DOWNLOAD PDF TREATMENT OF BULIMIA NERVOSA

Chapter 1 : Facts, Signs and Symptoms of Bulimia Nervosa â€“ Bulimia Disorder Treatment

Family-based treatment to help parents intervene to stop their teenager's unhealthy eating behaviors, to help the teen regain control over his or her eating, and to help the family deal with problems that bulimia can have on the teen's development and the family.

Print Overview Bulimia boo-LEE-me-uh nervosa, commonly called bulimia, is a serious, potentially life-threatening eating disorder. People with bulimia may secretly binge â€” eating large amounts of food with a loss of control over the eating â€” and then purge, trying to get rid of the extra calories in an unhealthy way. To get rid of calories and prevent weight gain, people with bulimia may use different methods. For example, you may regularly self-induce vomiting or misuse laxatives, weight-loss supplements, diuretics or enemas after bingeing. Or you may use other ways to rid yourself of calories and prevent weight gain, such as fasting, strict dieting or excessive exercise. You may judge yourself severely and harshly for your self-perceived flaws. But effective treatment can help you feel better about yourself, adopt healthier eating patterns and reverse serious complications. Symptoms Bulimia signs and symptoms may include: When to see a doctor If you have any bulimia symptoms, seek medical help as soon as possible. If left untreated, bulimia can severely impact your health. Talk to your primary care provider or a mental health professional about your bulimia symptoms and feelings. He or she can help you take the first steps to get successful bulimia treatment. Helping a loved one with bulimia symptoms If you think a loved one may have symptoms of bulimia, have an open and honest discussion about your concerns. You can also help find a qualified doctor or mental health professional, make an appointment, and even offer to go along. Because most people with bulimia are usually normal weight or slightly overweight, it may not be apparent to others that something is wrong. Red flags that family and friends may notice include: Constantly worrying or complaining about being fat Having a distorted, excessively negative body image Repeatedly eating unusually large quantities of food in one sitting, especially foods the person would normally avoid Strict dieting or fasting after binge eating Not wanting to eat in public or in front of others Going to the bathroom right after eating, during meals or for long periods of time Exercising too much Having sores, scars or calluses on the knuckles or hands Having damaged teeth and gums Changing weight Swelling in the hands and feet Facial and cheek swelling from enlarged glands Request an Appointment at Mayo Clinic Causes The exact cause of bulimia is unknown. Many factors could play a role in the development of eating disorders, including genetics, biology, emotional health, societal expectations and other issues. Risk factors Girls and women are more likely to have bulimia than boys and men are. Bulimia often begins in the late teens or early adulthood. Factors that increase your risk of bulimia may include: People with first-degree relatives siblings, parents or children with an eating disorder may be more likely to develop an eating disorder, suggesting a possible genetic link. Being overweight as a child or teen may increase the risk. Psychological and emotional issues. Psychological and emotional problems, such as depression, anxiety disorders or substance use disorders are closely linked with eating disorders. People with bulimia may feel negatively about themselves. In some cases, traumatic events and environmental stress may be contributing factors. People who diet are at higher risk of developing eating disorders. Many people with bulimia severely restrict calories between binge episodes, which may trigger an urge to again binge eat and then purge. Other triggers for bingeing can include stress, poor body self-image, food and boredom. Complications Bulimia may cause numerous serious and even life-threatening complications. Foster and reinforce a healthy body image in your children, no matter what their size or shape. Help them build confidence in ways other than their appearance. Have regular, enjoyable family meals. Avoid talking about weight at home. Focus instead on having a healthy lifestyle. Discourage dieting, especially when it involves unhealthy weight-control behaviors, such as fasting, using weight-loss supplements or laxatives, or self-induced vomiting. Talk with your primary care provider. He or she may be in a good position to identify early indicators of an eating disorder and help prevent its development. If you notice a relative or friend who seems to have food issues that could lead to or indicate an eating disorder, consider supportively talking to the person about these issues and ask how you can help.

Chapter 2 : Bulimia nervosa - Wikipedia

What Is the Treatment for Bulimia? The primary treatment for bulimia often combines psychotherapy, antidepressants, and nutritional counseling.. It is helpful to find a psychologist or.

People are prone to developing this eating disorder mainly because they feel pressured to maintain a certain body image. Uncontrolled episodes of overeating are typically associated with women and teens. However, people of all ages, genders and backgrounds are susceptible to developing bulimia. Historical records suggest that bulimia has been a real nuisance, plaguing people since the beginning of time. The first one to describe the illness was a wealthy person, from the Middle Ages. It was named and described in clinical terms by British psychiatrist Gerald Russell. It falls into the eating disorder category. People suffering from this illness consume significant amounts of food in a short period of time. These individuals tend to have an obsession with body shape or weight. As a rule, patients with bulimia nervosa have social phobia and body image distortions. They are exposed all day long to images that reinforce anxiety with regard to their personal appearance. Bulimia is basically a mental illness, although at first glance it seems to be a body image and weight issue. Bulimia sufferers require therapeutic intervention. Bulimia nervosa is an eating disorder where people overheat regularly. This is what is called binge eating. It involves two important aspects: The effects of bulimia on the human body are truly devastating. Binging food can possibly lead to stomach pain, tooth sensitivity, dehydration, hormonal imbalances, hair loss, etc. It is not thus surprising to understand that many patients fall into depression or even develop an obsessive-compulsive disorder. There are two major subtypes of bulimia nervosa: Bulimia sufferers make amends for the binge episodes. What they do is self-induce vomiting so as to control the weight. Binge eating is generally followed by using medications for weight control. Examples include diet pills and stimulants. Bulimia behaviors are impulsive and they tend to overlap. It is important to stress that purging and non-purging bulimia is not to be confused with binge eating disorders. The great majority of those with bulimia are women, but this does not mean that men cannot be affected. Eating disorders are not gender specific, which is the reason why it is not unusual for a man to have bulimia nervosa. They as well struggle with binge eating and the associated side effects. The fact is that male patients are not likely to manifest visible symptoms, not to mention seek professional help. Bulimia nervosa symptoms include: The process of detection requires becoming aware of symptoms and signs. The treatment provider will look for a combination of symptoms in order to confirm the diagnosis. The fact is that bulimia is hard to identify. The reason for this is that the manifestations listed earlier are common to other eating disorders as well. There is no routine screening for the illness, which makes things more difficult for the doctor. Another reason why the eating disorder is hard to diagnose is that patients usually hide their thoughts and way of action. The medical practitioner conducts a physical examination for bulimia nervosa. The doctor will look for effects of an eating disorder, making sure to check the mouth, skin, and hair for issues. The trained professional may want to verify the heart, lungs, and blood pressure. A psychological evaluation is equally necessary in the case of bulimia nervosa. This assessment includes talking with the patient about eating habits and changes in food attitudes. The medical practitioner can categorize the illness as being mild or severe. The doctor is an important part of the treatment and recovery process. What the medical practitioner does is discuss things over with the patient, provide additional information and nutritional counseling, and refer them to a trained specialist. The professional that treats the eating disorder is called a therapist. Antidepressants are commonly used for treating bulimia, helping challenge dysfunctional thoughts. Cognitive behavioral therapy is just as effective. This treatment is based on thoughts, emotions, and, naturally, behaviors. Due to the fact that sufferers of bulimia view themselves and their bodies in a negative way, special focus should be laid on changing ways of acting and the attitude toward eating. CBT addresses the main issues of bulimia nervosa, more precisely on how the symptoms occur at the present moment. For severe cases of bulimia nervosa, inpatient treatment is required. Choosing the most suitable treatment facility is the duty of the family. It is important not to forget that the medical condition can cause serious effects. What happens if the health issues are not addressed is that the damage can be irreversible. For instance, kidney failure is not reversible as is

