Adjusting Cognitive Behavior Therapy For Adolescents With Bulimia Nervosa: Results Of Case Series

JAMES LOCK, M.D., Ph.D.

This article reviews the types of adjustments needed to an adult protocol of cognitive-behavioral therapy (CBT) for bulimia nervosa (BN) to make it more acceptable to an adolescent population. Employing developmental principles as well as clinical experience as guidelines, these modifications include the involvement of parents, recognition of the interaction of treatment with normal adolescent developmental tasks, and allowances for typical cognitive and emotional immaturity on treatment procedures. Outcomes from a series of adolescents with BN who were treated with this modified-CBT approach show results similar to those expected in adult populations treated using CBT.

INTRODUCTION

Psychological interventions with youth work best when they mesh with normal developmental processes (Holmbeck et al., 2000; Kendall, 1993). However, in a recent review of treatment studies of adolescents, Holmbeck et al. found that relatively few (26%) even mentioned adolescent development and identified only one study that examined age as a moderator of treatment effects (Holmbeck et al., 2000). Cognitive-Behavioral Therapy (CBT) has been modified for use with younger patients with depression and anxiety disorders and appears to be effective for these conditions with patients in this age group (Brent et al., 1997; Kendall, 1994). However, there is no systematic research and no comprehensive descriptions of how best to adjust CBT for adolescents with bulimia nervosa (BN), even though substantial evidence supports the efficacy of this form of therapy for BN in adults (Agras, Walsh, Fairburn, Wilson, & Kraemer, 2000; C. G. Fairburn et al., 1991). The purpose of this article is to describe how to adjust CBT

Associate Professor of Child Psychiatry and Pediatrics, Department of Psychiatry and Behavioral Sciences, Stanford University, **Mailing address:** Stanford University, Department of Psychiatry and Behavioral Sciences, 401 Quarry Road, Stanford, CA 94305 e-mail: Jimlock@stanford.edu

AMERICAN JOURNAL OF PSYCHOTHERAPY, Vol. 59, No. 3, 2005

for adolescents with BN. General principles and illustrations of specific modifications are provided.

BACKGROUND

Both clinical and research data suggest that adolescents differ from adults in a number of ways that might have an impact on the acceptability and efficacy of psychotherapy (Feldman & Elliott, 1990). Because of developmental differences between adults and adolescents, treatments need to be adjusted to better match the needs of younger patients (Shirk, 1999; Kendall, Learner, & Craighead, 1984). Adolescence is a transitional developmental period between childhood and adulthood that is characterized by more biological, psychological, and social role changes than any other stage of life except infancy (Feldman & Elliott, 1990). The three main changes of adolescence are physiologic maturity (puberty), increased cognitive capacity (abstract thinking), and increased social maturity through role redefinition. Compared with adults, adolescents have more limited abstracting abilities and poorer executive functioning, goal-setting, and planning abilities (Sternberg, 1977; Sternberg & Nigro, 1980). This limits their perspectives on the hazards of their behaviors and decreases motivation to seek and participate in treatment. As a result of these differences adolescents may have a more limited capacity to utilize therapies that depend on insight, emotional processing, self-evaluation and goal-setting (Izard & Harris, 1995). In addition, autonomy struggles, as well as the high value placed on peer relationships, can compromise treatment collaboration, treatment adherence, and ultimately treatment effectiveness (Savin-Williams & Bernt, 1990; Trickett & Schmid, 1993). Adolescents may generalize autonomy struggles from parents to other adults, including therapists, thus compromising the development of a productive therapeutic collaboration. In addition, autonomy struggles (which are often severe enough to require therapeutic attention) with parents and other authority figures make focused psychological treatments for BN difficult to maintain. Similarly, adolescents with difficulties in peer relationships (e.g. dating or other problems with social performance and role) can derail a focused treatment by forcing therapeutic attention to these problems at the expense of time spent focused on the eating disorder.

