 weeks to 18 months), leaving the longer-term effects of such programming unknown. Given that research with nonathletes has demonstrated positive efficacy through 3-year follow-ups (Stice et al., 2019), similar longer-term considerations are needed with athlete interventions. Second, every athlete will, at some point, retire from their sport. For many, the transition out of sport will be stressful and, for female athletes, often fraught with challenges around self-worth, identity (i.e., moving from that of athlete to a new definition of self), body changes (e.g., weight gain, loss of muscularity), and new relationships to food and exercise (e.g., Barrett & Petrie, 2020; Buckley et al., 2019; Papathomas et al., 2018; Plateau et al., 2017a; 2017b; Thompson et al., 2021). Given these realities, ED prevention programming for female athletes would ideally develop perspectives and psychological skills that allow them to not only address the appearance pressures and expectations of the moment (within sport and general society), but prepare them for the shifts in body, worth, identity, and eating that are likely to occur in their transition from sports.

In our study, we examined the longer-term effects of an ED prevention program in relation to female athletes who had completed the program while active competitors and who had transitioned out of collegiate sport. Specifically, we qualitatively explored BIM participants' perceptions of the program's efficacy two to six years after their initial participation as active female collegiate athletes and after they had been retired from their sports for one to four years. We were interested in learning how the awareness, perspectives, and skills developed from the program had, or had not, informed their relationship with themselves, their bodies, food, and physical activity, and their general psychological well-being since their participation in the program and through their retirement from collegiate sports.

## 2. Method

### 2.1. Participants

Participants were 12 former NCAA Division I ( $n = 9$ ) and III ( $n = 3$ ) women collegiate athletes who had competed for six different institutions. At the time of data collection, participants had, on average, completed BIM 3.83 years ago ( $SD = 1.03$ ; range = 2–6 years) and had, on average, been retired from their sport for 2.17 years ( $SD = 1.03$ ; range = < 1–4 years). Eleven participants (91.7 %) identified as White and 1 (8.3 %) as Asian Indian. All 12 participants identified as cisgender women; 10 (83.3 %) identified as heterosexual and one (8.3 %) as bisexual; one (8.3 %) did not disclose. Five participants (41.7 %) indicated they were single, five (41.7 %) in a romantic relationship, one (8.3%) in a domestic partnership, and one (8.3 %) married; none had children. Four participants (33.3 %) reported living with their spouse/partner, two (16.7 %) with family, four (33.3 %) with a non-relative (e.g., roommate), and two (16.7 %) alone. Seven participants (58.3 %) said they were employed full-time, three (25 %) part-time, and two (16.7 %) were not currently employed and not looking for work; four (33.3 %) indicated they were currently pursuing a graduate or professional degree. While in college, they competed in rowing ( $n = 4$ ); swimming/diving ( $n = 3$ ); volleyball ( $n = 2$ ); skiing ( $n = 1$ ); cross country ( $n = 1$ ); and tennis ( $n = 1$ ). Current BMI was 24.82 kg/m<sup>2</sup> ( $SD = 4.36$ ) and age was 24.42 years ( $SD = 1.44$ ).

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### 2.2. Measures

#### 2.2.1. Demographics

Via an online survey, participants provided their age, and year of BIM participation, year of retirement, race/ethnicity, gender, sexual orientation, relationship status, living arrangement, occupational/professional status, sport, and current height and weight.

#### 2.2.2. Interviews

The interviews were conducted individually with each athlete, were semi-structured, and lasted 60–90 min (Berg, 2007). We used open-ended questions to prompt participants to reflect on, and share, their thoughts, feelings, attitudes, beliefs, and behaviors regarding their lives since completing BIM. Specifically, we asked participants about the effect of BIM on their body awareness (e.g., *Since completing the program, in what ways, if any, has BIM affected the way you have viewed your body?*), their relationship to food and exercise (e.g., *In what ways, if any, has BIM affected your relationship with food or eating? How you think about or engage in physical activity?*), and their overall psychological well-being (e.g., *In what ways, if any, have you continued to use BIM as you have moved forward in life?*). All questions were worded within this neutral frame so as to allow athletes to describe, in their own words, how the program affected these areas of their lives; it was up to the athletes to describe the effects and communicate in what ways they viewed them (e.g., positively, negatively). We also asked about specific skills/lessons that the athletes thought had been most helpful, as well as what they deemed to be less so.

### 2.3. Procedures

Following approval from our university's Institutional Review Board for Human Subjects Research, the first author placed a solicitation to be involved in this research study on the BIM for Life social media platform, which at the time included 104 former women collegiate athletes. Whenever athletes completed the BIM program at their institutions, they were invited to join a closed, private social media group to continue their interactions and connections with program participants from across the U.S. Thus, to be eligible for our study, the athletes had to have completed the BIM program at their schools, have joined the ongoing, program-specific social media platform, and have retired from collegiate sport. The retired athletes who responded to the initial solicitation were sent further information about the study, informed consent, and the online demographic questionnaire, and were provided with a unique identifier so their data could be matched to their deidentified interview responses.

