

**CLINICAL CASE REPORT**

# Applying family-based treatment (FBT) to three clinical presentations of avoidant/restrictive food intake disorder: Similarities and differences from FBT for anorexia nervosa

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**Abstract**

**Objective:** This article uses three brief case reports to illustrate how family-based treatment (FBT) can be used to treat pre-adolescents with avoidant/restrictive food intake disorder (ARFID).

**Method:** We present case material illustrating how FBT can be used in three different clinical presentations of ARFID: (1) low appetite and lack of interest; (2) sensory sensitive eaters; and (3) fear of aversive consequences eaters—all without shape or weight concerns.

**Results:** This case material illustrates that the main principles of FBT—agnosticism as to the cause of the illness, externalization, emphasizing the seriousness of ARFID, parental empowerment, behavioral consultation, and practical behavioral focus—are applicable for a range of ARFID clinical presentations. Common challenges in this patient group include (1) promoting urgency; (2) challenging long term behavioral accommodation; (3) lack of parental alignment, parental fatigue, (4) and co-morbid psychiatric problems in the patients. Strategies to address these problems are described.

**Conclusion:** FBT can be adapted for children with ARFID using the main principles of the approach.

**KEYWORDS**

avoidant/restrictive food intake disorder, case studies, family-based treatment

## 1 | INTRODUCTION

Avoidant/Restrictive Food Intake Disorder (ARFID) was introduced in the DSM-5 (American Psychiatric Association, 2013). Dietary restriction is a key feature of ARFID, but this is not driven by weight or shape concerns. Patients often present with one or more of the following eating related symptoms: (1) low appetite and Lack of Interest (LOI) eaters; (2) sensory sensitive eaters; and (3) fear of aversive consequences eaters—all without shape or weight concerns. Currently, there is a limited evidence base for treating this disorder (Sharp et al., 2016; Sharp, Volkert, Scahill, McCracken, & McElhanon, 2017). While family-based treatment (FBT) is effective for other eating disorders in

youth, it has not yet been systematically examined for ARFID (Lock, 2015). We present three cases that employ manualized FBT for ARFID in pre-adolescent patients. We organize and discuss each of these cases focusing on the primary clinical symptoms that lead to referral for treatment, but it is noteworthy that other types of ARFID eating problems were also sometimes present and were addressed in treatment.

An initial description of how FBT might be used with sensory sensitive eaters was published in 2015 (Fitzpatrick, Forsberg, & Colborn, 2015). These beginnings encouraged an expansion of FBT for other symptomatic expressions of ARFID and the development of a more detailed and expanded protocol and manual that was used in these

case reports. Thus, FBT-ARFID utilizes the following main intervention strategies: maintaining agnosticism as to the cause of ARFID; promoting externalization or separation of the illness from the patient and family to reduce guilt and blame; emphasizing the serious health and developmental problems if ARFID is not addressed, empowering parents as the primary agents for managing behavioral change; consulting and promoting parental decision making rather than providing directive or protocolized interventions; and cultivating a practical behavioral focus on changing maintaining dysfunctional eating behaviors rather than focusing on family process or individual patient dynamics (Lock & Le Grange, 2013). In addition, consistent with FBT-AN, FBT-ARFID uses Session 1 to spur the parents to take action to change dysfunctional eating behaviors by highlighting the negative impact of these behaviors on the patient, family, and developmental trajectory of their child. Also similar to FBT-AN, FBT-ARFID employs a mealtime Session 2 that allows the therapist to consult directly to parental management of mealtime behaviors and initiate the behavioral change learning process.

Table 1 outlines the key adaptations made in manualized FBT-ARFID to address the needs of patients with different clinical presentations of ARFID. The three cases presented in this article illustrate FBT-ARFID in action. In addition, independently assessed changes in these patients' diagnosis are reported in Table 2 using The Eating Disorder Assessment for DSM-5 (EDA-5; Sysko et al., 2015) and patients' weight. Further, clinical symptoms changes are reported using the Pica, ARFID, Rumination Disorder Interview (PARDI) (Bryant-Waugh et al., 2018). The PARDI is a new measure designed to diagnose and evaluate symptom severity of ARFID. It consists of 83 questions that employ a Likert 7-point scale from 0 (no symptoms) to 6 (severe symptoms). In preliminary studies, the measure has proved feasible, acceptable, and reliable with good internal consistency and inter-rater reliability. Preliminary data also demonstrates the measure's validity and ability to distinguish ARFID patients from other clinical groups (Bryant-Waugh et al., 2018). While mean scores for the sub-scales are available, clinical cut-points are not yet specified.