Because of these types of predictable developmental differences, adolescents are likely to be difficult to engage, motivate, and keep focused in psychotherapy. Nonetheless, there are ways that psychotherapeutic strategies can be adapted to be more suitable for adolescents, thereby increas-

ing the likelihood that these treatments will be acceptable and effective. Key to the application of any psychological treatment to a younger cohort is developmental expertise in the area of adolescence. The following are key components of such a knowledge and experiential base: 1) an understanding of the biological/pubertal changes; psychological/cognitive changes; changes in emotional awareness and processing; 2) an appreciation of the changes in and importance of interpersonal relationships, including family relationships, peer relationships and the school; 3) an understanding of the developmental tasks of adolescence including the need for increased autonomy, development of individual identity, and an increased capacity and need for interpersonal intimacy outside the family. On the other hand, one of the major differences between adolescents and adults is their continued involvement with and dependence on their families in both an emotional and practical sense. Treatment studies for adolescent AN suggest that family involvement may be beneficial. One small case series of adolescents with BN treated with family therapy also supported this view (Dodge, Hodes, Eisler, & Dare, 1995; Eisler et al., 2000; Le Grange, Eisler, Dare, & Russell, 1992; Le Grange, Lock, & Dymek, 2003; Lock, 2002; Russell, Szmukler, Dare, & Eisler, 1987). An appreciation of these important developmental considerations serves as the foundation upon which therapists decide how best to adjust psychotherapy so that it is appropriate and acceptable for a particular adolescent's developmental needs and current trajectory.

METHODS

Sample

We conducted a pilot program of CBT adjusted as described below with a series of 34 adolescents with BN over an 18-month period. All were female. These patients ranged in age from 12 to 18 years (mean 15.8 years). Approximately 55% were from divorced families. Approximately 32% were from minority groups (8% Asian, 10% Hispanic, 4% African-American, and 10% multi-racial). Comorbid psychiatric illnesses were common in the group (depressive disorders = 25%; anxiety disorders = 7%). Antidepressants (selective serotonin reuptake inhibitors) were used to treat these co-morbid conditions in 20% of subjects. Dose levels of these antidepressants were not titrated up to dosages known to be effective for bulimia.

Assessment Procedure

Patients were diagnosed using DSM-IV criteria by the author of this report using a standard clinical interview of a patients and parents. Within

treatment and at end of treatment, rates of binge eating and purging were gathered via self-report to therapists providing CBT. Patients were followed by pediatricians with specialized training in adolescence during treatment to ensure that the patients were medically safe for outpatient treatment (Lock, 1999).

CBT Modified for Adolescents with BN

CBT for adults with BN, as conceived by Fairburn et al. (1993), is a three-stage treatment program consisting of about 20 sessions over a period lasting approximately six months (Fairburn, 1981; Fairburn & Hay, 1992; Fairburn, Marcus, & Wilson, 1993). The first stage is focused primarily on normalizing patterns of eating. The second stage is directed principally at correcting distorted thoughts and beliefs. The third stage is a short one, aimed at preventing relapse by anticipatory problem solving. The manualized version of CBT for adolescents follows a similar overall course with identical aims. The main differences are described and illustrated below.

Stage 1: The first stage of CBT for BN, which usually consists of about 10 sessions, is modified for adolescents, mainly to address problems related to motivation for treatment, collaboration in treatment, and understanding of the therapeutic process. Development of rapport and collaboration with adolescents often requires special efforts on the part of therapists. Therapists should anticipate that adolescents are slower than adults when accepting therapists as helping figures and at collaborating in treatment. To promote this working alliance, therapists should express overt interest in the adolescents' experience, perspective on their problems, treatment, and social and family context. Therapists also need to develop the ability to tolerate occasional adolescent lack of focus and need for attention to other aspects of life (e.g. friends, school) while keeping within the CBT model. Therapists often find it useful to have frequent contact with adolescent patients at the start of treatment, so brief telephone conversations and sessions scheduled close together can be used to support therapeutic engagement.

