This article provides an overview of the etiology of eating disorders, screening recommendations, and evidence-based treatment options. These disorders are a noteworthy concern among girls and women in the United States, especially given the resulting medical comorbidities and high mortality rates.

Most health professionals are aware of the unique health care needs that women face as a function of their anatomy and physiology as compared to their male counterparts. Ubiquitous examples include the need for contraception; screenings for breast and cervical cancer; obstetrical care for pregnancy, labor, and delivery; and treatment for menstrual abnormalities. Less recognized—because these illnesses tend to be more private, more personal, and sometimes even secret—are the psychological disorders that cross over from the traditional biomedical model to a biopsychosocial health care model. In this commentary, we will specifically address body image issues and eating disorders, review the literature on their etiology, and present screening and treatment information that is beneficial to health care providers.

Etiology

The Diagnostic and Statistical Manual (DSM) [1] defines anorexia nervosa as intentional dieting and/or restricted energy intake leading to significantly low weight, intense fear of gaining weight or getting fat, and disturbed body image. Bulimia nervosa is characterized by disturbed body image, repetitive binge eating, and compensatory behaviors such as self-induced vomiting, laxative abuse, or fasting. Binge eating disorder includes repetitive periods of rapid and uncontrollable intake of large quantities of food followed by feelings of shame or guilt. Unspecified feeding or eating disorder is the diagnosis for severe cases that do not fit clearly into any of the aforementioned diagnostic criteria [1].

While body image dissatisfaction and eating disordered behaviors (eg, food restriction, purging, and binge eating) can affect men and women of varied ages, races, and cultural backgrounds, psychologists know that body image is one of the strongest gender differences in the social sciences [2]. Boys and men do sometimes struggle with negative evaluation of their bodies [3], but it is much more common for girls and women in our culture to suffer with poor body image and, consequently, with other serious health issues [2, 4].

Sociocultural Factors

The desire for women to modify their bodies is driven by numerous factors. A meta-analysis examining how sociocultural factors influence body image found that women’s internalization of and pressure to achieve the cultural ideal of a thin physique were the strongest predictors of poor body image [5]. This stringent US beauty ideal has become leaner for women in recent generations. For example, one study found that 99% of Playboy centerfolds and 100% of the winners of the Miss America pageants could be classified as underweight and that 29% and 17%, respectively, met the body mass index criterion (<17.5 kg/m²) for anorexia nervosa from the DSM-IV at that time [6]. Thus, we herald a beauty standard that favors those who have a genetic anomaly. Imagine if Americans admired polydactyly—a phenomenon that occurs in 2% of the population [7]—and we felt inadequate without a 6th finger to fit into our gloves.

In addition to the power of popular culture, one’s peer relationships also play a role in establishing the societal value of beauty [8]. This, in turn, has a significant impact on body image and eating behaviors. This influence can occur both directly (eg, bullying/teasing for appearing fat) and indirectly (eg, perceiving that thinness is important to one’s friends). Fat talk, a self-degrading and appearance-focused style of conversation, helps to convey the importance of thinness among peers and demonstrates the normative nature of body image concerns in Western culture. In social situations where body image and eating habits are being discussed, women expect that other women will also engage in public degradation of their bodies [9]. Fat talk is especially common among college-aged white women; one study found that 93% of participants endorsed engaging in this behavior at some time [10]. Although fat talk may seem harmless, it has been associated with a variety of negative...
outcomes, such as higher body image dissatisfaction and depression scores.

Screening for Body Image Dissatisfaction and Eating Disorders

Just as health professionals address how body size, nutrition, and sedentary lifestyle can place patients at risk for type 2 diabetes, they can also screen patients for body image and eating issues. Encouraging health professionals to directly listen for fat talk and/or screen for body image concerns is important, as body image dissatisfaction is one of the strongest predictors of developing an eating disorder [11]. Eating disorders, especially anorexia nervosa, have the highest mortality rates of all of the psychological disorders listed in the DSM-5 [1]. Using the National Death Index and eating disorder criteria from the DSM-IV, researchers found that crude mortality rates were 3.9% for bulimia, 4.0% for anorexia, and 5.2% for “eating disorder, not otherwise specified” (the latter category is listed in the DSM-5 as unspecified feeding or eating disorder [12]). Although unspecified eating disorders are often considered to be subclinical versions of “true” eating disorders, they can involve similar levels of functional impairment [13] and significant mortality [12].