In addition, estimated mean body weights (EBW) percentages used in these reports were calculated using Center for Disease Control metrics in children and adolescents (Kuczmarski, Ogden, & Guo, 2000).

### 1.1 | Case 1: FBT for ARFID-lack of interest

Lilliana is 8 years old with two parents and a younger brother. Since infancy she has been significantly below the average growth curve for her age and gender due to persistent under-eating.

Session 1 began by taking a history of the impact of ARFID on Lilliana and the family. Her parents were worried about her low weight and under-eating, but also expressed fatigue and frustration. Although Lilliana consumed a range of foods, she would eat only small amounts and avoid eating for long intervals. She also complained of "tummy aches" when pressured to eat more. The therapist used this information to externalize and separate the eating problems associated with ARFID from Lilliana herself by discussing that this life-long predisposition to low appetite is not a willful behavior, but a consequence of ARFID. The aim in taking this agnostic position is to reduce parental guilt, so as to empower the

parents and to decrease any blaming of Lilliana—emphasizing that they are fighting an illness, not their daughter.

For Session 2, as requested at the end of Session 1, the parents brought a meal they decided together would begin to reverse Lilliana's low weight if she ate it. Lilliana began by eating sliced cucumbers while her mother held a peanut butter and jelly sandwich on her lap but did not offer it to Lilliana. When the therapist asked about this, the parents replied they encouraged Lilliana to eat her vegetables first. After the therapist pointed out that this might lead to Lilliana "filling up" on low calorie foods, the parents offered Lilliana the sandwich and she ate it. The therapist complimented the family on making this change, because the sandwich—being more calorically rich than the cucumbers—would lead to greater weight gain which was essential to Lilliana's health at this point. The therapist asked the parents how they would incorporate denser foods earlier and more consistently at meal-times and reduce the time between meals and snacks. She helped them develop a plan to implement these changes during the upcoming week.

During the subsequent sessions of Phase 1, the therapist used a weight chart to highlight progress as the family worked on increasing consumption of calorically rich foods. Working with the therapist, the parents began using contingency rewards (e.g., nightly reading with dad was contingent upon finishing dinner; swim lessons were contingent upon finishing snacks) and increased meal time structure (e.g., starting dinner earlier to decrease the urge to rush to finish so as not to delay other evening activities; starting meals with high calorie foods; using timers to help improve Lilliana's awareness of meal time).

In Phase 2, treatment focus shifted to tackling fullness aversion and eating lunch at school. At the outset of Phase 2, Lilliana stated that her primary reason for not eating lunch at school was because she wanted to talk with her friends during that time. Her parents agreed that this was true, but also pointed out to Lilliana that she ate so slowly that she ran out of time for free play. One thing that helped Lilliana improve her rate of eating lunch was using the same type of meal time structure that she had been using during dinner at home. Lilliana and her parents set goals together, such as having Lilliana take a bite of food and chew while her friends were talking before joining back in the conversation after she swallowed. Over time, this became more natural to Lilliana, and she successfully ate enough at school that her weight continued to improve.

By the end of treatment, one of Lilliana's parents noted: "Before we relied only on her cues, which were minimal. Now we can create the infrastructure and regime to help her." Though Lilliana still did not show major changes in her interest in food or eating by the end of therapy (which lasted 9 months and consisted of 19 sessions), she became capable of eating sufficient quantities within a reasonable time frame and eating-related conflicts in the family decreased markedly while her weight approached normal levels (Table 2).

