Yuk Makan! Program as an Application of Cognitive Behavioral Therapy Principle to Overcome Selective Eating Problem in a 7-Year-Old Child

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Abstract— This study aims to observe the effectiveness of the Cognitive Behavioral Therapy (CBT) principle to overcome a selective eating problem in a 7-year-old girl. Using a quasiexperimental design with single case subject (n = 1), the intervention for the one participant was the *Yuk Makan!* intervention program, *The BUFFET Program* by Kuschner *et al*. (2017) was used as a reference, the intervention comprised five psychoeducation sessions and four exposure sessions. Using a pretest–posttest one-group research design, the measurements of a selective eating behavior are performed at the baseline phase (pretest) and right after the last intervention session (posttest). Quantitatively, the results depict that the *Yuk Makan!* program was not effective to overcome the participant's overall selective eating behavior but succeeded in increasing the participant's enjoyment of foods and eating situations. By contrast, qualitatively, the *Yuk Makan!* program was considered effective in improving the participant's eating behavior quality, as shown by the increasing willingness to try new food and eating preferred foods with different preparation processes. The parents and the teacher also reported increased satisfaction in the participant's eating behavior. Thus, we conclude that the *Yuk Makan!* intervention program improved the quality of participant's eating behavior, but to overcome a selective eating problem as a whole, more strategies must be undertaken.

Keywords—CBT; selective eating; children

Introduction

The term "selective eating" or "picky eating" is commonly used for children who reject certain types or groups of foods that, according to parents, are critical for the development and growth of children (Jacobi, Schmitz, & Agras, 2008). Chatoor, Hirsch, Ganiban, Persinger, and Hamburger (1998) defined "picky eating" as a food refusal involving all food or only certain types of food, for at least 1 month, that does not cause growth deficiency. Additionally, Bryant-Waugh (1999) defined "selective eating" as eating a narrow range of foods for at least 2 years and being unwilling to try new foods that do not cause abnormal development in terms of weight and body shape. The definition of picky eating and selective eating shows that both terms refer to the same symptoms: An eating behavior with a narrow range of food preferences that does not result in growth deficiencies or abnormal physical development. Therefore, in this study, we use the term "selective eating" to explain selective eating behavior.

Behaviors that have often been associated with a selective eating problem include the limited consumption of food types or food groups, unwillingness to try new foods, strong preference for or dislike of certain foods, willingness to eat food only with particular preparation processes, and often, behavioral problems in the context of eating that influence parents to provide foods that differ from those provided to other family members (Jacobi et al., 2008; Chao & Chang, 2015; Mascola, Bryson, & Agras, 2010). In addition, food texture was

demonstrated to often trigger selective eating behavior (van der Horst, Deming, Lesniauskus, Carr, & Reidy, 2016), although preferences for certain textures were not always observed in children with selective eating problems (Bachmeyer, 2009). Interventions for children with selective eating problems have been carried out for various types and groups of foods, for example, vegetables, red meat (*e.g.*,: beef), fish, and concentrations of milk intake (Dubois , Farmer, Girard, Peterson, & Tatone-Takuda, 2007; Galloway, Fiorito, Lee, & Birch, 2005; Tharner, Jansen, Jong, Moll, Ende, & Jaddoe, 2014).

Various effects have been observed to accompany selective eating conditions in children; for example, lower calorie intake, lower body weight, increased risk for the development of various clinical eating disorders, and a higher prevalence of behavioral problems (Dubois et al., 2007; Marchi & Cohen, in Mascola et al., 2010; Jacobi et al., 2008). Additionally, families of children with a selective eating problem also have been shown to have a higher risk of experiencing distress and other mental problems that influence parents to use improper feeding methods that further inhibit the development of healthy eating habits (Galloway et al., 2005; Bachmeyer, 2009).

According to the literature, the prevalence of selective eating problems in children is high: approximately 8%–50% in children with typical development and 70%–89% in children with developmental disorders (Mascola et al., 2010; Benjasuwantep, Chaithirayanon, & Eiamudomkan, 2013). Jacobi, Agras, Bryson, and Hammer (2008) found that 21% of children aged 4–5 years with typical development were classified as selective eaters based on parental reports. In another study, by Galloway et al. (2005), the results demonstrated that 27% of mothers of 7-year-old girls with typical development assessed their children's level of food selectivity at 3 or more on a 1-to-5 scale. In addition, selective eating has also often been found—and has even become a typical characteristic—in children with autism spectrum disorder (ASD) or intellectual disability (Kuschner, Morton, Maddox, Marchena, Anthony, & Reaven, 2017). Unfortunately, no data have been found regarding the prevalence of selective eating problem in children in Indonesia.

Based on the various findings regarding the prevalence of selective eating in children, we conclude that selective eating can occur in children with diverse ages and backgrounds. This phenomenon was also reinforced by the results from Jacobi et al. (2008): The prevalence of selective eating in young children (aged younger than 8 years) was not significantly different from preteen children (aged 8–12 years). The intensity of behavior that has often been associated with the term selective eating—such as the unwillingness to try new food—also did not differ between young children and preteen children. In addition, mothers of preteen children who had selective eating problems also reported that the tendency toward the selective eating behavior had been observed in the child over time. Thus, the literature has illustrated that selective eating is a potentially permanent condition if an intervention is not immediately provided.