kidney injury. This is the reason why it is of paramount importance to prevent chemical imbalances from occurring or, at least, improving kidney function. People with bulimia need to look after themselves. Otherwise, it is not possible to have a full recovery. It is advisable to not brush the teeth after purging as this will destroy the enamel. Most importantly, the individual has to make an effort to reach a normal weight. All thoughts negative or not, should be discussed with a therapist. Or with family and friends. Natural Treatment of Bulimia Nervosa At present, researchers are looking for new ways to treat bulimia nervosa, alternative medicine being the focal point. The general opinion is that hypnotherapy is a good alternative treatment. Saying that hypnotherapy techniques cure the eating disorder is an exaggeration. It is sure though that entering a calm state of mind helps patients, in the sense that it helps individuals gain control over their actions. The Mayo Clinic warns that hypnotherapy is not to be considered a solution in itself. More precisely, it should accompany other treatment plans and patients should not expect miracles because they are not going to happen. Importance of Early Intervention for Bulimia Nervosa Most people do not realize that it is essential to diagnose and treat bulimia early. Early intervention can be life-saving. Surprising or not, bulimia nervosa has one of the highest mortality rates. Patients can die from cardiac arrest, seizure, pancreatitis, electrolyte imbalance, gastric rupture, depression, and so on. What is worse is that the person can go for a long time without realizing that they have serious health problems. Developing bulimia nervosa is not a conscious choice, which explains why people having this illness do not comprehend its severity or the fact that they need to seek specialized attention. The point is that early detection and treatment can result in favorable outcomes. The future for people with this eating disorder is more positive than the one for people suffering from anorexia. During the course of the treatment, it is normal to expect relapses. This does not mean that the patient cannot be cured. What causes bulimia nervosa? Bulimia nervosa does not have an exact cause. As a matter of fact, specialists have no idea what causes the onset eating disorders in general. What can be said for sure is that it is not only one cause. The illness can be caused by a number of factors, like emotional, societal, or genetic. They typically have low self-esteem and this is not always obvious. Genes may be responsible for the manifestation of bulimia. Studies have proved that some people have a genetic predisposition for developing an eating disorder. Last but not least, mention was made of trauma. A shocking event, like an accident or an abuse can trigger the apparition of bulimia nervosa. This is not a rule, but individuals who have gone through traumatic experiences are more likely to develop a medical condition. Treating the individual implies treating the trauma first. Living with Bulimia Nervosa It is difficult if not impossible to imagine what a person suffering from bulimia nervosa goes through. What is sure is that sick individuals manage to hide their state of affairs. While some of them keep the illness a secret from early school, others have problems at a late age. People with health problems experience strange feelings, such as anxiety, fear, weakness, neglect, etc. What is more, they have no power whatsoever over their medical condition until they get help. Patients with bulimia end up leading a double life. They try to act normally in order to hide their suffering, as having bulimia is a stigma. The stigma is the reason why they refuse to get treatment.

Chapter 3 : Bulimia and Depression - Managing the Treatment Complications

Bulimia nervosa is an eating disorder, commonly referred to simply as bulimia. It's a serious condition that can be life-threatening. It's generally characterized by binge eating followed by.

Bulimia nervosa is an eating disorder. You eat a large amount of food in a short period of time. This is called binging. You then vomit, use laxatives, starve, or exercise for hours to prevent weight gain. This is called purging. You do this at least 1 time each week for several months. What increases my risk for bulimia nervosa? Bulimia usually begins between the ages of 13 and You may continue to have bulimia as an adult. You may have episodes of binging and purging only when you are feeling stressed. The following may increase your risk for bulimia: Being overweight or thinking you are too heavy Not feeling good about your body A need to be perfect, or setting high goals Participation in a sport or activity that values thinness, such as gymnastics, wrestling, or modeling A history of anxiety, depression, or obsessive-compulsive thoughts A family history of an eating disorder, obesity, or problems with substance abuse Not having good relationships with family members, or stress or trauma What are the signs and symptoms of bulimia nervosa? Not being able to stop eating, usually secretly or when you are alone Worrying that you are fat even if your weight is healthy or too low, or your weight goes up and down often Often being bloated and having constipation or diarrhea A sore throat and tooth decay caused by vomiting A puffy face and throat, dehydration, or thinning hair Calluses or cuts on your knuckles if you use your hand to make yourself vomit In girls, monthly periods that are irregular or stop completely Feeling cold all the time, or tired, weak, dizzy, or lightheaded Being moody and depressed, believing self-worth is tied to weight, or talking about food and weight all the time How is bulimia nervosa diagnosed? Your healthcare provider will examine you and check your height and weight. Blood tests will show if you are getting enough iron, calcium, glucose, and other nutrients. Urine tests may be used to check for signs of dehydration. Your provider will ask you how you feel about your body, and how you control weight. The provider may ask you to fill out several forms about feelings and eating habits. You may have a hard time talking about your weight or about binging and purging. You may also have trouble asking for help. The more honest you can be, the more easily your provider can help you be healthy. How is bulimia nervosa treated? Bulimia is a life-threatening medical condition. Treatment may need to take place in a hospital or clinic. Treatment will be more effective if you understand the seriousness of the condition and truly want to get better. Counseling is an important part of treatment. You may work with healthcare providers alone or in a group. Group counseling is a way for you to talk with others who have bulimia. Counseling may center on helping you replace negative thoughts with positive thoughts. Family sessions can help everyone in the family understand bulimia and what to do to help you. Nutrition therapy means you will meet with a dietitian. Others in your family may also meet with the dietitian. Together you will develop a healthy meal plan. It is important to eat 3 to 5 structured meals a day to reduce the urge to binge. You might need to learn how to prepare healthy food. You might also need to relearn what it feels like to be hungry and full. You may be asked to keep a food diary and bring it to future visits. Medicines are sometimes used to help treat bulimia or the health problems it causes. You may get medicine to help improve your mood, control mood swings, and decrease obsessive thoughts. Vitamin or mineral supplements may also be needed if your nutrient levels are low because of bulimia. What can I do to help myself? Recovery from bulimia is a process that takes time. You may have a binging and purging episode after a long period of healthy eating. Work with family members and healthcare providers to get back on track with healthy eating and healthy exercise. Try not to be angry with yourself for the episode. It might help to talk about your feelings with someone you trust. Focus on a healthy self-esteem. Think about everything you like about yourself. For example, you may be a talented artist, or you may write well. Focus on those skills or talents instead of on appearance. Ask others not to comment on your weight or shape. Your healthcare provider can tell you healthy weight ranges for your age and height. It may take time before you are comfortable knowing your weight or seeing your weight as healthy. Remember your goals to build a healthy self-esteem. Be patient with yourself as you change your thinking. Have regular family meals. This can help change your thinking by preventing you from eating alone.