### 1.2 | Case 2: FBT for ARFID-sensory sensitivity

Allison is a 9-year-old girl with 2 parents and a 3-year-old sister. ARFID became evident when she was a toddler. Over the course of her childhood, Allison's eating preferences became increasingly restricted to white and bland foods. She would eat only specific

**TABLE 1** Common and adaptive interventions of family-based treatment for anorexia nervosa and avoidant restrictive food intake disorder subtypes

<b>Common interventions</b>				
Agnosticism (no focus on etiology or cause to reduce guilt and blame)				
Parental empowerment (parents are the main agents of change)				
Externalization (separating the problematic eating from the patient and the family to reduce self-blame and guilt)				
Emphasizing the seriousness of ARFID (orchestrating of an intense scene to promote the need for immediate parental intervention)				
Consultative stance (therapist facilitates parental learning rather than prescribing or directing them)				
Pragmatic (focus on behavior change—normalized eating and related behaviors)				
No direct focus on cognitive distortions				
<b>Adaptive interventions by ARFID sub-type</b>				
	FBT-lack of interest (LOI)	FBT-sensory sensitivities	FBT-fear of aversive consequences	FBT-anorexia nervosa (AN)
Principle treatment target (use of weekly targets to evaluation progress) <sup>a</sup>	Weight gain (usually slow but steady) and decreased meal time durations.	Increased range of foods tried and consistently employed in the diet.	Decreased anxiety and fear about eating is a key goal. Weight gain is often an important goal but is highly variable depending on how rapidly fear decreases	Weight gain, normalization of eating processes, returning to typical adolescent development.
Sibling involvement	Desirable, but not absolutely necessary. Siblings can model healthy eating and are often affected by the under-eating of the affected sibling because of parental focus and concern about this issue; thus, it can be helpful for them to participate in FBT-ARFID.	Desirable, but not absolutely necessary. Siblings can model healthy eating and are often affected by the limited food choices of the affected sibling because of parental focus and concern on this issue; thus, it can be helpful to them to participate in FBT-ARFID.	It is helpful to include siblings in FBT for fear of aversive consequence of eating because they are able to provide both context and support for their sibling whose change in eating has been acute. This sibling support is similar to FBT-AN.	In conjoint FBT, siblings provide support to their affected brother or sister as the parents focus on changing the behaviors maintaining AN.
Session 1	The specific challenge for LOI ARFID sub-type in session 1 is to increase parental anxiety because the problem of LOI is often life long and family accommodations are entrenched. To address this problem, therapists must focus on the long-term impact on growth, physical maturation, and social processes associated with under eating that are at risk if the problem of under-eating is not resolved.	Because sensory sensitivities related to food are often life long, the family has often made accommodations related to them that are entrenched. To address this problem, therapists must focus on the long-term impact on growth, physical maturation, and social processes with eating that are developing and will likely worsen if the problem of under-eating is not resolved. To aid in this process, the Always, Sometimes, Never (ASN) list <sup>b</sup> is used. This list is completed at the end of session 1 and the parents are asked to use it in planning the meal in session 2.	Session 1 for fear of aversive consequences based ARFID children is very similar to FBT-AN; the review of the acute onset of under and fearful eating and the impact on the development, social, and family life of the child is reviewed; the need for urgent action to reverse the impact of this change in eating is emphasized; the need for parents to insist on change is also emphasized.	Orchestrating an intense scene about the seriousness of the disorder, wherein the seriousness of AN is emphasized while supporting the parent's by empowering them to take action to reverse the eating disorder.
Session 2	The challenge of the meal session for LOI ARFID sub-type patients is facilitating parental experimentation with challenging the under-eating by helping them to recognize when they are not working together as parents, not setting specific expectations, and not	The challenge of the meal session for the sensory sensitivity child is helping the parents encourage their child to try new foods. The therapist uses the ASN list <sup>b</sup> in discussing what the parents brought (did they only bring "Always" foods? "Never" foods? A mixture?) and helps them	The meal session most resembles that in FBT-AN because as fear of aversive consequences based ARFID incites many of the extreme emotions in the child—Severe anxiety, fear, and emotional outbursts are to be expected. Although the anxiety and fear are	The meal session is focused on helping the family learn what behaviors they do that keep AN in place and identifying alternatives they can try to challenge self-starvation.