Therapists tend to need to spend additional time on educating adolescents about the purpose and process of therapy. In order to illustrate how psychotherapy (whatever the type) is supposed to work, therapists may employ diagrams, other illustrations, and an array of concrete examples. When presenting these models, therapists must carefully sequence information and frequently stop to check with patients to make sure that they are following. Additionally, therapists must choose interventions that

respect the adolescents' ability to take perspective on themselves or situations, by frequently assessing their understanding. To support these efforts at being clear, therapists will often use less abstract language and employ age-relevant examples. Teaching adolescents about the physical and psychological problems of BN as well as the model of treatment used in CBT for BN is a cornerstone of the initial treatment phase. We have found that adolescents often have difficulty acknowledging BN is a problem because they have not personally experienced any significant problems with their behaviors. In their efforts at educating adolescents therapists need to provide examples of problems that the youngsters can relate to. Some examples of information particularly relevant to adolescents include:

If friends or romantic partners discover you have BN, you might be embarrassed and humiliated;
BN often makes it difficult to participate in many social gatherings (because they involve eating);
Chronic purging can lead to swollen salivary glands and punctate lesions in the eyes, which are unattractive,
Chronic binge eating leads to weight gain (which is the opposite of the adolescent's goal).

On a practical level, therapists working with adolescents should expect that psycho-education about BN will require reiteration during treatment. Although this is also true with older patients, it is particularly likely that educational efforts at the start of treatment with adolescents will require reinforcement throughout the first two stages of treatment.

CBT FOR BN

Self-monitoring of eating and compensatory behaviors (purging, binge eating, etc.) through keeping food and weight records is a key component of CBT for BN. It is sometimes challenging for adolescents to keep logs because this involves both the ability to self-observe, as well as the effort involved in writing down these observations. Therapists should expect that adolescents will be less skilled at self-monitoring than adults, and thus, therapists will need to spend extra time focusing on the importance of keeping food records and on helping adolescents in completing samples. In the beginning of treatment, therapists working with adolescents with BN have sometimes found it necessary to complete the teens' food records for them during the sessions. Although this strategy ultimately is not ideal—the most accurate records are those completed at the time of eating, binge eating, or purging—completing records during sessions helps get

the process started or maintains the process if records were not completed between sessions.

How to help adolescents with food logs can be illustrated through work with Delia, a 14-year-old patient with BN. Delia refused to keep food records. She said she was embarrassed to have them in her purse and that she didn't have time (or could not remember) to write them up until it was too late. Her therapist patiently asked Delia to complete a food record based on her eating behaviors from the previous day during sessions. Delia was willing to do this. After carefully going over the food record, Delia was slightly more open to food record keeping, but did not keep a record for the next session. This pattern continued, with the therapist patiently persisting in explaining the importance of keeping these records and illustrating to Delia what could be learned from them. Over a period of several weeks, Delia occasionally completed a food record, a task for which she was praised highly. Throughout this negotiation, the therapist avoided criticizing Delia, instead emphasizing the need for records.

Parental involvement may be needed to keep adolescents motivated for treatment. In addition, parents need to know something of what occurs in therapy (within the bounds of confidentiality) in order to support it. We found that many (though not all) adolescents respond well to having their parents involved in meal planning and after-meal monitoring as a way to assist them in decreasing binge-eating and purging episodes. Some parents are asked to make sure their child comes to therapy and to provide regularly schedules meals (three meals and two snacks), which helps prevent binge eating by limiting access to trigger foods. These parents are asked to stay with the patient for a period of time after the mean to prevent purging by the adolescent. How parental support can make a difference in CBT for BN in adolescents is seen in Tonya's case.

As typical of many patients with BN, Tonya's pattern was to limit her food intake all morning and through the early afternoon. However, when she got home from school, she would begin to snack; this usually escalated into a binge-eating episode and subsequent purging. The importance of changing this eating pattern was emphasized to Tonya, and various methods to support this change were discussed. Ultimately, Tonya decided it would help her reestablish a healthy eating pattern if her mother to ate breakfast with her and was at home with her after school. Although this meant that Tonya's mother needed to take a leave from work, her presence helped change Tonya's eating patterns; reducing episodes of binge eating and purging. Over the next two months, Tonya was helped to be more independent in these areas and her mother returned to her usual routines.