Focus on spending time with others. Do not focus on your food choices. For example, do not worry that you should take a larger portion or another helping. It may take time before you are ready to eat like others at the table. Spend time doing things you enjoy. Make family time about being together, not about meals. Try to go to places other than restaurants, movies, and other places that feature food. Where can I find support and more information?

Chapter 4 : Bulimia Nervosa - Academic Association of Medicine

Bulimia Nervosa is a psychological and severe life-threatening eating disorder described by the ingestion of an abnormally large amount of food in short time period, followed by an attempt to avoid gaining weight by purging what was consumed. Methods of purging include forced vomiting, excessive use.

But if you have the eating disorder bulimia, overeating is more like a compulsion. And afterwards, instead of eating sensibly to make up for it, you punish yourself by purging, fasting, or exercising to get rid of the calories. This vicious cycle of bingeing and purging takes a toll on your body and emotional well-being. But the cycle can be broken. With the right help and support, you can develop a healthier relationship with food, overcome your feelings of anxiety, guilt, and shame, and regain control of your life. Bulimia nervosa is a serious eating disorder characterized by frequent episodes of binge eating followed by extreme efforts to avoid gaining weight, often by vomiting or exercising to excess. This repetitious binge-and-purge cycle can cause damage to your digestive system and create chemical imbalances in the body that harm the functioning of major organs, including the heart. It can even be fatal. While it is most common among young women, bulimia can affect women and men of all ages. After the binge ends, panic sets in and you turn to drastic measures to "undo" your overeating, such as taking laxatives, vomiting, or going for an intense run. No matter how trapped in this vicious cycle you feel, though, there is hope. With treatment and support, you can break the cycle, learn to manage unpleasant emotions in a healthier way, and regain your sense of control. If you make up for your binges by fasting, exercising to excess, or going on crash diets, this also qualifies as bulimia. Are you obsessed with your body and your weight? Does food and dieting dominate your life? Do you ever eat until you feel sick? Do you feel guilty, ashamed, or depressed after you eat? Do you vomit or take laxatives to control your weight? But despite your secret life, those closest to you probably have a sense that something is not right. Binge eating signs and symptoms Lack of control over eating. Unable to stop eating until the point of physical discomfort and pain. Going to the kitchen after everyone else has gone to bed. Going out alone on unexpected food runs. Eating unusually large amounts of food with no obvious change in weight. Disappearance of food, numerous empty wrappers or food containers in the garbage, or hidden stashes of junk food. Alternating between overeating and fasting. Purging signs and symptoms Going to the bathroom after meals. Frequently disappearing after meals to throw up. Running water to disguise sounds of vomiting. The bathroom or even the person may smell like vomit. They may try to cover up the smell with mouthwash, perfume, air freshener, gum, or mints. Excessive exercising after eating. Typical activities include high-intensity calorie burners such as running or aerobics. May look yellow, ragged, or clear. Men and women with bulimia are usually normal weight or slightly overweight. Being underweight while purging might indicate a purging type of anorexia. Frequent fluctuations in weight, by 10 pounds or more due to alternating bingeing and purging. Bulimia causes and effects There is no single cause of bulimia. While low self-esteem and concerns about weight and body image play major roles, there are many other contributing factors. You may have trouble managing your emotions in a healthy way and use eating as an emotional release, bingeing and purging when you feel angry, depressed, stressed, or anxious. Risk factors for bulimia include: Poor body image, particularly when paired with strict dieting. Low self-esteem, often stemming from depression , perfectionism, or a critical home environment. Stressful life changes, such as a breakup, going away to college, starting a new job, or going through puberty. History of trauma or abuse. This includes things such as sexual assault, childhood neglect or abuse, troubled family relationships, or the death of a loved one. Effects of bulimia When you are living with bulimia, you are putting your bodyâ€”and even your lifeâ€”at risk. The most dangerous side effect of bulimia is dehydration due to purging. Vomiting, laxatives, and diuretics can cause electrolyte imbalances in the body, most commonly in the form of low potassium levels. Low potassium levels trigger a wide range of symptoms ranging from lethargy and cloudy thinking to irregular heartbeat and death. Chronically low levels of potassium can also result in kidney failure. Using ipecac syrup is also very dangerous, and can cause sudden death. Steps to bulimia recovery Admit you have a problem. The first step in bulimia recovery is admitting that your relationship to food is distorted and out of control. You may be