(Continues)

TABLE 1 (Continued)

Common interventions				
	consistently insisting that their child eats sufficient amounts of calorically dense foods in a reasonable meal time period.	to identify their decision making processes. It is not unusual that parents are not aligned about what is important to change and the therapist helps them to understand the need for alignment if they are to be successful in changing eating behavior.	usually not as strong or persistent as in AN, parents often react similarly to those with children with AN—Avoidance, over protectiveness, frustration, and defeatism are common. The therapist uses this session to help the parents begin to identify these reactions and overcome them with a behavioral focus on eating and developing a clear plan of action.	
Remainder of phase 1	The challenges for LOI ARFID during the remainder of phase 1 include parents not prioritizing weight gain, falling back on old routines that do not work, and becoming impatient with the slow weight progress. The therapist can help with this by continuing to emphasize that the child's health depends on adequate nutrition; helping the parents to set specific but limited goals for increased intake; and normalizing the slower progress in addressing a chronic behavioral problem like life-long under eating.	Because there is often no overt or serious current medical problem associated with the child's eating, it is difficult for some parents to continue to focus on this and to commit to expanding food choices; thus, the therapist is often driving the process by emphasizing the long-term impacts of limited food choices on social and physical development. It is often possible, unlike AN, for the child to be involved in identifying both new foods to try and the pace of exposures using the ASN <sup>D</sup> list.	The remainder of phase 1 is focused on supporting the parents in continuing to present feared foods. As with FBT-AN, this process usually involves gradual, persistent exposure to the feared foods using supportive and noncritical techniques. Challenges include concerns about other mental health problems (e.g., anxiety, depression, trauma) taking the focus away from eating. It can be more challenging to involve the child in making decisions about these exposures early on as the fear is often quite profound, but later in phase 1 and during phase 2, these children can often describe what conditions help them manage their fearful eating.	The remainder of phase 1 is focused on steady behavioral management of all maintaining behaviors contributing to underweight (severe dieting, over exercise, purging). Weight gain and normalization of eating patterns are the exclusive focus. The adolescent has little voice in this process.
Phase 2	Transition to phase 2 takes place when the child is able to eat enough food to begin gaining weight, usually approximating 90% of EBW. Unlike adolescent AN, LOI ARFID patients do not fear weight gain, therefore they are more able to provide input about what will help them eat more, including acceptable high density foods. Pre-adolescent patients would not be expected to eat independently except in school. For adolescent patients, monitored independent eating and age appropriate control would be a goal of this phase.	Transition to phase 2 takes place when the child has demonstrated an ability to try new foods consistently. Unlike AN and LOI ARFID many of these younger sensory sensitivity patients do not need to gain much weight, and they are more able to provide input about what will help them eat a broader range of foods. They are also more responsive to rewards for their efforts. Pre-adolescent patients would not be expected to eat independently except in school. For adolescent patients, monitored independent eating and age appropriate control would be a goal of this phase.	Transition to phase 2 takes place when the child is eating enough to gain weight to approximately 90% of EBW and is able to eat with decreased anxiety and fear, such that the parents do not have to be present for all meals and snacks. These children have often lost significant weight during their illness and therefore weight gain is an important ongoing treatment goal; however, the main focus is decreasing fear about eating. Pre-adolescent patients would not be expected to eat independently except in school. For adolescent patients, monitored independent eating and age appropriate control would be a goal of this phase.	With partial weight restoration to approximately 90% EBW and decreased anxiety and fear about eating, the adolescent with AN is now able to begin to gradually take on eating and exercise again more independently and in an age appropriate way.

(Continues)

**TABLE 1** (Continued)

<b>Common interventions</b>				
Phase 3 <sup>c</sup>	Transition to phase 3 takes place when the symptoms of ARFID have abated such that they no longer interfere with eating, health, and social life. The focus of this phase is on helping the family focus on adolescence and the impact ARFID has had on their child's development and the challenges of adolescence. It is not relevant for patients who are not yet adolescents.	Transition to phase 3 takes place when the symptoms of ARFID have abated such that they no longer interfere with eating, health, and social life. The focus of this phase is on helping the family focus on adolescence and the impact ARFID has had on their child's development and the challenges of adolescence. It is not relevant for patients who are not yet adolescents.	Transition to phase 3 takes place when the symptoms of ARFID have abated such that they no longer interfere with eating, health, and social life. The focus of this phase is on helping the family focus on adolescence and the impact ARFID has had on their child's development and the challenges of adolescence. It is not relevant for patients who are not yet adolescents.	The focus is on helping the family focus on adolescence and the impact AN has had on their child's development (Lock & Le Grange, 2013, pp. 208–220).
Treatment intensity and duration	Because challenging entrenched under-eating and overcoming low weight requires time and focus, weekly sessions for 4–5 months are likely needed.	Because challenging entrenched food sensitivities and aversions and expanding food repertoire requires time and focus, weekly sessions for 4–5 months are likely needed.	Because fear-based ARFID is usually a relatively acute onset disorder, treatment during phase 1 can be briefer, between 2–3 months. However, sessions should be weekly during this phase. Phase 2 is also generally briefer, between 1–2 months to consolidate and generalize learning.	Treatment is typically 6–12 months, average about 9 months and 15 sessions. (Lock, Agras, Bryson, & Kraemer, 2005) sessions are weekly during phase 1, bi-weekly in phase 2, and monthly in phase 3.