The first author conducted all the interviews via an online videoconferencing application (see Reflexivity Statement below for first author background characteristics). Although all interviews were digitally recorded, recordings were deleted once transcriptions were completed and all were coded by the unique identifier; the first author thoroughly discussed participant confidentiality to encourage honest responding. To establish rapport, she began each interview

with a general inquiry and discussion of the participants' sport background and where they went to school. This exchange was followed by an invitation for each participant to ask any questions they had pertaining to the study before segueing to the interview questions. Throughout each interview, the first author asked follow-up questions to clarify, expand on, and probe further into the participants' responses and experiences (e.g., *What specific program content or experiences influenced your body image and/or related behaviors?*). Each interview ended by asking the athlete if BIM had any additional effects that were not addressed during the interview and then provided a debrief statement that included general mental health resources. Each participant received a \$50 e-gift card.

#### 2.4. Data analysis

We used reflexive thematic analysis (TA) to examine and interpret the aggregate data. This approach can be flexibly implemented from a variety of theoretical, epistemological, and ontological perspectives, and can be applied across a variety of approaches to provide a detailed and complex account of the data (Braun & Clarke, 2013; 2019; Braun et al., 2016b). Our use of reflexive TA centers the subjectivity of the researchers as essential to theme generation and knowledge production (Braun & Clarke, 2019). Specifically, we employed a social constructivist lens (i.e., realities, experiences, and knowledge are generated through social interaction and language) to examine the ways in which the participants' realities, meanings, and experiences since completing BIM derived from, and were the result of, a range of social narratives (Sparkes & Smith, 2013). Social constructivism suggests that multiple truths can and do exist, that reality is socially, culturally, and contextually constructed through human activity, and that people generate meaning together via interactions with each other and from objects in the environment (Derry, 1999; McMahon, 1997). Because beauty standards and ideals – from which general sociocultural pressures emerge – are socially constructed (Thompson et al., 1999), the social constructivist perspective allowed for consideration of the participants' contexts (e.g., sport environment), culture (i.e., personal histories related to body and body image), and social experiences with respect to their bodies in their understanding and retelling of their experiences with BIM.

From this social constructivist framework, the TA occurred primarily at the latent (i.e., versus semantic) level, in which the broader meanings, assumptions, and conceptualizations embedded in participant responses were identified and examined (Braun et al., 2016b). We conducted our TA through an iterative, comprehensive inductive and deductive process in the six phases put forth by Braun et al. (2016b) – familiarization, coding, theme development, refinement, naming, and writing. Given that Voelker et al. (2021) had conducted a qualitative analysis of BIM participants' experiences immediately following, and 3–4 months after, completing the program, we acknowledged their identified themes (e.g., Becoming Aware) when analyzing the current data.

The first author transcribed each interview verbatim into text-based (MS Word) documents, reviewed audio recordings, and subsequently edited transcripts for accuracy. Four individuals were part of the analytic team, though the process started with only the first author familiarizing herself with participant responses question by question, taking note of initial impressions and interpretive ideas. Following familiarization, the data were systemically and thoroughly coded to capture identified meanings that related to the participants' experiences and research questions. Specifically, the first author read the data closely (i.e., line by line), and tagged relevant pieces with a code (i.e., a word or short phrase that captured the salient attributes of the data). Following an open, yet systematic, coding process, multiple codes were generated before confirming a coherent, cohesive coding scheme. Deductive codes were generated for concepts related to existing literature (e.g., awareness; Voelker et al., 2021),

and inductive codes were created for new, distinct, and salient patterns in the data. Codes were subsequently transferred into a MS Excel spreadsheet and organized by question to increase opportunities for reflection on response content and process. Consistent with recommended best practices in thematic analysis (Braun et al., 2016b), she reviewed the complete data set twice during the familiarization and coding phases to ensure the identified codes were coherent and robust.

During theme development, she sorted initial codes into broader potential themes and sub-themes according to patterns of similarity and the identification of important meaning. This approach was followed for each interview question, wherein similar codes were grouped into a subtheme and related subthemes were organized into broader themes. When similarities were identified across interview questions, the themes, subthemes, and relevant codes were converged, obsolete codes were deleted, and the organization was reconfigured to reflect relevant and important understandings. At this analytic stage, a co-coder reviewed the spreadsheet containing identified codes and independently created her own thematic structure. Subsequently, this two-person analytic team engaged in face-to-face discussion over multiple iterations to reflect on and critique their interpretations (i.e., challenge any assumptions we each may have held) to identify a unified thematic structure.

Once this two-person analytic team had identified a thematic structure, two additional "critical friends" were engaged to refine the themes (Smith & McGannon, 2018). By having no prior knowledge of the data, the critical friends provided additional perspectives and insights. Through iterative, open discussions and consideration of multiple interpretive possibilities, the first author and critical friends reflected on the themes and subthemes, redefining them as necessary (e.g., coalescing similar lived experiences across participants). Once the themes had been reviewed and determined to both sufficiently capture the data and answer the research questions, they were organized into a comprehensive analytic narrative (Braun et al., 2016b).