ashamed, ambivalent, or afraid of what others will think. Find a good listenerâ€”someone who will support you as you try to get better. Stay away from people, places, and activities that trigger the temptation to binge or purge. You may need to avoid looking at fashion or fitness magazines, spend less time with friends who constantly diet and talk about losing weight, and stay away from weight loss web sites and "pro-mia" sites that promote bulimia. You may also need to be careful when it comes to meal planning and cooking magazines and shows. Address any underlying mood disorder. Getting help for co-existing conditions is vital to your bulimia recovery. The advice and support of trained eating disorder professionals can help you regain your health, learn to eat normally again, and develop healthier attitudes about food and your body. If you or a loved one has bulimiaâ€¦ In the U. In other countries, see the Resources section below for helplines in your area. Bulimia recovery tip 1: Break the binge and purge cycle The first step in bulimia recovery is stopping the vicious cycle of bingeing and purging. When you starve yourself, your body responds with powerful cravingsâ€”its way of asking for needed nutrition. As the tension, hunger, and feelings of deprivation build, the compulsion to eat becomes too powerful to resist: With an all-or-nothing mindset, you feel any diet slip-up is a total failure. Soon after, guilt and self-loathing set in. And so you purge to make up for bingeing to regain control. But purging only reinforces binge eating. This is because calorie absorption begins the moment you put food in the mouth. Laxatives and diuretics are even less effective. You may weigh less after taking them, but that lower number on the scale is due to water loss, not true weight loss. Develop a healthier relationship to food Once you stop trying to restrict calories and follow strict dietary rules, you will no longer be overwhelmed with cravings and thoughts of food. By eating normally, you can break the binge-and-purge cycle and still reach a healthy, attractive weight. Pay attention to your hunger. This only leads to overeating! Try not to let over 4 hours pass without a meal or snack. When something is off limits, it becomes more tempting. Instead of eating mindlessly, be a mindful eater. Slow down and savor the textures and flavors. Learn to tolerate unpleasant feelings While bingeing is often triggered by overly strict dieting that backfires, it can also be a way to control or numb unpleasant moods or feelings. Are you eating to calm down, comfort yourself, or to relieve boredom? Avoidance and resistance only make negative emotions stronger. Where do you feel the emotion in your body? What kinds of thoughts are going through your head? Realize that you are NOT your feelings. Emotions are passing events, like clouds moving across the sky. Sitting with your feelings may feel extremely uncomfortable at first. Even emotions that feel intolerable are only temporary. You can choose how to respond. Challenge dysfunctional thoughts The bingeing and purging of bulimia is often fueled by dysfunctional, self-sabotaging ways of thinking that undermine your confidence, color everything in an unrealistically negative light, and make you feel helpless, inadequate, and ashamed. But you can learn to put a stop to these unhealthy mental habits. Damaging mindsets that fuel bulimia All-or-nothing thinking. You have a hard time seeing shades of gray, at least when it comes to yourself. You believe if you feel a certain way, it must be true. Musts, must-nots, and have-tos.

Chapter 5 : Bulimia Nervosa | Symptoms and Treatment | Patient

Bulimia Nervosa Signs, Symptoms, Treatment, and Self-Help. Many of us turn to food when we're feeling lonely, bored, or stressed. But if you have the eating disorder bulimia, overeating is more like a compulsion.

For example, some show increased thresholds to heat pain compared and report the same level of satiety after consuming more calories than do healthy subjects. Biological[edit] As with anorexia nervosa , there is evidence of genetic predispositions contributing to the onset of this eating disorder. Brain-derived neurotrophic factor BDNF is under investigation as a possible mechanism. Studies have shown that women with hyperandrogenism and polycystic ovary syndrome have a dysregulation of appetite, along with carbohydrates and fats. This dysregulation of appetite is also seen in women with bulimia nervosa. In addition, gene knockout studies in mice have shown that mice that have the gene encoding estrogen receptors have decreased fertility due to ovarian dysfunction and dysregulation of androgen receptors. Accordingly, this would lead to unrealistically restricted eating, which may consequently induce an eventual "slip" where the individual commits a minor infraction of the strict and inflexible dietary rules. Moreover, the cognitive distortion due to dichotomous thinking leads the individual to binge. The binge subsequently should trigger a perceived loss of control, promoting the individual to purge in hope of counteracting the binge. However, Fairburn et al. In turn, Byrne and Mclean argued that this makes the individual vulnerable to binging, indicating that it is not a binge-purge cycle but rather a purge-binge cycle in that purging comes before bingeing. Similarly, Fairburn et al. Everyone differs from another, and taking such a complex behavior like bulimia and applying the same one theory to everyone would certainly be invalid. In addition, the cognitive behavioral model of bulimia nervosa is very cultural bound in that it may not be necessarily applicable to cultures outside of the Western society. To evaluate, Fairburn et al.. Furthermore, it is difficult to ascertain cause and effect, because it may be that distorted eating leads to distorted cognition rather than vice versa. The reported incident rate of unwanted sexual contact is higher among those with bulimia nervosa than anorexia nervosa. The thin ideal internalization is the extent to which individuals adapt to the societal ideals of attractiveness. Studies have shown that young females that read fashion magazines tend to have more bulimic symptoms than those females who do not. This further demonstrates the impact of media on the likelihood of developing the disorder. Kevin Thompson and Eric Stice claim that family, peers, and most evidently media reinforce the thin ideal, which may lead to an individual accepting and "buying into" the thin ideal. In turn, Thompson and Stice assert that if the thin ideal is accepted, one could begin to feel uncomfortable with their body shape or size since it may not necessarily reflect the thin ideal set out by society. Thus, people feeling uncomfortable with their bodies may result in suffering from body dissatisfaction and may develop a certain drive for thinness. Consequently, body dissatisfaction coupled with a drive for thinness is thought to promote dieting and negative effects, which could eventually lead to bulimic symptoms such as purging or bingeing. Binges lead to self-disgust which causes purging to prevent weight gain. The aim of their study was to investigate how and to what degree media affects the thin ideal internalization. Thompson and Stice used randomized experiments more specifically programs dedicated to teaching young women how to be more critical when it comes to media, in order to reduce thin ideal internalization. In other words, less thin ideal images portrayed by the media resulted in less thin ideal internalization. Therefore, Thompson and Stice concluded that media greatly affected the thin ideal internalization. People that associate themselves with thin models get in a positive attitude when they see thin models and people that associate with overweight get in a negative attitude when they see thin models. Moreover, it can be taught to associate with thinner people. This means that the high expectations and unrealistic goals that these individuals set for themselves are internally motivated rather than by social views or expectations. Many bulimics may also engage in significantly disordered eating and exercise patterns without meeting the full diagnostic criteria for bulimia nervosa. Purging often is a common characteristic of a more severe case of bulimia nervosa. Cognitive behavioral therapy CBT , which involves teaching a person to challenge automatic thoughts and engage in behavioral experiments for example, in session eating of "forbidden foods" has a small amount of evidence supporting its

use. He states in order for the therapy to work, all parties must work together to discuss, record and develop coping strategies. Barker claims by making people aware of their actions they will think of alternatives. Adolescents are at the stage where their brains are still quite malleable and developing gradually. Topiramate may also be useful but has greater side effects. Any trials which originally suggested that such combinations should improve the outcome have not proven to be exceptionally powerful. Some positive outcomes of treatments can include:

Chapter 6 : Bulimia nervosa - Diagnosis and treatment - Mayo Clinic

Treatment of bulimia, as with all eating disorders, can be challenging. Effective treatment addresses the underlying emotional and mental health issues â€" issues that can often date back to.