<sup>a</sup> Principle treatment targets are those that will be monitoring weekly for overall progress, but many other intermediate treatment targets are likely depending on the clinical presentation. Examples of these might include the following: poor growth, nutritional deficiency, enteral feeding/supplement dependence, and psychosocial impairment. Further, although we organize this Table by ARFID sub-type for heuristic purposes to describe differences in how FBT-ARFID can be adapted for differing clinical presentations of this eating disorder, in fact clinical presentations of ARFID often overlap and clinicians should keep this mind in setting treatment targets.

<sup>b</sup> The Always, Sometimes, Never list is available as an online Appendix C ([www.routledge.com/9780415714747](http://www.routledge.com/9780415714747)) to Fitzpatrick et al. (2015).

<sup>c</sup> The patients in this case report are all pre-adolescent and did not require phase 3, for adolescents with ARFID, phase 3 would be similar to FBT-AN helping the family to see the impact of ARFID on adolescent development and focusing on transition to adolescence or adolescent issues.

brands and rejected food based on their appearance and packaging. For example, parents reported that Allison would eat only one brand of cracker, one type of cheddar cheese, and would refuse hot dogs and quesadillas if they had grill marks. As a result of these preoccupations, the family could never eat outside the home. While the parents were mostly concerned with Allison's extremely picky eating and its impact on her development and family life, she was also underweight (82.62% EBW) and the therapist aimed to help the family address both problems.

In Session 1, the therapist took a history of the impact of Allison's eating on Allison and the family. The ongoing effect of her ARFID on family mealtimes was evident, because the foods the family prepared, how they prepared them, and when and where they ate were all constrained by Allison's ARFID symptoms. Still, her parents showed little urgency to address these problems. To counter these established patterns, the therapist orchestrated an intense scene emphasizing the perils of persistent ARFID to Allison's health and development. Specifically, the therapist discussed the development of nutritional deficiencies that could impact growth and development and the likelihood of social stigmatization and isolation because of peer rejection if these behaviors were not curtailed. To externalize the illness, the therapist used the analogy of diabetes mellitus, a chronic condition that could be managed by changing behavior. Seeing ARFID as a disease like

diabetes (i.e., externalization) served to reduce blame, while encouraging and empowering the parents to take immediate action. The therapist asked the parents to complete the Always, Sometimes, Never (ASN) list at the end of the session (Fitzpatrick et al., 2015; see Table 1). The ASN list helps parents classify foods into groups that their child will eat regularly ("Always" foods) and those they struggle to eat ("Sometimes" foods) as well as those the family want her to eat ("Never" foods). This list is used to help parents identify which foods they might consider bringing to the family meal (session 2).

For the family meal in Session 2, the parents were instructed to bring a meal that included items from the list of "Never" foods identified on the ASN list. When the parents offered Allison one of the "never" foods (hummus), she became upset, turning away from her parents and refusing to respond. With encouragement and coaching from the therapist, the parents calmly repeated the instruction to eat the hummus, placed a spoonful on her plate (thereby specifying expectations), offered her forced choices (would she like it alone or on a cracker?), and removed a preferred food (raspberries) until she completed this challenge (contingency reward). Ultimately Allison slowly took a small bite of hummus. The therapist praised Allison and her parents, but still Allison's mother was discouraged, explaining, "Well that does not make me feel great—so you are saying we are already doing all the right things? I was hoping you would tell us something