##### 2.4.1. Reflexivity statement

The subjectivity of the researchers can influence the study being conducted, and the identity variables (e.g., race, gender) and experiences of the data analysts can impact the way research is conducted and how data are interpreted (Sparkes & Smith, 2013). For our analysis, the subjectivity of the researchers was viewed as central and, furthermore, was seen as a strength in the creative, reflexive process of being immersed in the data and making meaning from it (Braun & Clarke, 2019). All members of the analytic team self-identified as cisgender; three as women and one as a man. Three identified as White; one woman identified as Black. The researchers ranged in age from mid-20 s to late-50 s, and all had been lifelong participants in sports, from recreational to NCAA Division I levels in individual (e.g., figure skating) and team (e.g., basketball, softball, volleyball) sports. All four had training and educational backgrounds in sport psychology and counseling psychology; one was a licensed psychologist and two were doctoral-level trainees in psychology; two were Certified Mental Performance Consultants (CMPCs® Association of Applied Sport Psychology). Three had previous research experience in eating and body image concerns among women athletes. The two who served as the critical friends had extensive knowledge of the program's aims and content. Specifically, the first author identified as a White, cisgender, able-bodied, woman and a retired collegiate athlete. As an advanced doctoral student in counseling psychology, she had extensive knowledge of the BIM program, as well as training in qualitative methodology and use of the digital software through which interviews were conducted. These identities and experiences helped the researchers understand and interpret the participants' experiences. For example, as former athletes, they could relate to, or identify with, participants' relationships to food,

exercise, or body image, as both competitive and retired athletes. The diversity across race, gender, age, body type, physical activity levels among the analytic team members allowed the data to be interpreted through multiple intersectional lenses, which allowed for rich interpretations to be represented and shared during the thematic analysis process.

### 3. Results

Based on our reflexive thematic analysis, we present a profile of participants’ reflections on their experiences in BIM several years post completion and after having retired from collegiate sports. The description of our findings represents the four higher order themes: Increased Awareness, Shifting Perspectives, Application of New Skills and Ways of Relating to Myself and Others, and Reflections Over Time. Within each theme, the narrative reflects the identified sub-themes that illustrate the participants’ experience within and since completing the BIM program; we have used pseudonyms to protect the participants’ confidentiality and ensure their anonymity. See Table 1 for themes and subthemes identified post-program and at 3–4-week follow-up (Voelker et al., 2021), and in the present study.

#### 3.1. Increased awareness

The participants’ shared their increasing awareness of how societal messages related to beauty and appearance, as well as their realization that these messages, pressures, and expectations are socially constructed and communicated through various forms of

media (e.g., social media, magazines). As Jalie, a rower, explained: “BIM makes me realize that the beauty standards that are set, especially for women nowadays, are kind of unrealistic, and it’s almost impossible for everyone to fit into that category, and that’s okay.” Meg, a swimmer, added:

*I know society, a lot of the time, and in the media we see really skinny, thin women and we see that as what society wants to tell us is beauty. Society’s ideals of beauty are not necessarily what is going to allow you to excel in your respective sport in the body that you occupy.*

Participants also described an increasing awareness of how societal pressures, expectations, and standards permeate the ways in which women think and feel about themselves and their bodies, and just how ubiquitous these pressures are, as Holly, a skier, explained:

*We live in just such an excess of these messages from society about beauty and appearance. [BIM] certainly reminded me that that [media message] isn’t reality, necessarily. I think I came into the program with the awareness that society was presenting very warped ideas about beauty and appearance tied to consumerism and capitalism and misogyny, and certainly the program reinforced that awareness.*

Courtney, a diver, added:

*I just recognize how many ideas they are sending you all the time and from how many different directions. And really being able to, in the program, sit down and recognize, ‘Wait, these are competing ideals.’ So even if this one thing was possible, there’s this one over here that’s asking something totally different and you can’t reconcile those.*

In becoming aware that they were not alone in their feelings or experiences, participants’ experience in BIM taught them that there is a community of athletes (from across all sports) from whom they

**Table 1**  
Themes and Subthemes Identified at Post-program and 3–4-Month Follow-up (Voelker et al., 2021) and at 2–6-Year Follow-Up (Present Study).

Post-program	3–4-month follow-up	2–6-year follow-up
<p><b>Becoming Aware</b></p> <p>I understand that beauty is socially constructed and communicated</p> <p>I am aware of the magnitude of my self-criticism</p> <p>I am not alone and have other women to support me</p> <p>I recognize the value of body function versus appearance</p> <p><b>Changing my attitude toward myself and my body</b></p> <p>I love, accept, and appreciate myself and my body</p> <p>I am more than my body</p> <p>I view my body as unique and beautiful</p> <p>I am more confident and comfortable with my body</p> <p><b>Developing new skills and ways of relating to myself</b></p> <p>I can counter body negativity and be more body-positive</p> <p>I am more present and mindful</p> <p>I can suspend judgment of others’ bodies and avoid body comparison</p> <p>I am kinder and more compassionate toward my body and myself</p>	<p>3–4 Month Follow-Up Only</p> <p>Losing touch over time (Becoming aware)</p> <p>Changing attitudes toward food and exercise (Changing my attitude toward myself and my body)</p> <p>Advocating for a healthier body culture (Developing new skills and ways of relating to myself)</p>	<p><b>Increased Awareness</b></p> <p>Realize Beauty is Socially Constructed &amp; Communicated</p> <p>I see How Societal Pressures Are Internalized &amp; Impact How Women Think and Feel</p> <p>I Am Not Alone and There is a Community of Women</p> <p>I and My Body are Unique</p> <p>The Sport Environment Affected My View of My Body and Myself</p> <p><b>Shifting Perspectives</b></p> <p>Appreciating My Body and What it Can Do</p> <p>Moving from Self-Criticism to Self-Compassion</p> <p>Reframing Negative Thoughts and Messages about Myself and My Body</p> <p>Having More Confidence in and Comfort with My Body Size and Shape</p> <p>Mindfully Detaching from Negative Thoughts and Messages About Myself and My Body</p> <p><b>Application of New Skills and Ways of Relating to Myself and Others</b></p> <p>I Advocate for a Healthier Body Culture</p> <p>I Am More Present and Mindful</p> <p>I have a Healthier Relationship with Food and Physical Activity</p> <p>I Practice Compassion for Myself and My Body</p> <p><b>Reflections Over Time</b></p> <p>BIM Lessons Helped Me with My Transition Out of Sport</p> <p>I Have Applied BIM Lessons to Other Aspects of My Life</p> <p>I Have Learned That Change Takes Time</p> <p>Overall Positive Impact on Me and My Life</p>