Physical signs and symptoms of this eating disorder are: Bulimia Treatment Since negative body image and poor self-esteem are often the underlying factors at the root of bulimia, it is important that therapy is integrated into the recovery process. Treatment for bulimia nervosa usually includes: Discontinuing the binge-purge cycle: The initial phase of treatment for bulimia nervosa involves breaking this harmful cycle and restoring normal eating behaviors. The next phase of bulimia treatment concentrates on recognizing and changing irrational beliefs about weight, body shape, and dieting. The final phase of bulimia treatment focuses on healing from emotional issues that may have caused the eating disorder. Treatment may address interpersonal relationships and can include cognitive behavior therapy, dialectic behavior therapy, and other related therapies. Seek out an eating disorder treatment facility in your area. Articles on Bulimia Nervosa Recovery from an eating disorder is difficult and there are many opportunities to backslide into old habits. There are tools available that will help in the continued journey of recovery after the completion of treatment. One of the more detrimental and common side effects of bulimia involves dental damage. The negative ways in which teeth are impacted by bulimia is often overshadowed by other major health consequences, such as cardiovascular complications, electrolyte imbalances, gastrointestinal distress, and bone loss. Trying to getting insurance coverage for bulimia is a confusing and frustrating experience for many patients, families and treatment providers. Several factors play into the difficulties. Interpersonal Therapy is based on a simple idea: Weight fluctuations can be a common occurrence within a healthy individual. However, individuals who consistently engage in chronic dieting behavior, as well as individuals suffering from bulimia nervosa, experience weight fluctuations beyond the normal day to day variance. Bulimia Nervosa is a psychological disorder resulting in devastating health consequences if left untreated. New research findings are creating more effective methods and approaches for the treatment of bulimia nervosa, which can improve outcomes for individuals seeking recovery from this eating disorder. Addressing the underlying issues related to bulimia along with the use of effective psychotherapy methods can dramatically improve the chances for recovery. Learn more about these new research findings for bulimia treatment in this article. Often times, men and women with eating disorders may not appear as though they are struggling. Part of this is due to the fact that eating disordered behaviors are hidden and may not be as obvious to concerned family and friends. This is especially true for Bulimia, where binge and purge cycles are usually done in secret. This secrecy can allow individuals suffering from Bulimia to do so for several years before seeking help. If you are concerned that someone you care about may be struggling with Bulimia, read this article to learn more about identifying signs and tips for approaching your loved one with bulimia. Add the chaos and pressure from the transition to college life and the lifestyle changes this involves, and the perfect storm may be created for college students struggling with bulimia. Is it possible to be compelled to lose weight for reasons other than aesthetics? Last but not least to ask is, whether there are external forces that reinforce weight loss in order to achieve success in an occupation or avocation? I would like to examine some of those differences to illustrate how an obvious, general similarity can obscure a telling difference. Exercise, body image, and the effects of media among males are prime examples where apparent similarities with females can obscure crucial differences. Because excessive exercise is a normative behavior in competitive athletes, exercising as a compensatory behavior may go unrecognized, thus putting the athlete at physical and psychological risk. When a loved one is struggling tension is often created within the family unit. Eating disorders are often said to be both compulsive and impulsive. Compulsive means to act repeatedly on an irresistible urge. Impulsive means to act without thought, to act on a whim. So, eating disorders are repeated behavior, often taken without thought. What about the link between specific manifestations of an eating disorder and impulsivity, though? How does bulimia intersect with impulsive behavior? When a bulimic individual purges their body, they are inadvertently robbing their body of insulin. This is the same with a diabetic who purges or limits their insulin injections. For

this reason, diabetics have a higher chance of becoming bulimic, compared to individuals who are not. Young women with Type One diabetes are shown to be 2. The National Center on Addiction and Substance Abuse has shown that approximately 35 percent of all women who suffer from alcoholism also suffer from an eating disorder. Eating disorder sufferers also have an increased risk of abusing alcohol or illicit drugs, with studies revealing that up to 50 percent of individuals with eating disorders simultaneously struggling with substance abuse. For a mother who is trying to raise a family while also dealing with an eating disorder, the struggles encountered are much more intense and forceful. The effects of a severe psychiatric illness, such as bulimia, are wearisome for any individual who may be suffering from this disorder. Unless we have lived it ourselves, bulimia may seem clouded in mystery. Without the facts, misinformation circulates. If we want to be part of the solution, we do well to become more informed about this troubling psychological disorder. Here are a few common misunderstandings. Weight suppression WS is defined as highest ever historical weight minus current weight. It represents a measure of the level of weight lost since being at the highest ever weight achieved over a lifetime. Although the psychological and behavioral symptoms of bulimia nervosa BN are undoubtedly the major focus in this eating disorder, it has been argued that the magnitude of weight suppression may play an important role. Researchers have discovered a link between women who suffer from post-traumatic stress disorder PTSD and bulimia, finding that the chances of developing bulimia nervosa are increased significantly when an individual is diagnosed with PTSD. While headway has been made to moderate the impact of the thin-ideal in the sports and dance industries, similar pressure is yet to be applied to the beauty and fashion industries. There is little doubt that the pressure to be thin has seen an increase in eating disorders in recent years and there is much evidence that social norms and ideals can be changed. In a similar way that the public health discourse of smoking has changed radically in the last years, so too, can discourse around thinness transform to occupy a new and better-informed space in the health debate. Here are some helpful things you can do. While no single factor can be pinpointed as the cause of bulimia nervosa, the role of genetics in eating disorder development has been increasingly understood. Because the heritability factor is not as readily discussed, it seems more straightforward to base our insight on these disorders on what we know, namely what is seen in our environment. For those who have struggled with Bulimia, it is easy to identify and recognized the heightened anxiety that often comes hand-in-hand with this mental illness. Whether severe anxiety is a co-occurring condition with Bulimia, if anxiety is induced by the eating disorder, or if bulimia is used to help cope with anxiety, these two conditions are often intertwined.

Chapter 7 : Treatment for Bulimia

Bulimia nervosa (often just called bulimia) is a condition where you think a lot about your body weight and shape. It affects your ability to have a 'normal' eating pattern. Bulimia is one of the conditions that form the group of eating disorders that includes anorexia nervosa.