Problems in school settings and academic performance difficulties may also complicate treatment. Therapists working with adolescents need to familiarize themselves with the school context (structure, eating schedules, and social activities) so that they can better understand how school influences eating attitudes and behaviors. On a practical level, therapists often need to provide excuses for their adolescent patients who need to miss class for psychological or medical treatments. For example, 17-year-old Rhoda's schedule at school changed daily, and on several days a week her lunch period was scheduled for after 2:00 P.M. Rhoda's food logs suggested that this long delay between breakfast and lunch supported the development of binge eating later in the afternoon. The therapist worked with Rhoda's parents and the school to change Rhoda's schedule so that she could eat at regular intervals and to ensure that she ate lunch at midday.

Adolescents, like adults, have other problems besides BN. For adolescents, though, these other problems may be more difficult to defer. This makes maintaining a strict therapeutic focus on BN more challenging. Therapists working with adolescents should expect to be more flexible overall and more tolerant of these diversions, while still maintaining a therapeutic focus on CBT for BN. To do this, therapists must set the therapeutic agenda at the beginning of each session. They may set aside a prescribed amount of time for attention to other problems the adolescent needs to discuss. Usually, these set-aside times last no more than 10 minutes, scheduled at the beginning or end of the treatment session. However, some of these common problems can be perceived incorrectly by the patient, as the following vignette illustrates:

> Rachel believed her boyfriend broke up with her because she was overweight. The therapist asked Rachel if she knew of other couples who had broken up. Rachel said she did. The therapist then asked Rachel if she could remember why these couples dissolved. Rachel came up with a list of reasons, none of which included weight. As they further examined the implication of this, Rachel struggled with seeing herself in the same category as other girls. She said she was fat, they weren't. She had difficulty identifying other possibilities for the break up with her boyfriend. Again, the therapist asked Rachel to envision each of her friends. The therapist helped her to see that her friends' weights varied considerably, some were heavier than Rachel, and some were thinner. And in no case was the girl's weight the reason for the break up.

Related to the problem of maintaining a therapeutic focus, is the potential for crises to disrupt treatment. Such crises must be addressed

through an assessment of their impact on the appropriateness and practicality of maintaining CBT for BN as the treatment. For example, if an adolescent reports being sexually abused by a parent, it is likely that CBT treatment for BN will need to be interrupted until after this crisis is addressed. On the other hand, crises related to peer relationships, usual family struggles, or school performance may briefly require the therapist's attention, but once addressed, CBT with a focus on BN can resume.

Stage 2: The second stage of CBT treatment usually spans seven or eight sessions. One aim of the second stage of treatment is to continue to monitor, progress toward, or maintenance of a regular pattern of eating. The next goal is to help the patient delineate the nature of feared and avoided foods, and to gradually reintroduce—with the help of parents—some of these foods into the diet. In addition, this stage introduces cognitive restructuring and problem-solving techniques to address common triggers for binge eating.

Food records and self-monitoring in Stage 2 are focused on the thoughts, emotional responses, and beliefs that commonly are distorted among bulimic patients. A common problem for the therapist during this stage is finding ways to help adolescents refine their self-observations, especially as these observations now focus on the emotional and social context as they relate to eating, binge eating, and purging behaviors and thoughts. Adolescents sometimes struggle with identifying, labeling, and processing their emotional states. Again, this is true for older patients as well, but with adolescents, therapists will likely need to facilitate this process more. For example, it is not uncommon for adolescents to say they "don't know" what they felt just before binge eating. Therapists sometimes find it necessary to "coach" teen-aged patients by presenting options to them and helping them to elaborate on the context. The kinds of questions therapists might ask are: "What were you doing just before you started to binge?" " Who was with you?" "Do you remember feeling angry, sad, or bored earlier in the day?" "What are you like when you feel sad, angry, or bored?" "Were you feeling like that before you binge ate?" These questions are designed to help youngsters develop self-observation skills and to promote better understanding of emotional states. With increased awareness and understanding, adolescents are more likely to make the connection needed for accurate emotional self-monitoring.