\*Note: All themes identified at post-program were also identified again at 3–4-month follow-up. Only new themes identified at 3–4-month follow-up are listed in the table.

can seek support. Jenna, a volleyball player, shared: “I was also really impacted by the other girls that were there because...we had very similar feelings towards our bodies, yet we were all shaped so differently.” Meg, a swimmer, added: “It made you feel like you’re part of a community and feel more secure and more confident that a lot of other people have these problems.” Courtney, a diver, concluded:

*But I think, honestly, a lot of the value of the program wasn’t necessarily in any one activity or lesson, but just in coming together and having somewhere to talk about everything and having a language for talking about body image, because I don’t think that’s a skill set that you really learn anywhere else.*

This awareness of community was long-lasting as Jenna, a volleyball player, discussed how she kept her mindfulness stone in her wallet for several years post-program, and “every time I saw it, I just remembered the [BIM] thing and...that community. I just remember feeling so good being in that group.”

As they continued to cultivate increased awareness that their bodies and their personhood—as athletes and as women—were unique, participants challenged society’s often singular standards of beauty. Isabelle, a tennis player, reflected: “When I look back on the program, it focused so much on ‘you’re unique.’ As an athlete, there are so many components to you and you have your own strengths, you have your weaknesses. Tara, a rower, added:

*No body is the same and every body is different, and just based on what your body can do and your performance and just being a woman...and just embracing that. What I can do with [my body] is different than what another person can do with theirs, and that’s completely fine.*

Lastly, BIM helped participants realize how the sport environment negatively affected their self-esteem, confidence, and body image, and how these were related directly to their eating concerns. Jenna, a volleyball player, shared:

*Everything my coach said...was so negative, and he had such a negative view on everything my body did. He really messed up my view on my body and he made me think of my body as less than or weak because I was so small, because I was slower.*

Participants identified numerous elements of the sport environment that negatively affected them, including messages communicated by coaches and teammates, uniforms that increased feelings of self-consciousness, and procedures that focused them on their bodies (e.g., body fat measurements). Meg, a swimmer, stated:

*The big thing in my sport was that you would be put into those tiny suits and getting into a suit doesn’t feel good when you have to roll up your body and roll up your skin. It’s just a reminder, when you have to pull it up and it’s tight on you, of how much you weigh. And every single time you put it on it’s like, ‘Oh yeah, I am not super skinny enough that this would just slip on.’ But then again, you wouldn’t want it to slip on because then it’s not doing its job; it needs to be tight.*

### 3.2. Shifting perspectives

The program helped participants to not only become more aware, but also to shift their beliefs and attitudes about themselves and their bodies. These shifting perspectives included developing a more expansive appreciation of their bodies, particularly around functionality, and accepting their athletic physiques:

*[BIM] helped me realize that being an athlete and being a woman isn’t mutually exclusive. I can be both and however my body wants to be, or however I am presenting is perfectly fine. As a woman and as an athlete, you can be both. (Jenna, volleyball player).*

Alli, a rower, added: “That was a big thing: acknowledging that there’s power in your body, and there’s beauty in the power that your body can output, and just the functionality of it.” Their shifting attitudes extended to parts of their bodies that may have previously been labeled as “flaws” and intersected with a growing appreciation of themselves as women. Lindsay, a rower, added: “It’s not as stressful

*[now], I’m allowing flaws to just be there. I don’t need to be this certain standard; just be proud of what I’ve accomplished and the way I look.”*

Shifting from criticism to self-kindness was an enduring benefit from their time in the program. Christina, a diver, explained:

*Since doing [BIM], when I lose focus of how I’m feeling about myself or if I start becoming more negative, I think back to getting myself into a positive mindset and reflecting, ‘I’m having a really negative mindset, but I don’t need to be that way. I can be better and more patient with myself.’*

This shift also was seen in how participants engaged with or responded to societal messages and pressures related to body and appearance:

*I’m just ‘anti-you-have-to-have-a-certain-look.’ There’s a lot of comparison with magazines or something you see online on social media, and I was able to switch that mindset to, ‘My body looks like this because I’m an athlete and I’m strong and I’m needing this. (Lindsay, rower).*

Finally, in this move to self-kindness, they highlighted they used the mantra to which they were introduced in the program (see Neff, 2003a; 2003b). Alli, a rower, reflected:

*In terms of [BIM], what I’ve been trying to focus on lately is just being more gentle with myself. Even to this day, self-talk is so important. That was really helpful to just be like, ‘If I’m struggling right now, I’m struggling. And there is a light at the end of the tunnel but it just takes some time.’ And not stress about how my body changed in that time.*

In addition to this intentional shift toward self-kindness, participants learned how to mindfully detach from their self-criticism, which has helped them feel more grounded. As Isabelle, a tennis player, noted:

*It’s been helpful because it’s easy to get lost in the minutiae. Say I see something on TV, or an actor, and then I think, ‘I need to work out more, I need to watch what I’m eating so that I could look like that.’ I think BIM has been helpful to not get lost in all that craziness.*

Courtney, a diver, concluded: “At some level you have to be like, ‘Okay, I’m not going to meet all these ideals because it’s impossible and that’s okay.’ Then they carry a lot less weight.”