Health professionals who greet and weigh patients should be watchful for dialogue such as fat talk and may need to inquire about these concerns directly. The Academy for Eating Disorders [14] recommends a more thorough assessment of patients who present with symptoms such as significant or unusual fluctuations in weight, abnormally low electrolyte levels, excessive exercise habits, abnormal menstrual patterns, atypically slow heart rate, or a history of utilizing inappropriate weight-control behaviors (eg, vomiting, diet pills). A comprehensive screening tool, such as the SCOFF questionnaire [15], is particularly useful in primary care settings. It includes 5 questions that can be administered conveniently in verbal or written form (eg, “Do you believe yourself to be fat when others say you are too thin?”), and it provides a quick and psychometrically sound method for identifying potential body image and eating concerns. Other professionals have described how to screen and diagnose patients with eating disorders who present for primary care, often with nebulous medical symptoms such as dizziness, fatigue, and heartburn [16]. They recommend taking steps to form a strong therapeutic relationship, which is especially crucial if there is secrecy involved in the presentation of the disorder.
Suicide Screening

Rates of suicidal ideation and suicide attempts for individuals with eating disorders are quite high and account for a significant number of deaths in those with eating disorders [17, 18]. Because of this risk, it is important for health care providers to screen for these concerns if eating disorders or body-related issues are identified. Seeking help for vague symptoms like dizziness, acid reflux, or insomnia may be the patient’s way of asking for help for more serious concerns such as chronic suicidal ideation. In health care practices that have staff clinical psychologists, counselors, or social workers, patients who show possible signs of suicidal ideation should receive immediate evaluation and consultation from these professionals. Hence, it is important that primary care practitioners are comprehensive in their evaluation so that some intervention can be provided while these patients are in their office.

Empirically-Supported Treatments for Eating Disorders

Health professionals who identify eating disorders have an opportunity to refer them to a professional team that can provide evidence-based treatments. This is particularly important because early detection and treatment lowers rates of morbidity and mortality [19]. An effective eating disorder treatment approach typically involves a collaborative interdisciplinary team with multiple key players to address physiological as well as psychological concerns. At a minimum, the treatment team should consist of a physician, a dietician, and a mental health professional. Additional team members may include a dental specialist and/or a psychiatrist. Goals of treatment will vary depending on the individual but commonly include medical stabilization (eg, restoration of weight and/or electrolyte balance) and modification of maladaptive food- and appearance-related behaviors and beliefs; for example, therapy may challenge the patient’s beliefs about “safe” and “unsafe” foods to eat or modify distorted body image through mirror work and exposure therapies.

Cognitive behavioral psychotherapy (CBT) was found in a meta-analysis to be superior to medications alone and was effective in treating bulimia nervosa [20]. In an additional meta-analysis, CBT also showed strong treatment effectiveness for bulimia [21]. A meta-analytic review that compared CBT and medications for treatment of binge-eating disorder found strong effects for CBT, medium effect sizes for antidepressant medications, and no additional effect for com-
bined treatment [22]. An updated review of the treatment of anorexia nervosa found that a combination of renourishment plus CBT or interpersonal psychotherapy is recommended [23]. Patients with bulimia that has resulted in serious medical sequelae or anorexia nervosa with medical morbidity caused by malnourishment may require inpatient hospitalization at a center that specializes in the treatment of eating disorders (eg, Carolina House, the Renfrew Center, or the Veritas Collaborative).

To aid in health care professionals’ decisions, experts have provided detailed information on medical screening and treatment, as well as stepped-care, integrative, evidence-based treatment planning (as described above) [16]. Most importantly, they emphasize that there is limited evidence that self-help/self-guided treatments are effective as a beginning approach to treatment. The use of medication alone is also not recommended as an intervention for these disorders. Further, effective treatment requires ongoing monitoring and intervention since maintenance factors for eating disorders are complex, there is a high risk for medical complications, and there is also a high risk of mortality from suicide or physical sequelae of the disorder itself.

Conclusion

Eating disorders—which afflict girls and women much more commonly than boys and men—can create serious medical morbidity and have the highest mortality rates of all the psychological disorders listed in the DSM-5. Anorexia nervosa, bulimia nervosa, binge eating disorder, and unspecified feeding or eating disorder are influenced by culture, family, and peers, but they speak to serious psychological distress that is often kept private or about which patients may be secretive; thus, it is important for health care providers to consider regular screening for signs and symptoms of eating disorders in their patients. Use of medication alone for treatment of eating disorders is not recommended. Research suggests that a team of clinicians—including a physician, dietician, and psychologist—who provide cognitive behavioral therapy or interpersonal psychotherapy is ideal. Patients with suicidal ideation and/or medical sequelae resulting from their eating disorder may require hospitalization at a facility that specializes in the treatment of these disorders. Resources are available to assist health care providers in this stepped-care, integrative approach to effective screening, diagnosis, and treatment planning. NCMJ

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Acknowledgments

Potential conflicts of interest. D.M.M. and C.B.R. have no relevant conflicts of interest.