A further two trials were excluded from this section, but included in the earlier section of psychological treatments versus wait-list control or placebo Griffiths, ; Lee, In addition, eight trials Bailer, in press ; Chen, ; Garner, ; Hsu, ; Jansen, ; Kirkley, ; Leitenberg, ; Sungotborgen, found during the search for new evidence, were included. Thus, 18 RCTs comparing two different psychological treatments, involving participants, were included in this section. One trial involved a comparison of CBTâ€"BN with psychodynamic psychotherapy Garner, , but presented no follow-up data. Four trials had a comparison of CBTâ€"BN with focal supportive psychotherapy Agras, ; Fairburn, ; Freeman, ; Kirkley, using follow-up periods ranging between three and 12 months. Full details of the studies included in the guideline and the reasons for excluding studies are given in Appendix Evidence statements 11 Effect of treatment on remission from binge eating and purging There is evidence from two trials that CBTâ€"BN when compared to IPTâ€"BN improves remission from binge eating and purging by the end of treatment, but is no longer superior at post-treatment follow-up: Additional considerations in the management of children and adolescents Bulimia nervosa is rarely, if ever, seen in children. It does occur in adolescents although in clinical practice most patients are young adults. There has been no research on the treatment of adolescents with bulimia nervosa. This omission needs to be rectified. In line with much current clinical practice, the GDG took the view that, subject to adaptation to their age, circumstances and level of development, adolescent patients with bulimia nervosa should receive the same type of treatment as adults with the disorder. In the treatment of adolescents with CBT-BN consideration should also be given to the appropriate involvement of the family. Clinical summary Four main conclusions may be drawn from these analyses and the studies upon which they are based. First, until recently, most of the studies of the psychological treatment of bulimia nervosa have been small in size and, therefore, lacking in statistical power. They have therefore been vulnerable to Type II error. Thus, the great majority of the many statistically non-significant findings cannot be interpreted. Second, the weight of evidence as measured in terms of the strength and consistency of the findings and the number of relevant studies indicates that CBTâ€"BN delivered on a one-to-one basis is the most effective treatment for bulimia nervosa. However, its use has fallen from favour because it is difficult to implement and disliked by patients Bulik et al. Clinical practice recommendations 7. As a possible first step, patients with bulimia nervosa should be encouraged to follow an evidence-based self-help programme. Health care professionals should consider providing direct encouragement and support to patients undertaking an evidence-based self-help programme as this may improve outcomes. This may be sufficient treatment for a limited subset of patients. Adolescents with bulimia nervosa may be treated with CBTâ€"BN adapted as needed to suit their age, circumstances and level of development and including the family as appropriate. When people with bulimia nervosa have not responded to or do not want CBT, other psychological treatments should be considered. Interpersonal psychotherapy should be considered as an alternative to CBT, but patients should be informed it takes eight to 12 months to achieve results comparable with CBT. A wide array of drugs that act on various receptors within these pathways have been examined in the treatment of bulimia nervosa. Current practice Antidepressants are often employed as a first line treatment as they are easily used in primary care. Drugs are not as acceptable or as well tolerated as psychological treatments in this patient group. Only short-term effects have been studied and the outcome measures used are often not comparable to those used in studies of psychological treatments. People with bulimia nervosa have an increased risk of self-harm and so risks of overdose need to be considered. Drugs that require dietary restrictions, such as monoamine-oxidase inhibitors MAOIs may be less appropriate in this group. They may also be using a wide variety of non-prescription medication the effects of which are unknown and may interact adversely with prescription medication. Particular consideration needs to be given to the possibility of pregnancy and breast-feeding. Very few drugs are recommended for children and

adolescents aged less than There are safety data available for other conditions for sertraline and amisulpride in the under 18 group but the use of these medications has not been studied in adults with bulimia nervosa. Antidepressant drug treatment In clinical practice, it has often been found that any drug effect is poorly sustained and it is often necessary to switch medication in an effort to sustain a remission of symptoms. The effective dose of fluoxetine is 60 mg, and as such is higher than the standard dose for depression. No other drug studies have compared different doses. Drugs reviewed The following drugs were included:

Chapter 8 : Bulimia Guide: Causes, Symptoms and Treatment Options

Bulimia Treatment Programs Bulimia is a common eating disorder associated with anxiety around food, cravings that are uncontrollable, body image distortion and dissatisfaction. Outpatient treatment and medication can be effective for some, but frequent binges and purges can be dangerous and a higher level of care should be considered if.

Constipation or other bowel problems Gastrointestinal problems, such as bloating, heartburn or acid reflux Fertility problems Diagnosis The central characteristics of bulimia nervosa are binge eating and a preoccupation with weight or body image. Severe eating binges occur regularly, along with a sense of loss of control. The person performs compensating behavior such as purging, exercise or excessive dieting. See a doctor if you feel worried about such thoughts and behaviors connected to food and weight. Your doctor will ask you about your medical history and do a physical examination to check your general health. She or he may also order blood tests to check for problems associated with vomiting or laxative use. Your doctor will also explore whether you have any other areas of mental distress, such as obsessive-compulsive disorder, an anxiety or mood disorder, or problems with substance use. Expected Duration Bulimia can last for a short time, for example, during a period of stress or a life transition, or it can continue for many years. About a quarter of individuals with bulimia get better without treatment. With treatment, more than half improve. But even after successful treatment, bulimia can return, which is why experts often recommend maintenance treatment. Estimates of frequency and severity vary widely. Prevention There is no known way to prevent bulimia. Treatment can be easier if the problem is detected early. Treatment An eating disorder is a complex mix of physical and emotional problems. Therefore, health care providers try to organize a treatment that can address these problems comprehensively. The goals of treatment are to help the patient meet her or his goals reduce or eliminate binge eating and purging treat any physical complications provide education and motivate the individual to restore healthy eating help the individual understand and change harmful thought patterns related to the disorder identify and treat any associated mental disorders for example, depression or anxiety encourage and develop family support prevent relapse Treatment includes nutritional counseling, psychological counseling or therapy, and medication such as antidepressants. It is often most helpful to combine a few of these approaches. As long as there is no acute medical danger, the person with bulimia should be encouraged to establish personal goals. Nutritional counseling usually involves developing a structured meal plan and learning to recognize body cues and urges to binge and purge. A significant number of people with bulimia nervosa see improvements with relatively simple interventions, like being taught about the illness or using guided self-help programs. Cognitive behavior therapy CBT is the best-studied approach, and it has proven to be effective. In general, psychotherapy aims to help people with bulimia improve their body image, understand and deal with their emotions, modify their obsessive thinking and compulsive behaviors related to food, and gain healthy eating behaviors. To address the behavior, a CBT therapist may first teach about the illness itself, help plan regular meals, encourage monitoring of urges, and suggest ways to cope with them. On the cognitive side, the therapist will help the patient to understand stresses that trigger unhealthy eating and to modify attitudes and beliefs that contribute to the binge and purge cycle. Family and group psychotherapy can be helpful, too. Self-help groups and homework guided by a professional can also be good supplements to a treatment plan. Medication can reduce the urge to binge and purge, particularly in the short term. But most patients are not able to manage an ongoing problem with medication alone. Therefore most experts recommend combining medication with psychotherapy or other kinds of support. Fluoxetine Prozac has been most frequently studied medication and is effective. There is less evidence for other antidepressants. But alternatives are worth considering if a fluoxetine trial has not been helpful. On average, doses for bulimia are higher than the average dose for depression, and more similar to the dose for obsessive-compulsive disorder. Because mood and anxiety disorders are often present, medication may be aimed specifically at those disorders. When To Call a Professional Contact a health care professional physician, counselor, psychiatrist if you have symptoms of bulimia. If you do not feel comfortable doing so, talk to a trusted friend or family member about your concerns and ask them to contact someone for you. If

someone you know shows signs of bulimia, gently encourage him or her to contact a physician or mental health professional. Given the common tendency to feel shame and the desire to keep the eating disorder a private matter, it is likely that the person will be reluctant to openly acknowledge the problem. For more information on how to talk to someone you suspect is bulimic, see the Additional Information section below. Prognosis Many people with bulimia recover, especially if their condition is treated early. Unlike patients with anorexia nervosa, patients with bulimia are much less likely to require hospitalization. In long-term follow-up studies, as many as 70 percent of people with this disorder completely stop having bulimia symptoms. Some do continue to struggle with eating problems of varying degrees of severity. Treatment improves chances of improvement. Prognosis is better if the illness starts in adolescence. Prognosis is worse if the person has other psychiatric problems, such as obsessive-compulsive disorder, a mood problem or a personality disorder, but outcomes are better in those cases if the person also gets treatment for those disorders.