The participants also described how they started to reframe their negative thoughts, going through a two-step process of catching themselves being self-critical and then shifting their thoughts positively. Meg, a swimmer explained:

*[BIM] really helped me reframe my thinking and just kind of restructure it...after I went through [BIM], I definitely took a step back and thought about it, like, ‘I’m at my championship meet, I want to swim my best. I’m putting this suit on and my skin, it has a roll in it because it’s so tight. I could be upset about it right now, or I can think about all the amazing things that my body has helped me do.*

Over time, they also recognized their own sense of agency or choice in their thought processes. Lindsay, a rower, shared:

*[BIM] really helped me reframe my thinking and just kind of restructure it and showed me different aspects of how I should see my body and put it more on the positive side. It’s surprising to me how often I think back to those lessons. I still have days where I’m not so good with it, but I think overall at least I’m aware of that negative voice now, like, ‘You can think that way, but that’s not necessarily what it’s actually like.’*

Finally, participants endorsed increased and enduring confidence and comfort in how they talked about their bodies in general, and in relation to various identities as athletes and as women, and in how they performed as athletes. Tara, a rower, explained:

*I think the program helped me view myself as a more confident athlete because I stopped questioning myself that much...I think it broke down a lot of barriers and helped me open up mentally to perform better and be more confident as an athlete.*

Lindsay, a rower, continues:

*I think [BIM] showed me that I am pretty the way I am. I had a moment where I was standing in front of a mirror and that was the first*

time I thought, 'Oh, I feel pretty today.' That had never happened before...I think I became more confident in my body and, therefore, more confident as a woman and just embracing the curves.

Tara, a rower, explicitly described how this confidence was integral in sport retirement:

*The education behind [BIM] and building that confidence...all around, I think those are great resources, and I feel like those really helped establish my personal confidence for now, when I'm retired, and I feel better about it, and in a way, I don't feel like I have to prove anything to anyone anymore.*

### 3.3. Application of new skills and ways of relating to myself and others

Consistent with the program's experiential focus and extending on findings from its initial examination (Voelker et al., 2021), the participants continued to use the skills, and ways of relating to themselves and others, that they had initially learned in BIM. This skill application extended into advocacy and action when they encountered negative, unrealistic, or critical body and beauty messages, even with individuals in positions of power (e.g., coaches). Courtney, a diver, reflected:

*I think having had [BIM] made me realize that this negative messaging needs to stop. In that athlete role, I felt like I had the skills to be an advocate. Definitely [BIM] has made me more willing to interrupt things when I see it.*

Their advocacy took the form of sharing their insights and experiences from BIM with teammates, friends, and loved ones (e.g., parents, siblings).

*I'm able to use the messages that I learned from BIM and help others see themselves in a different light, or see our bodies in a different light, and I want to continue to do that. I want to make sure that I use my voice and past experiences and turn them around and make them into something powerful (Jenna, volleyball player).*

Tara, a rower, added: *"If I have daughters, I think I'll definitely take what I've learned and apply it to that. I know she'll go through the same stuff that I went through, and I'll just help her say, 'It's okay.'"*

Participants developed an enduring ability to be present and mindful with themselves and in their lives, using tools from the program (e.g., centering stone) as well as incorporating mindfulness apps to facilitate ongoing practice. Jenna, a volleyball player, explained: *"Mindfulness has been most helpful because I was able to take myself out of the negative thoughts or the negative mindset that I was in and bring myself back to the present."* Participants endorsed mindfully engaging with their thoughts and feelings and approaching them with curiosity and non-judgment.

*When a thought enters your head, acknowledge it and say, 'Why am I thinking this way?' rather than being so self-critical. And that's what I'm trying to do more now, just be curious about the way I think. I'm not always going to be positive and super happy all the time; there's going to be days where I'm going to be not feeling so great about myself. But being able to recognize that and draw your attention back is important (Christina, diver).*

The participants also developed healthier relationships with food and physical activity, such as viewing "food as fuel." Jenna (volleyball) explained: *"When I went through BIM, it helped me realize that food isn't the enemy; food is fuel."* Courtney, a diver, continued:

*I think, in general, I'm a lot less uptight about food. Now I'm so much more focused on, is what I'm eating making me feel good? Is it fueling my body the way it needs to be? Is it colorful? Is there variety? Not so much the numbers, but more holistic and complete and a lot more relaxed.*

The participants engaged in exercise more mindfully, detaching from rigorous, high-intensity workouts, and broadening their reasons for exercise beyond physical appearance. Meg, a swimmer, shared: *"I engage in physical activity in a more mindful manner. BIM*

*helped me recognize when I was using physical activity in a negative way to make myself feel better."*