Principle targets of Stage 2 are distorted thoughts and beliefs about the body and eating. Many adolescents (like some adults) are unable to use formal cognitive-restructuring techniques without a lot of therapist assistance. This is the case because cognitive restructuring requires perspective

taking, generation of a range of alternatives, and the use of judgment about each option's viability and value. When using cognitive-restructuring techniques with adolescents, the burden of helping adolescents to use perspective, develop alternatives, and assess alternatives falls to the therapist. Therapists experienced with adolescent patients recognize that the need to do the groundwork on such efforts, especially at first. Therapists need to avoid "taking over" but will be very active in these cognitive restructuring processes. Problem solving is commonly used when formal cognitive restructuring strategies are too difficult for or are rejected by patients. Problem solving is more direct, appeals to the immediate needs of the adolescents, requires less in the way of judgment, and is practical. CBT therapists working with adolescents have found that problem solving is more likely to be employed with this age group than formal cognitive-restructuring. An example of this approach is with Rachel, a 13 year old with BN.

> When Rachel broke up with her boyfriend, who was the only person outside her family who know about her eating disorder, she felt she had no where to turn. She isolated herself from both her friends and family and increased binge eating and purging behaviors. In session she reported she had no other supports—she was angry with her mother and her brother, both of whom she felt tried to control her. She did not want any of tell any friends who were potential supports because of the shame she felt about bulimia. In examining the problem of how Rachel could find emotional support, the therapist worked with her to identify which of the options she considered to be least objectionable and why. In reviewing her need for support. Rachel felt that her mother would be the person who was most available and who was most willing to help her. This meant Rachel had to identify for her mother the ways she could be helpful as well as ways she could potentially make matters worse by being too intrusive. In a meeting with Rachel and her mother, the therapist helped Rachel explain her need for support now that her she had broken up with her boyfriend, but more important Rachel explained to her mother how she could help without making Rachel resentful and angry.

Behavioral experiments are employed in CBT to help patients extend their mastery over food, eating, and temptations to binge eat and purge. Often these behavioral experiments involve patients putting themselves in situations that are challenging (e.g. buffet meals, bakeries, eating with friends or romantic partners). Adolescents sometimes have difficulty carrying out behavioral experiments because they are practically and psychologically less independent. That is, adolescents often do not control their

time and situations to the same degree as adults. For example, adolescents have meal times are set by parents or school authorities and food choices often are limited to those made available at the school and or by adults in the home setting. In addition, many adolescents (as is expected developmentally) are inexperienced with taking on independent challenges and need support in doing so. Therefore, therapists working with adolescents often need to take a more gradual approach to recommending such experiments. That is, therapists must start slow and proceed with small steps. Therapists might also consider being a part of the experiments, for example by asking patients to bring feared food to sessions, supporting adolescents as they eat the foods, and assisting the patient in making self-observations afterwards.

Therapists have also found it helpful to ask parents to assist their adolescents in behavioral experiments. In these cases, therapists, patients, and parents decide together how this support is best structured. It may be as simple as informing the parent about the planned experiment and having the parent ask their son or daughter how it's going. Alternatively, it may be that the parents are asked to be present during the experiment and to actively support the teenager during an experiment. For example, after the son or daughter tries a feared food, the parent can volunteer to take the patient shopping, provide some other type of distraction, or to sit with the patient to support him or her as he or she tries to manage feelings of anxiety. Parents also can be helpful in these experimental activities by contributing their own observations of patient behaviors. Although the parents are not involved in the specific activities of problem solving, they provide insight and assistance in in a family context. Therapists need to educate parents about these thought processes so they can assist their children at home.