References

1. American Psychiatric Association. Diagnostic and Statistical Manual of Mental Disorders. 5th ed (DSM-5). Arlington, VA: American Psychiatric Publishing; 2013.
2. Feingold A, Mazzella R. Gender differences in body image are increasing. Psychol Sci. 1998;9(3):190-195.
3. McCabe MP, Ricciardelli LA. Body image dissatisfaction among males across the lifespan: a review of past literature. J Psychosom Res. 2004;56(6):675-685.
4. Stice E, Shaw HE. Role of body dissatisfaction in the onset and maintenance of eating pathology: a synthesis of research findings. J Psychosom Res. 2002;53(5):985-993.
5. Cafri G, Yamamiya Y, Brannick M, Thompson JK. The influence of sociocultural factors on body image: a meta-analysis. Clin Psychol Sci Pr. 2005;12(4):421-433.
6. Spitzer BL, Henderson KA, Zivian MT. Gender differences in population versus media body sizes: a comparison over four decades. Sex Roles. 1999;40(7):545-565.
7. Carroll MJ. Congenital anomalies: a 25-year overview. J Hand Surg Am. 2000;25(6):1007-1037.
8. Clark L, Tiggesmern M. Sociocultural influences and body image in 9- to 12-year-old girls: the role of appearance schemas. J Clin Child Adolesc Psychol. 2007;36(1):76-86.
9. Britton LE, Martz DM, Bazzini DG, Curtin LA, Leashomb A. Fat talk and self-presentation of body image: is there a social norm for women to self-degrade? Body Image. 2006;3(3):247-254.
10. Salk RH, Engel-Naddox R. Fat talk among college women is both contagious and harmful. Sex Roles. 2012;66(9):636-645.
11. Polivy J, Herman CP. Causes of eating disorders. Annu Rev Psychol. 2002;53:187-213.
12. Crow SJ, Peterson CB, Swanson SA, et al. Increased mortality in bulimia nervosa and other eating disorders. Am J Psychiatry. 2009;166(12):1342-1346.
13. Stice E, Marti CN, Shaw H, Jaconis M. An 8-year longitudinal study of the natural history of threshold, subthreshold, and partial eating disorders from a community sample of adolescents. J Abnorm Psychol. 2009;118(3):587-597.
14. Academy for Eating Disorders. Eating Disorders: Critical Points for Early Recognition and Medical Risk Management in the Care of Individuals with Eating Disorders. 2nd ed. Deerfield, IL: Academy for Eating Disorders; 2012. http://www.aedweb.org/downloads/Guide-English.pdf. Accessed June 17, 2016.
15. Parker SC, Lyons J, Bonner J. Eating disorders in graduate students: exploring the SCOFF questionnaire as a simple screening tool. J Am Coll Health. 2005;54(2):103-107.
16. Williams PM, Goodie J, Motsonger CD. Treating eating disorders in primary care. Am Fam Physician. 2008;77(2):187-195.
17. Pisetsky EM, Thornton LM, Lichtenstein P, Pedersen NL, Bulik CM. Suicide attempts in women with eating disorders. J Abnorm Psychol. 2013;122(4):1042-1056.
18. Preti A, Rocchi MB, Sisti D, Camboni MV, Miotto P. A comprehensive meta-analysis of the risk of suicide in eating disorders. Acta Psychiatr Scand. 2011;124(1):6-17.
19. Herzog DB, Nussbaum KM, Marmor AK. Comorbidity and outcome in eating disorders. Psychiatr Clin North Am. 1996;19(4):843-859.
20. Whittal ML, Agras WS, Gould RA. Bulimia nervosa: a meta-analysis of psychosocial and pharmacological treatments. Behav Ther. 1999;30(1):117-135.
21. Hofmann SG, Asnaani A, Vonk IJ, Sawyer AT, Fang A. The efficacy of cognitive behavioral therapy: a review of meta-analyses. Cognit Ther Res. 2012;36(5):427-440.
22. Vocks S, Tuschen-Caffier B, Pietrowsky R, Rustenbach S, Kersting A, Herpertz S. Meta-analysis of the effectiveness of psychological and pharmacological treatments for binge eating disorder. Int J Eat Disord. 2010;43(3):205-217.
23. Watson HJ, Bulik CM. Update on the treatment of anorexia nervosa: review of clinical trials, practice guidelines and emerging interventions. Psychol Med. 2013;43(12):2477-2500.