### 3.4. Reflections over time

In the time since their BIM participation, which ranged from two to six years, participants developed a more nuanced and evolved understanding of, and relationship to, what they learned initially (see Voelker et al., 2021). They described how BIM helped them navigate their transition out of sport (i.e., retirement), even years after their program participation. Lindsay, a rower, explained:

*After retirement, I was more glad that I did BIM because, beforehand, I wasn't sure if I could use those tools outside of sports. Retirement showed me afterwards that there are certain things that apply no matter what. I'm really glad I did it and I think, after retirement, that came through and I realized that BIM was not just part of my sport but that I could take it into the rest of my life and use it.*

Courtney added:

*One of the themes of BIM was that 'you are more than just your sport.' I realized that my identity is not in my sport, and that changes the way I look at myself in my sport and, ultimately, how I've been able to cope with retirement.*

The BIM lessons and learning extended beyond sport retirement to other major life transitions or events, general coping with stress or adversity, and interpersonal relationships. Regarding relationships, Jalie, a rower, shared: *"In romantic relationships, BIM lessons kind of showed how I had a different view of myself, and the confidence kind of showed in that area the most."* Regarding stress, Lindsay, a rower, offered:

*Sometimes, when I'm taking five minutes to breathe, I realized something had happened to me that day that I might have not been that aware of how stressful it was. And then it comes out in those five minutes. So BIM helps me just reflect and take the time to see how I'm doing emotionally.*

Finally, Samantha, a volleyball player, discussed her application of BIM lessons to injury recovery:

*Since BIM was pretty soon after breaking my leg, a lot of the exercises were 'What are you thankful for, for your body?' I think that was really helpful for me just recovering from an injury and recognizing that my body is amazing.*

The participants acknowledged that some of their growth and change did not occur immediately, but, instead, developed over time.

*I think most of my feelings about BIM have developed post-program and retiring from running in college. I reflect on this a lot...I don't necessarily think I had the perspective, when I was doing the program, to realize that it was helping me. But I definitely do now, so I kind of look back on it as something that was an important thing for me to do. And even though I wasn't necessarily ready to address [body image concerns] at the time, it definitely got me thinking and laid the groundwork for being able to do it when I was ready later on (Brianna, track and field/cross country).*

More specifically, participants' initial negative reactions to specific program content (e.g., the mirror exercise) evolved into something positive for them. Alli, a rower, explained:

*For example, the mirror challenge in BIM...I think we started with just looking at ourselves in the mirror, and that was so hard for me at the time. It took me a while, it basically took me two years to get to the point where I thought, 'I'm pretty' in front of the mirror.*

Courtney, a diver, continued: *"The program was so key in development that comes later, too. It's gains beyond the time that you're in the program."*

Finally, the positive effects that BIM had in their lives extended beyond themselves to others: *I found myself just really grateful for having been through [BIM]. I'm so grateful because I can see how that has had an impact on my life and through me I know has had an impact on people around me"* (Courtney, diver). Additionally, their positive

experiences were reflected in their recommendations that other woman athletes participate as well. As Samantha, a volleyball player, articulated:

*I think it was a really good program that initiated a lot of conversations that we should be better about having as female athletes, as women...just as people and members of society. And I would recommend that they participate in if it were a choice. I had a positive experience with it and I think it can be helpful for people.*

### 3.5. Neutral responses and program feedback

Although all participants reported positive experiences in the program, some participants also noted neutral effects and provided constructive feedback. Although none identified any aspect of the program as unhelpful, some highlighted things that were missing but may have been beneficial if covered. For example, a skier stated that by not directly discussing eating or physical activity, BIM had not affected her subsequent relationships to food or exercise. One participant stated that she had not directly applied program content in her life broadly, and with purpose, but acknowledged that what she had learned had likely helped her transition out of sport. One participant commented on the positive effects of some exercises, but also how she disliked others, such as the mirror exercise: “*Some of the exercises...felt dumb to me because I...wrote them off because I didn't really want to deal with them, and then others had a huge impact.*”

For one participant who described spending four years in a collegiate sport environment that was permeated by negative food and body messages, the four-session program was, perhaps unsurprisingly, insufficient for her. Although she described the program as “empowering” and identified helpful components, such as self-compassion and connecting with other athletes, she was uncertain how much her thought process could have changed given her sport environment. This perspective may have been shared by other participants who provided feedback that the program and its sessions be “expanded,” “longer,” and “more spread out.” Lastly, two participants reported neutral feelings about the program’s social media component, primarily because it “*felt like a requirement*” and there needed to be “*more discussion*” and “*more involvement*” among the participants to have made it more worthwhile.

## 4. Discussion

We qualitatively examined women athletes’ enduring perspectives of themselves and their bodies, as well as their evolving relationships with food and physical activity, in relation to their prior participation in BIM. Consistent with the program’s aims, and thematic findings derived from participants’ thoughts and reactions post-program completion (Voelker et al., 2021), these retired women athletes described how they have continued to (a) increase their awareness about themselves, their peers, and how society affects them; (b) shift perspectives in how they view and treat themselves and in their confidence and appreciation of their bodies; and (c) apply new skills and behaviors that are consistent with their evolving awareness and understanding. Further, given that two to six years had elapsed since their participation, they reflected on how their growth and development had unfolded over time and on how their involvement had been positive and helped them navigate challenging life transitions (e.g., retirement from sport). Despite the range in years since participation in BIM, there were no notable differences in relation to their lived experiences and current perceptions.