**TABLE 2** Patients' eating disorder diagnosis, PARDI scores, and weight at baseline and end-of-treatment

Case	EDA-5 diagnosis baseline	EDA-5 EOT	PARDI scores baseline <sup>a,e</sup>	PARDI scores EOT	Weight baseline	Weight EOT
Lilliana (LOI) <sup>b</sup>	ARFID	OSFED	Severity = 3.8 Sensory = 0.2 LOI = 4.2 Fear = 2	Severity = 1.8 Sensory = 0.6 LOI = 4.4; Fear = 0.4	19.5 kg %EBW = 80.1	24.9 kg %EBW = 89.7
Alison (sensory sensitivity) <sup>c</sup>	ARFID	ARFID	Severity = 2.6 Sensory = 2.3 LOI = 2.2; Fear = 0	Severity = 1.6 Sensory = 1.2; LOI = 1.0 Fear = 0	24.7 kg %EBW = 82.6	26.9 kg %EBW = 83.1
Isabella (fear of aversive consequence) <sup>d</sup>	ARFID	ARFID	Severity = 5.6 Sensory = 0.7 LOI = 5 Fear = 4.6	Severity = 1.1 Sensory = 0.0 LOI = 0.45 Fear = 0.0	32.5 kg %EBW = 82.6	39.2 kg %EBW = 94.0

<sup>a</sup> Mean PARDI scores for Severity ARFID patients = 2.41 (.91).

<sup>b</sup> Mean PARDI scores for Lack of Interest ARFID patients = 1.69 (1.32).

<sup>c</sup> Mean PARDI scores for Sensory Sensitivity ARFID patients = 1.23 (1.06).

<sup>d</sup> Mean PARDI scores for Fear of Aversive Consequences ARFID patients = 0.4 (0.65).

<sup>e</sup> At this point, how best to interpret these scores is still unclear, but improvements would likely suggest progress in a particular symptom domain.

new to do." The therapist said that in her experience families often have the necessary skills, but have not yet been able to apply them consistently on their own. By saying this, the therapist was reinforcing the concepts of parental efficacy and empowerment.

Each subsequent session of the remainder of phase 1 began with a review of weight progress using the weight chart and progress on food choice expansion using the ASN list. This was followed by a discussion of food exposures and facilitating parental planning for addressing the behavioral targets for the following week. Parents sometimes used "chaining" similar food types allowing graduated exposures (Fraker, Fishbein, Cox, & Waltbert, 2007). For example, chocolate was an avoided food, so they began including only a chocolate chip in a pancake, then increased the number of chips, and "chained" their way to a chocolate candy. They also reframed their language: "It may not be your favorite, but you need to eat this," or "You have not tried it enough to know if you like it yet." Although Allison remained underweight (~5th percentile for BMI), the parents disagreed about need for weight gain. In this instance, externalizing the illness was again useful, as it helped them see low weight status as a result of ARFID rather than a constitutional trait.

In Phase 2, treatment primarily focused on increasing Allison's eating flexibility by increasing the pace of exposures and incorporating them into social situations, such as eating at restaurants or gatherings with family and friends. At this point, Allison was highly engaged and was sometimes the main driver of selecting and planning exposures, while her parents took up the role of facilitating these exposures rather than controlling them. The family continued to use ASN list to set goals and evaluate progress during this phase. Her parents recognized that Allison was able to change her eating behavior when she was allowed to choose the general challenge target (e.g., another fruit flavor) and the manner in which it would be presented to her (e.g., alone in her room while watching her favorite show for distraction), but parents remained responsible for preparing and presenting the food.

By the end of FBT-ARFID which lasted 8 months and consisted of 17 sessions, Allison had greatly increased her range of food options, including multiple brands and types of crackers, multiple types of cheese, any preparation of a hot dog or quesadilla, additional fruits and vegetables beyond the few she originally was able to eat, and cuisines the family enjoyed but previously had not been able to eat with Allison. By the end of treatment, this increased flexibility allowed Allison to eat in social situations, such as friends' homes and restaurants. Allison gained 2.3 kg and grew 3.6 cm during treatment; however, because she had grown there was only a small increase in her percent EBW (see Table 2).

### 1.3 | FBT for ARFID-fear of aversive consequences

Isabella is an 11-year-old Latina female who experienced a 25-pound weight loss over a 1.5 year period due to restrictive eating that developed after a trip abroad where all family members other than herself developed severe vomiting and diarrhea. After this trip, she experienced an extreme fear of vomiting, reported stomach pain, and began restricting her eating. Prior to this Isabella had never displayed restrictive eating or shown a lack of interest in eating.