Chapter 9 : Bulimia Nervosa Symptoms

Bulimia nervosa, also known as simply bulimia, is an eating disorder characterized by binge eating followed by purging. Binge eating refers to eating a large amount of food in a short amount of time.

Received Dec 16; Accepted Feb This article has been cited by other articles in PMC. Abstract Inherent to anorexia nervosa and bulimia nervosa are a plethora of medical complications which correlate with the severity of weight loss or the frequency and mode of purging. Yet, the encouraging fact is that most of these medical complications are treatable and reversible with definitive care and cessation of the eating-disordered behaviours. Herein, these treatments are described for both the medical complications of anorexia nervosa and those which are a result of bulimia nervosa. Treatment, Bulimia nervosa, Anorexia nervosa, Medical complications Background As opposed to most other psychiatric disorders where there may be no medical complications associated with those illnesses, anorexia nervosa and bulimia nervosa inherently have many different medical complications. The specific treatments for those associated with anorexia nervosa and bulimia nervosa are described below. Anorexia nervosa Treatment of secondary amenorrhoea and infertility Secondary amenorrhea is a hallmark of anorexia nervosa. Although no longer considered a diagnostic criterion, it is nevertheless a nearly ubiquitous feature of severe weight loss and can often be a presenting feature of the disease [1 , 2]. The development of amenorrhea is most strongly correlated to loss of body weight. There is variability in the literature regarding the degree of weight restoration needed for resumption of menses, with some sources citing return to ninety percent of ideal body weight, and others seeing a stronger correlation with the weight at which cessation of menses was observed [3 , 4]. Although weight restoration is the mainstay of treatment for amenorrhea in the setting of anorexia nervosa, there has been some investigation into pharmacologic intervention targeted at the disrupted hypothalamic-gonadal axis. Leptin is a hormone that is secreted by adipocytes and functions as a mediator in the adaptation to energy deprivation. Women with hypothalamic amenorrhea have been shown to have low leptin levels compared to matched controls [5 , 6]. Two studies have demonstrated that administration of recombinant leptin can restore function of the hypothalamic-gonadal axis, with the resumption of menses [7 , 8]. However, these studies were performed in subjects, who despite having hypothalamic amenorrhea, had weights which were only in the low-normal range, and therefore the results have limited applicability to the overall anorexia nervosa population. Therefore given the generally reliable resumption of menses with weight restoration, it would seem that there is generally little role for a pharmacologic intervention to achieve this effect sooner. Hence, it is, once again, inadvisable to use oral contraceptives in this setting singularly for the purpose of inducing a withdrawal bleeding for patients with anorexia nervosa. There has been essentially no clinical benefit demonstrated for estrogen replacement in this population [9]. Moreover, induction of withdrawal bleeding can give a false sense of wellness to these patients which potentially can temper motivation for ongoing necessary nutritional rehabilitation and weight restoration. Despite lack of menses, it is possible for women with anorexia nervosa to become pregnant, and therefore it should not be assumed that contraception is unnecessary in these patients [10]. However, women with a history of anorexia are more likely to have future problems with fertility, and are more likely to have persistent amenorrhea regardless of weight restoration, as compared to the general population [11]. Women with a history of anorexia nervosa who do become pregnant are at greater risk for pregnancy complications such as hyperemesis gravidum, and spontaneous abortion, as well as adverse neonatal outcomes such as low birth weight [12 , 13]. Given the lack of clear correlation between features of anorexia nervosa and subsequent pregnancy complications, there is no clear treatment or preventative measure for this issue, other than treatment of the underlying eating disorder and nutritional deficiencies. Treatment of bone disease Decrease in bone mineral density is commonly found in anorexia nervosa. Therefore, it is estimated that patients with anorexia nervosa are three times more likely to have a fracture, compared with the general population [14]. The degree of bone loss has been correlated both with body mass index and duration of amenorrhea [15]. Contrary to the bone mineral density loss observed in post-menopausal women, bone loss in anorexia nervosa seems to be driven by a multifactorial process beyond just low estrogen, including