The participants’ responses suggest that their awareness of how beauty is socially constructed and communicated, and of the negative effects of such messages, increased over time. Further, self-monitoring activities (e.g., paying attention to the negative

comments women make about their bodies) increased their awareness of how women internalize, and are influenced by, such appearance ideals (i.e., *thin-ideal internalization*; Striegel-Moore et al., 1986). Extending on Voelker et al. (2021), these retired athletes described how they had become aware of just how much their sport environments (i.e., as defined through pressures and messages from coaches/teammates and from having to wear tight, form-fitting, or revealing uniforms) had affected their body image and athletic identity.

Further, participants shared how they came to understand that these sport-related body ideals were incongruous to the socially constructed thin-ideals and impossible to reconcile, which aligned with Krane et al. (2004) conception of “the female athlete paradox.” As cognitive-dissonance represented one of the program’s two theoretical frameworks, a primary aim of BIM is to make women acutely aware of the ubiquity of general societal, and sport-specific pressures, and how, when internalized, these may result in such negative views of self and body. The athletes’ stories confirm that the awareness that emerges immediately following participation in BIM (Voelker et al., 2021) not only remains, but may evolve, expand, and become more nuanced over time.

The participants also described how they had become increasingly aware that they were not alone in their experiences and that there was a community of women from whom they can seek support. Based on both the richness and thickness of this subtheme, awareness was one of the most enduring impacts of BIM. Connecting it to the program’s group-based structure where athletes share their thoughts and feelings about their bodies and themselves and their experiences with the in- and out-of-session assignments (e.g., body activism), the participants described how they had developed strong connections that extended beyond each 75-minute session (i.e., seeing other group members around campus) and beyond their time in the four-session program (i.e., recalling their groups as a reminder that they were not alone). Feeling connected to a larger community relates to BIM’s mindful self-compassion framework and illustrates the concept of *common humanity* (Neff, 2003a; 2003b). As Neff has argued, struggle is part of the human condition, yet individuals often believe that no one else could understand their suffering and thus feel and believe they are alone (Yalom & Leszcz, 2005). However, shared experiences, mutual support, and empathy, all of which were present within BIM, appear to have fostered an awareness within these participants that, indeed, they are connected and not alone, and that such connections have lasted years into the future.

Emerging from their awareness, and consistent with attitudinal changes that were noted by athletes at the immediate aftermath of their BIM participation (Voelker et al., 2021), the participants described how they had shifted how they thought about, and related to, themselves and their bodies. For example, they described moving from self-criticism to self-kindness and, in general, to being able to detach from negative messages, thoughts, pressures, and expectations about their bodies, which align with mindfulness and self-compassion concepts (Neff, 2003a; 2003b). Further, the participants reported ever-evolving feelings of confidence and comfort in their bodies, which are the antithesis of body dissatisfaction (Polivy & Herman, 2002).

The participants’ descriptions suggest the positive shifts that they made in the months following their participation in BIM remain with them for years into the future. Attributing it to having been in BIM, the participants continued to disrupt the internalization of negative appearance schemas and shifted to self- and body- perspectives that were based on kindness, compassion, and a connection to others. Although not assessed directly in our study, such positive shifts and increasing levels of body confidence and comfort could be expected to result in reductions in ED risk (e.g., Braun et al., 2016a; Moffitt et al., 2018). Longitudinal, quantitative studies that specifically



measure food intake, dietary restrictions, and/or disordered eating behaviors could directly determine if such effects exist.

Consistent with the program's aims, the participants described how they had developed and applied new skills and behaviors, which appear to represent a natural translation of their increases in awareness and shifts in perspective. For example, they described using their breath to be in the present-moment (being mindful) and/or how they would accept their current struggles, knowing that those would pass (being self-kind). Some described using app-based technologies to help them develop and apply these new skills. Similar to what has been found among other groups of retired female athletes (e.g., Papathomas et al., 2018) and extending on the immediate effects of BIM (Voelker et al., 2021), the participants described how they were making healthier choices in relation to their eating and the ways they were exercising, and how they had started to advocate for a healthier body culture with others.

The emergence of such advocacy would align with the participants' experiences with the program's body activism and body celebration activities. Through these activities, they had opportunities to actively 'push back' against general sociocultural and sport-related pressures and to openly share with others a positive and affirming view of their bodies. Although these advocacy activities had occurred when they were completing the program, the participants also described how they had developed a commitment to extending it into the future. For example, they wanted to share with their future children positive messages about being a woman athlete and having a powerful, fit body, and to create healthy spaces in which younger athletes might thrive in the absence of negative messaging from coaches.

Given that two to six years had elapsed since completion of the BIM program, it is not surprising that the participants' perspectives on the program's utility and benefits became more nuanced and extensive over time. For example, they reflected on how their learning in BIM helped them cope more effectively with their transition out of sport and other life areas, such as relationships, managing stress, and navigating health issues. This generalization of learning, and transfer of skills, was built into the program's content and activities, particularly through the inclusion of mindful self-compassion principles and tools that have broad applicability. Some participants also discussed how change and growth did not occur immediately following program completion, but rather emerged over time. Consistent with the stages of change model (Prochaska & DiClemente, 1982), these results indicate that, for some participants, implementation of knowledge and skills may not occur immediately following program completion, particularly if they are in a more contemplative place in relation to themselves and their bodies. However, even when program participants do not implement immediately what they have learned, their stories suggest that the impact and benefits of BIM may emerge over time. Lastly, participants unanimously endorsed how the program positively affected their lives and how they appreciated having participated while they were collegiate athletes.