Stage 3: The third stage is primarily concerned with maintaining the change following treatment. Progress is reviewed, and realistic expectations are established. Relapse prevention strategies are taught to patients to prepare for future setbacks. In general, adolescents have had less experience with chronic BN, therefore, the possibility of relapse (which generally is well known to adults with BN) is less experientially appreciated by adolescents. Therapists should expect adolescents to minimize the potential for relapse. Therefore, therapists should focus on potential relapse in ways relevant to the adolescent, particularly through an assessment of how adolescents' developmental challenges and tasks may threaten progress in controlling BN. This attitude is exemplified by Lucinda.

Lucinda had done well in CBT and had reported no problems with binge eating or purging for several months. Her focus on weight and body shape as a source of her self-esteem also diminished. However, she remained dissatisfied with her weight and intermittently restricted food intake for six to eight hours each day. Lucinda was unconcerned about possible relapse—"I'm over that. It's too stupid. I've learned how to control it." However, the therapist gently but firmly reminded Lucinda of how she had felt she could control it before and that her current dieting still put her at risk for relapse. The therapist encouraged Lucinda to change her episodic severe dieting, but not to feel that all was lost if she should binge eat and purge. Lucinda continued to maintain that relapse was unlikely, but was open to understanding that the possibility existed. The therapist also discussed relapse with Lucinda's worried parents. The therapist reassured them that even if Lucinda had an episode of bulimic behavior in the future, this did not necessarily mean that she would again become bulimic. They were encouraged to support Lucinda by keeping a watchful eye on her and if problems arose, to encourage her to use what she had learned to stop the behaviors from becoming re-entrenched.

A special focus of CBT for adolescents with BN is the review of progress on adolescent issues and how BN and treatment affect these. Therapists need to focus on assessing which developmental tasks of adolescence patients have accomplished, and then help patients and parents identify problem areas that they may wish to focus on, particularly as they relate to prevention of a BN relapse. For example, 18-year-old Tomi was preparing to attend college at some distance from home. Her parents were worried about a recurrence of BN at college since they had read that BN was an "epidemic" on college campuses. The therapist helped to assure both Tomi and her parents that she was prepared to leave home and that the BN was well controlled. The therapist informed Tomi and her parents that most patients treated with CBT continue to do well, but advised Tomi to contact the student health center at her college to identify resources available to her should she have renewed symptoms.

Termination issues with adolescents may be somewhat more complex than with adults. The treatment relationship usually entails the family, especially the parents. In addition, adolescents can develop especially strong emotional connections to their therapists, so therapists working with this age group should be prepared to address these stronger attachments. On the other hand, many adolescents are prepared to move onto other aspects of their lives, such a college, a dating relationship, etc., so that the loss of a therapist seems of little consequence. Therefore, therapists working with adolescents should expect a range of responses to

ending treatment. However, because parents (and sometimes other family members) have been involved, some time should be devoted to terminating with them as well. It is likely that adolescents who have benefited from CBT for BN will have developed a strong attachment to their therapists and therefore, therapists should expect that even after formal termination, patients may contact them from time to time.

RESULTS

At baseline, the rate of binge eating and purging ranged from two to 21 episodes per week with a mean of 15.8 episodes per week. At end of treatment, the abstinence rate was 56% and mean episodes had been reduced to 3.4 episodes per week (range 0-21). Only 6 patients (15%) did not complete a minimum of 10 weeks or 6 sessions of therapy (18%). Data were obtained at end of treatment. See Table I.

Table I. CBT FOR ADOLESCENTS WITH BN (CASE SERIES N = 34)

Age	Pre-treatment BP per Week (Mean)	No. of Sessions	Drop Out Rate (fewer than 6 sessions)	Post Treatment B/P per Week (mean)	Rate of Reduction of B/P	Abstinence Rate
15.8 (range 12–18)	15.5 episodes (range 2–21)	15.8 sessions	18% (6/34)	3.4 episodes (range 0–21)	78%	56% (19/34)

DISCUSSION

These data suggest that CBT for BN adjusted for adolescents is acceptable and suggests that response rates are similar to those in adults (i.e. decreases in the rate of binge eating and purging and the abstinence rates are very similar to that found in adults treated with CBT). In applying CBT for adolescent BN, it is of central importance that therapists have both knowledge of and experience with adolescents. For therapists to engage adolescents effectively throughout the treatment process, it is vital that therapists understand the developmental challenges of adolescence and their implications.