hypercortisolemia, and reduced levels of androgens, leptin and insulin-like growth factor 1 IGF While the mainstay of treatment for bone density loss is weight gain and restoration of menstrual function, data have shown that decreased bone density may persist long after weight has again reached a normal level [16]. Based on this observation, efforts have been made to identify an adjuvant pharmacological therapy that could aid in bone density restoration, given its often early age of onset and long-term increased fracture risk. Consideration has been given to the role of estrogen replacement therapy to target one of the many mechanisms leading to bone loss. However, there are little compelling data supporting this heretofore accepted practice. Additionally, as noted above, there exists concern that the use of estrogen in this setting, generally in the form of oral contraceptive pills, can in fact have deleterious effects by giving a false sense of normalcy [9]. There should actually be high reluctance to use it for this indication alone. Yet there is evidence of a lack of knowledge about this recommendation and many physicians continue to inappropriately prescribe estrogen therapy in anorexia nervosa [17]. While there exits one randomized controlled trial of 60 women with anorexia nervosa, that did show a statistically significant increase in bone density following treatment with oral contraceptive pills when coupled with recombinant human IGF-1 [18], further compelling data on this effect are lacking. In addition no clinical role has yet been adopted for IGF-1 in patients with anorexia nervosa. Bisphosphonates have also been investigated as a possible treatment modality to increase bone density, given their successful use in post-menopausal women. However, due to the teratogenic nature of these drugs there is some concern about their use in women of childbearing age. It is known that bisphosphonates can remain in the body for many years after discontinuation, therefore raising concern for adverse effects on fetal development during pregnancies even years in the future. There are little data available about the outcomes of children born to mothers previously treated with these medications. Additionally, the data to support the efficacy of these medications in the anorexia nervosa population are somewhat limited. The most compelling study exploring this issue is a trial by Golden et al. At one-year follow up, there was an increase in bone mineral density in both groups, correlated most closely with weight gain. The increase was greater in the alendronate group, but not significantly so compared with placebo [19]. There may be justification for their use in patients with severe osteoporosis and for males with normal testosterone levels. If the serum testosterone level is however low, then testosterone injection or patch therapy until the level returns to normal is reasonable [20]. Additional agents that have been considered as potential stimulants for bone formation and mineralization include, calcitonin, raloxifene, and testosterone, but none have been shown to have reliable effects in female patients with anorexia nervosa. There is one very recent study using teriparatide which showed substantial improvement in bone density after just six months of therapy in women with anorexia nervosa [21]. Unlike most other medical complications of anorexia nervosa, bone density loss may not be fully reversible even with restoration to a normal weight. This is one of the few complications wherein the adverse effects may persist long-term, and arguably this may be one of greatest concern given their increased long-term fracture risk. Further studies to more fully explore the use of medications, validate the degree of associated risk, and investigate new agents will be necessary to provide more effective treatment. Finally, some of the complications of anorexia nervosa do not require primary treatment once diagnosed beyond thoughtful reassurance for the patient and perhaps using the objective medical complication as leverage to try to exhort them to push on with nutritional rehabilitation and weight restoration. These include acrocyanosis, lanugo hair growth and the anemia, leukopenia and thrombocytopenia of anorexia nervosa. All of these resolve with successful treatment of anorexia nervosa. Treatment of cardiovascular complications The primary cardiovascular complications of eating disorders include hemodynamic, conduction system, and structural heart alterations. Among the most common alterations is orthostatic or relative hypotension even among ambulatory populations [23]. In general treatment of more significant hypotension can be accomplished with intravenous fluids among inpatients particularly if symptomatic, though hypotension improves with restoration of body mass. Hypotension may also accompany bradycardia making postural symptoms more pronounced. Bradycardia is among the most common cardiac complications of anorexia nervosa, but absent high-grade atrioventricular block rarely requires cardiac subspecialist consultation. In rare cases, persistent junctional rhythm may be present in patients with severe anorexia nervosa. This may delay transitions of care from

inpatient to outpatient treatment facilities and may lead to prolonged telemetry monitoring and increased hospital length of stay. In this case, we suggest provocative treadmill testing to demonstrate appropriate conversion to sinus rhythm in these patients as a means to assess cardiac electrical reserve [24]. Another common cardiac complication involving the electrical system is QTc interval prolongation, which has been postulated to underly the high risk of sudden cardiac death. However, even in patients with severe anorexia nervosa, marked QTc interval prolongation is uncommon when contributing factors such as hypokalemia are not present [25]. Expectant management of QTc prolongation is generally adequate including serial electrocardiography and telemetry monitoring in conjunction with electrolyte potassium and magnesium repletion and discontinuation of drugs known to prolong the QTc interval including anti-emetics and antipsychotics. Patients with eating disorders also exhibit alterations in autonomic function and heart rate variability [26], though the clinical implications of these abnormalities are uncertain. Another important issue in patients with restricting eating disorders is alteration in cardiac structure. Most commonly reductions in left ventricular mass are seen during starvation, but this is generally reversible. Some patients will develop pericardial effusions, which are generally self-limited and resolve with weight restoration. This finding indicates the possibility of scar tissue and could theoretically underly a propensity to sudden cardiac death. Whether theses structural changes are reversible or etiologic with regard to arrhythmogenesis remain to be determined. Finally, mitral valve prolapse in association with the aforementioned left ventricular atrophy is very common due to changes in the valve annulus. However, even in the setting of mitral insufficiency, treatment remains expectant with serial echocardiography to document resolution. Overall, the cardiac complications of eating disorders although critical to recognize, are often reversible after supervised weight restoration. Treatment of gastrointestinal complications There are multiple gastrointestinal complications due to anorexia nervosa. Delayed gastric emptying is one of the most universal of these issues [28]. Definitive treatment is weight restoration which has been shown to improve both gastric emptying and associated symptoms [29]. Diet modification can serve as effective and sufficient treatment for some patients [30]. Dividing daily calories in to smaller meals eaten throughout the day, using liquid supplements and calorie-dense foods, avoidance of excessive fiber and perhaps small-particle food sized feeds can help mitigate some of the symptoms of gastroparesis. However, for many patients symptoms are sufficiently problematic that they interfere significantly with weight restoration, and for these patients promotility agents can be considered. Metoclopramide, a dopamine receptor antagonist, has been found to be highly effective, even in small doses 2. Appreciable symptom reduction can be seen with the first dose. Concern exists with the use of metoclopramide and the development of tardive dyskinesia. However, data are lacking regarding the risk of this effect specifically in the anorexia nervosa population, which tends to use very small doses of this medication 2. Other promotility agents sometimes considered for gastroparesis treatment include erythromycin and domperidone. However, data on these agents in this population are also lacking, and concerns regarding both safety and efficacy seem to relegate them to second choices after metoclopramide [32 , 33]. Superior mesenteric artery SMA syndrome is a rare etiology of abdominal pain and vomiting in patients with anorexia nervosa. It is caused by compression of the space between the superior mesenteric artery and aorta due to loss of the intervening mesenteric fat pad. In the majority of cases, profound weight loss is responsible for this anatomic phenomenon. Like gastroparesis, SMA syndrome is a serious complication of anorexia nervosa as the obstructive symptoms further exacerbate difficulties in achieving adequate caloric intake. The mainstay of treatment for SMA syndrome in anorexia nervosa is nutritional support, to restore the mesenteric fat pad and alleviate the obstruction. Enteral feeding, either with an oral liquid diet that can transverse the obstruction, or with a feeding tube placed into the jejunum, distal to the point of obstruction are effective short-term interventions [34]. There are case studies supporting the use of total parenteral nutrition TPN for short durations in cases of SMA syndrome refractory to enteral feeding, but the risks of parenteral nutrition must be very carefully considered in this vulnerable population [35]. The dysphagia and risk of aspiration seen in the more severely underweight patients with anorexia nervosa should be treated by well-informed speech therapists who are familiar with this issue in anorexia nervosa. Specialized diets, swallowing exercises and the temporary use of a stimulator applied to the throat area by these professionals, will, along with good nutrition,

resolve their swallowing challenges [36]. Complaints of constipation frequently accompany weight loss in anorexia nervosa. However, due to decreased caloric intake and decreased motility of the gastrointestinal GI tract, slowed GI transit times and reflex hypofunction of the colon are real phenomena in anorexia nervosa [37]. With weight restoration colonic motility improves, but dietary modifications and medical therapy are often needed to treat and prevent progressive constipation and discomfort during that period of nutritional rehabilitation.