The structure and content of BIM, and the participants' stories of their experiences with it, address Piran's (2015) call that prevention programs promote the psychological processes that enhance positive body connections. Positive body image, a protective factor against eating concerns, can be fostered through the development of a critical perspective toward social pressures, especially during vulnerable periods (e.g., transition out of sport). The athletes believed that the program helped them foster a critical perspective of general sociocultural and sport-specific pressures as related to self, body and others, and advocate for a more accepting body culture generally and within sports. Body agency and functionality have been identified as one of the five dimensions (processes) of positive embodiment and are thought to be protective against the development of eating disorders as well (Piran, 2015). Consistent with this perspective, the

participants overwhelmingly spoke to how BIM helped them shift their perspectives on their bodies and foster a more expansive appreciation of themselves as athletes and as women.

#### 4.1. Limitations and future directions

Our study had many strengths, including a long-term follow-up, the use of semi-structured interviews that allowed for elaboration and context so participants' intended meanings could be discerned, and the reflexive, thematic analysis of the data wherein themes were generated from a collaborative coding process that continually checked the researchers' assumptions and centered researcher subjectivity (Braun & Clarke, 2019). Despite these strengths, there were limitations that warrant discussion. First, although participant recruitment targeted athletes who had completed BIM and had retired from collegiate sports, they self-selected into this study and were provided a \$50 fee for their participation. Thus, participants already may have been positively inclined to the program and/or believed they needed to make positive comments due to receiving the participation fee. Although possible, throughout the interviews, the athletes were encouraged to provide both positive and negative experiences and to identify what they liked most and least about the program. Further, their stories about, and experiences with, BIM were quite similar, providing robust data on which the themes were based. Additionally, those who did not elect to participate in the present study, the social media platform, or previous evaluations of BIM may have had different experiences. Future research targeting those individuals and utilizing additional research methodologies (e.g., focus groups) may yield a more comprehensive understanding of participant experiences and provide valuable insights for program improvement.

Second, our qualitative methodology (and data) does not allow for determinations of temporality or causality. However, they do provide a rich description of the athletes' experiences with the program and their perceptions of how it helped them through two to six years of lived experiences, including their retirement from sport. Third, our analyses, while adhering to the recommendations of Braun et al. (2016b), may have been strengthened by the co-coder participation in earlier analytic stages (e.g., familiarization, coding, theme development), rather than joining during the theme refinement stage. Lastly, our sample was diverse in terms of years since program completion and sports played, but primarily consisted of the perspectives of White, heterosexual, cisgender women. Although the researcher demographics included diversity in professional, sport, and program experience, they too were primarily White and heterosexual. Thus, interpretations of the findings need to be made within this contextual reality. Given the homogeneity of the current sample and research team, as well as that of past quantitative (Voelker et al., 2019) and qualitative (Voelker et al., 2021) evaluations of the program, additional research is needed to determine how BIM may be experienced by, and effective for, women athletes with more diverse identities (e.g., BIPOC, LGBTQ+, non-binary, etc.).

Keeping these limitations in mind, our findings have practical applications for sports medicine professionals who may work with women athletes around issues of body and eating. First, although researchers have tested different ED prevention programs with women athletes (see Bar et al., 2016), our findings extend support for BIM beyond the few months following participant completion. Although participants undoubtedly had not remembered all program content, and some had advocated for a longer program duration, they reported having experienced clear, ongoing benefits from having participated in the program two to six years prior. Second, the athletes made clear through their descriptions that the program and its content had helped them successfully cope with key transitions in their lives, in particular their retirement from sport, an outcome experienced by 98% of collegiate athletes when they

graduate (NCAA, 2018). Third, consistent with Voelker et al. (2021), the participants highlighted the program's heterogeneous, group-based format, stating that being part of such groups was particularly influential in their change and growth. Thus, future program leaders (i.e., facilitators of the four-session experience) might similarly recruit athletes from across sports, as opposed to drawing from a single sport or team, to participate. Finally, as with any psychological intervention, program leaders should be mindful that some participants' initial experiences with the content and activities may be neutral. Even though the participants said that they ultimately experienced positive growth and development over the longer-term, it would be useful to determine if there are ways to better engage athletes with BIM's content and activities in the moment and thus increase the likelihood of more immediate gains for them.

#### 4.2. Concluding comments

In conclusion, the findings from our qualitative, long-term follow-up evaluation of BIM provide a rich addition to our understanding of how these women have continued to incorporate knowledge and skills learned in the program several years following their initial participation. Through their voices, participants provided valuable insights regarding their enduring connections to their experiences in the program, and the ways in which those experiences have been impactful for them as they have navigated various life transitions. Although the information gleaned in our study is unique to these women, our findings provide support for additional research, lend specific feedback for ongoing implementation of the BIM program, and enrich our broader understanding related to ED prevention programming.

#### CRedit authorship contribution statement

**Stephanie Barrett:** Conceptualization, Methodology, Investigation, Data curation, Visualization. **Trent Petrie:** Writing – review & editing, Formal analysis, Supervision. **Dana Voelker:** Writing – review & editing, Formal analysis. **Randi Jackson:** Formal Analysis

#### Declarations of interest

None.

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