Modifications applied to CBT for BN in adolescents include the following:

1) increased intensity of contact early in treatment to build the treatment alliance;
2) education and involvement of parents and other significant friends or partners when indicated;

3) simplification of language and communication style;
4) flexibility in the use of homework and food logs, especially early in treatment;
5) flexibility in the use of treatment time to examine other important, but less directly relevant issues (e.g. crises with friends, parents, and other predictable developmental problems).

None of these changes alters the fundamental features of CBT as designed for adults, but it is likely they increase the chance that treatment will be taken up, adhered to, and completed.

Attention to the external context of the adolescent's life (family and school) is an important aspect of working with most teenagers. Therapists working with adolescents often find it necessary to educate and involve (to various degrees) parents and other family members in therapy to support motivation and to enhance the milieu for therapeutic change. Therapists working with adolescents, regardless of the specific focus of therapy, should expect to devote some attention to peers and school environments because these arenas are important concerns for adolescents.

In addition, some focus on the relationship of therapeutic progress to the mastery of adolescent tasks (autonomy, identity development, and work and education activities) should be expected. Therapists should expect that work on these issues will relate to other focused therapy strategies. For example, autonomy concerns may interfere with treatment acceptance and limit family support unless the therapist is able to separate these issues. Anxiety or problems related to sexual development and experimentation are also common problems. Educational goals, such as attending college, can also become a paramount issue for some older adolescents and may require attention by therapists. Therapists should be comfortable with these developmental issues and support a circumscribed examination of them in the context of more focused therapy (i.e. CBT).

There are a number of important limitations to our current report. The sample used was a convenient clinical sample to our center, which is a tertiary treatment center for adolescents with eating disorders. In addition, it is a small case series and outcomes are limited to specific behavioral measures and do not include measures of psychological preoccupations around eating, weight, and shape which would be desirable. Therapists who provided treatment were all trained in CBT and supervised by the author of this report, which may also limit generalizabiliy of the findings. Finally, enhanced versions of CBT have been developed that include treatment modules related to self-esteem, perfectionism, and social problems that might be particularly relevant for adolescents with BN, but the

treatment program used in this study did not incorporate these additional treatments.(C. G. Fairburn, Cooper, & Safran, 2002)

In sum, although CBT is the treatment of choice for adults with BN, it has not been studied among adolescents with BN. This article describes a way to adjust CBT for BN so that it is more acceptable to adolescents and their families. The principles described here are also likely to be useful in making adjustments to other types of therapy, though the particulars would vary based on the specific strategies of the approach. An approach that is developmentally appropriate and manualized will make it possible to conduct clinical trials to test empirically the usefulness of CBT for adolescents with BN. Currently no such studies have been published, though they are much needed to help guide clinicians in their work with adolescents with BN.

REFERENCES

Agras, W. S., Walsh, B. T., Fairburn, C. G., Wilson, G. T., & Kraemer, H. C. (2000). A multicenter comparison of cognitive—behavioral therapy and interpersonal psychotherapy for bulimia nervosa. *Archives of General Psychiatry, 57*, 459–466.

Brent, D., Holder, D., Kolko, D., Birmhaher, B., Baugher, M., Roth, C., et al.. (1997). A clinical psychotherapy trial for adolescent depression comparing cognitive, family, and supportive therapy. *Archives of General Psychiatry, 54*, 877–885.

Dodge, E., Hodes, M., Eisler, I., & Dare, C. (1995). Family therapy for bulimia nervosa in adolescents: an exploratory study. *Journal of Family Therapy, 17*, 59–77.

Eisler, I., Dare, C., Hodes, M., Russell, G., Dodge, E., & Le Grange, D. (2000). Family therapy for adolescent anorexia nervosa: the results of a controlled comparison of two family interventions. *Journal of Child Psychology and Psychiatry, 41*, 727–736.