Using circular questioning (Cecchin, 1987) during Session 1, the therapist helped the family identify that Isabella's ARFID had led to two hospitalizations to date, her fear of vomiting kept her eating only small amounts of only a few foods, and her anxiety about eating led to withdrawal from social activities and school. This information was used to externalize the illness and orchestrate an intense scene to heighten the need for immediate action.

For the family meal in Session 2, the parents brought breaded chicken tenders with rice in four roughly equal pre-portioned individual plastic containers, but no drinks or dessert. All family members except Isabella finished eating in approximately 10 min. Parents reported using a timer at home to signal to Isabella that she needed to finish eating. In addition, they used gentle encouragement while Isabella ate (e.g., "you are almost done") and distraction (by keeping the

conversation going). The therapist complimented the parents on the use of these effective strategies, while also noting that Isabella remained severely malnourished and anxious as a result of the ongoing ARFID.

In the remainder of Phase 1, the primary goal of treatment was restoring Isabella's weight; a secondary, less urgent goal was reestablishing variety and flexibility in food choice. The therapist used the weight chart to facilitate learning (observing Isabella's weight progress). Although Isabella initially gained about 1 pound per week her progress slowed at session 4 because her complaints of stomach pain and anxiety around eating worsened leading the parents to begin negotiating with her again and decrease portions. The therapist encouraged the parents to return to their previous practices by not compromising re-nourishment strategies, and as a result, Isabella's steady weight gain returned. To manage Isabella's discomfort, the parents reinforced her use of adaptive coping skills (e.g., distraction, deep breathing).

During phase 2, the parents used these strategies consistently over the course of the following 3 months. Over this period, Isabella was able to make suggestions to her parents about how to help her manage her fears including adding coping strategies (e.g., using a homemade slime as a stress ball). Isabella gained weight steadily, ate with decreasing anxiety, and was able to again participate in school and social activities. By the end of treatment (which lasted 8 months and consisted of 17 sessions), Isabella was mostly weight restored and no longer reported fears of vomiting (see Table 2).

## 2 | DISCUSSION

These cases illustrate that the main principles of FBT—agnosticism, externalization, parental empowerment, emphasizing the serious medical and developmental consequences of persistent ARFID, behavioral consultation, and practical behavioral focus—are applicable for pre-adolescents who present with ARFID for outpatient treatment. There was considerable clinical progress in terms of symptom resolution, but all three patients still met criteria for an eating disorder at EOT. Thus, treatment termination in each of these cases was made based on the family and therapist perception that the main goals related to changing eating behaviors had been accomplished. Evidence suggests that progress in FBT-AN in terms of weight gain and improvement in eating related cognitions continues after treatment concludes (Lock, Couturier, & Agras, 2006). Nonetheless, the families reported being satisfied with treatment and felt that they had learned skills they would need to continue to apply after EOT. It is a limitation of these case reports that longer term follow-up is not available to see if diagnostic resolution was achieved. At the same time, it is important to note that as a field we have not defined remission or recovery outcome for ARFID, a problem not unique to this eating disorder (Bardone-Cone et al., 2010). In addition, while diagnostic resolution should be a goal for treatment, many mental health treatments provide substantial benefit and relief without achieving this.

Further, the cases presented here were all medically stable for outpatient care and at the time of treatment, not dependent on tube feeding, or subsisting on all liquid diets, or having significant

concurrent medical co-morbidities. The applicability of FBT-ARFID for these types of patients is unknown. While the principles of FBT can be applied within inpatient and other intensive treatment settings, the treatment itself is an outpatient approach and this may limit its usefulness for ARFID patients who require treatment in these types of settings. The cases described also suggest some challenges when delivering FBT-ARFID that differ in some ways from FBT-AN, namely: (1) greater challenges in emphasizing the seriousness of persistent ARFID; (2) greater challenges in promoting urgency for change; and (3) countering longstanding parental accommodation to the ARFID eating behaviors.

Children with ARFID are increasingly being diagnosed and referred for treatment (Nicely, Lane-Loney, Masciulli, Hollenbeak, & Ornstein, 2014). While we have limited evidence based approaches, it is possible that an adapted version of FBT for this clinical group could be useful. Further systematic study could shed light on this possibility with adequately powered controlled studies.

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