Fairburn, C. (1981). A cognitive behavioural approach to the treatment of bulimia. *Psychological Medicine, 11*(4), 707–711.

Fairburn, C. G., Cooper, Z., & Safran, R. (2002). Cognitive behavioral therapy for eating disorders: A "transdiagnostic" theory and treatment. *Behavioral Research and Therapy, 41*, 509–528.

Fairburn, C. G., & Hay, P. J. (1992). The treatment of bulimia nervosa. *Annals of Medicine, 24*(4), 297–302.

Fairburn, C. G., Jones, R., Peveler, R. C., Carr, S. J., Solomon, R. A., O'Connor, M. E., et al.. (1991). Three psychological treatments for bulimia nervosa. A comparative trial. *Archives of General Psychiatry, 48*, 463–469.

Fairburn, C. G., Marcus, M. D., & Wilson, G. T. (1993). Cognitive–behavioral therapy for binge eating and bulimia nervosa: A comprehensive treatment manual. In C. G. Fairburn & G. T. Wilson (Eds.), *Binge Eating: Nature, Assessment, & Treatment.* (pp. 361–404). New York, NY.: Guildford Press.

Feldman, S., & Elliott, G. (1990). *At the threshold: the developing adolescent.* Cambridge, MA: Harvard University Press.

Holmbeck, G., Colder, C., Shapera, W., Westhoven, V., Keneally, L., & Updegrove, A. (2000). Working with adolescents: guides from developmental psychology. In P. Kendall (Ed.), *Child and Adolescent Therapy.* New York: Guilford.

Izard, C., & Harris, P. (Eds.). (1995). *Emotional development and developmental psychopathology.* New York: John Wiley & Sons.

Kendall, P. (1993). Cognitive–behavioral therapies with youth: Guiding theory, current status, and emerging developments. *Journal of Consulting and Clinical Psychology 61*, 235–247.

Kendall, P. (1994). Treating anxiety disorders in children: Results of a randomized clinical trial. *Journal of Consulting and Clinical Psychology, 62*, 100–110.

Kendall, P., Learner, R., & Craighead, W. (1984). Human development and invervention in childhood psychopathology. *Child Development, 55*, 71–82.

Le Grange, D., Eisler, I., Dare, C., & Russell, G. (1992). Evaluation of family treatments in adolescent anorexia nervosa: a pilot study. International Journal of Eating Disorders, *12*, 347–357.

Le Grange, D., Lock, J., & Dymek, M. (2003). Family–based therapy for adolescent with bulimia nervosa. *American Journal of Psychotherapy, 67*, 237–251.

Lock, J. (1999). How clinical pathways can be useful: An example of a clinical pathway for the treatment of Anorexia Nervosa in adolescents. *Clinical Child Psychology and Psychiatry, 4*, 331–340.

Lock, J. (2002). Treating adolescents with eating disorders in the family context: Empirical and theoretical considerations. *Child and Adolescent Psychiatric Clinics of North America, 11*, 331–342.

Russell, G. F., Szmukler, G. I., Dare, C., & Eisler, I. (1987). An evaluation of family therapy in anorexia nervosa and bulimia nervosa. *Archive of General Psychiatry, 44*, 1047–1056.

Savin–Williams, R., & Bernt, T. (Eds.). (1990). *Friendship and peer relations*. Cambridge, MA: Harvard University Press.

Shirk, S. (Ed.). (1999). *Developmental therapy*. Boston: Allyn & Bacon.

Sternberg, R. (1977). *Intelligence, information processing, and analogical reasoning: the componential analysis of human abilities*. Hillsdale, NJ: Erlbaum.

Sternberg, R., & Nigro, G. (1980). Developmental patterns in the solution of verbal analogies. *Child Development, 51*, 27–38.

Trickett, E., & Schmid, J. (Eds.). (1993). *The school as a social context*. New York: John Wiley & Sons.