Behavioral-based interventions have often been used in managing selective eating problems in children (Bachmeyer, 2009; Kuschner et al., 2017). One commonly used technique in

behavioral-based interventions is *Escape Extinction* (EE), which is a procedure that does not provide opportunities for children to avoid eating activities (Bachmeyer, 2009). EE procedures include *Non-Removal of the Spoon*, that is, positioning a spoon containing unwanted food in front of the child's mouth until the child wants to bite the food (Bachmeyer, 2009); *Mouth Clean*, that is, ensuring that the child has swallowed the food or liquid within 30 seconds after entering the mouth (LaRue, Stewart, Piazza, Volkert, Patel & Zeleny, 2011); and *Physical Guidance*, that is, touching the child's chin or jaw so that the child's mouth is open and can be fed (Ahearn, Kerwin, Eicher, Shantz, & Swearingin, in Bachmeyer, 2009). Although proven to be highly effective in reducing the intensity of selective eating problem, EE results in undesired side effects, including response bursts, aggressiveness, and emotional outbursts such as crying loudly (Lerman, Iwata, & Wallace, in Bachmeyer, 2009). Furthermore, EE can potentially make children feel depressed based on eating activities and is difficult to implement in natural settings or by inexperienced intervention agents such as parents and teachers (Bachmeyer, 2009).

In addition to EE, other behavioral-based intervention methods that have often been used to overcome selective eating problems are *Simultaneous Presentation* and *High Probability Instructional Sequences* (*high-p*) (Buckley & Newchok, 2005; Ewry & Fryling, 2016). *Simultaneous presentation* is a method to serve preferred food along with the non-preferred food. Although proven to be effective in reducing packing behavior, serving preferred and non-preferred food simultaneously risks reducing a child's preference for the previously preferred food, narrowing down the child's food preference range (Bachmeyer, 2009). Another method is called *high-p*, as shown in Ewry and Fryling (2016): The child is allowed to eat three spoons of *high-p* foods (foods with high probability to be eaten by the child) followed by one spoon of *low-p* foods (foods with low probability to be eaten by the child). Although the child showed an increase in eating *low-p* foods, the duration of the target behavior tended to not last long, and at a follow-up 7 months later, was reduced by 40%.

Based on our review of the literature, behavioral-based interventions have high effectiveness in the intervention period, but the duration tends to not last in the long run or elicits undesired side effects. The focus of an intervention has been found to be the major factor that influences the effectiveness of behavioral-based interventions in the long run. Behavioral-based interventions focus entirely on visible behavior change. However, these interventions do not target maladaptive thoughts that underlie the emergence of behavior; thus, the intervention results have tended to be more difficult to generalize, especially to children with typical development or children with special needs who have an average level of intelligence (Kuschner et al., 2017). Additionally, forming an appropriate and adaptive cognitive structure is crucial in the childhood period; thus, children are able to acquire autonomy and self-determination in the future, along with performing appropriate behavior in society. Therefore, the ideal intervention to overcome a selective eating problem in children with typical development and children with special needs with an average level of intelligence must facilitate children’s access to their full awareness and way of thinking about eating problems they are managing.

A form of intervention that addresses cognitive aspects that underlie behaviors is *Cognitive Behavioral Therapy* (CBT). CBT helps an individual identify cognitive patterns, thoughts, and feelings that occur along with a behavior (Beck & Beck, 2011). After finding the maladaptive cognitive pattern or thinking, CBT helps an individual evaluate his/her maladaptive thinking objectively; thus, CBT indirectly and positively contributes to emotional states and behavioral changes. In addition, long-term changes can become easier to achieve because individuals are equipped with skills expected to help them actively change maladaptive thoughts into more adaptive thinking in the future (Kuschner et al., 2017).

Kuschner et al. (2017) applied CBT to a selective eating problem in children with ASD aged 8–12 years. First, they conducted a pilot study to develop *The BUFFET Program*, which aimed to equip children to handle anxiety and be more flexible when managing new/non-preferred foods. Their expectation was that skill sets obtained from *The BUFFET Program* could be applied to other forms of eating problems, such as limited preferences for a food brand or food preparation process. Notably, *The BUFFET Program* required participants to have a verbal IQ score of at least 80 or a verbal mental age equivalent of at least a 7-year-old and was used as a visual aid to help participants focus on following the program. In their pilot study, Kuschner et al. (2017) intended to assess the extent to which program materials were acceptable to participants and their parents. According to their results, approximately 63% of the parents reported that the program was very helpful in changing their children's selective eating behavior.

In an investigation of participant criteria and the media participants use, a researcher observed that *The BUFFET Program* could be used as a reference for an intervention aimed to assist a single participant who had shown a selective eating problem since an early age. *The BUFFET Program* was modified to suit the specific conditions and background of the participant and called the *Yuk Makan!* (Let's Eat!) program to sound familiar to the participant and ease the adaptation process to the program.

In this study, we attempt to observe how the implementation of the *Yuk Makan!* program, based on the CBT principle, affects this study participant's eating behavior.

Method

Participant

The participant in this study is one female child: a client at Klinik Terpadu Fakultas Psikologi, Universitas Indonesia, aged 7 years and 5 months with selective eating behavior problems. The participant has a narrow range of food preferences; does not want to eat meat and processed food (e.g., chicken, fish, beef, nuggets, sausages, and meatballs) and most types of fruit and vegetables; wants to eat only certain foods with a certain preparation, such as scrambled eggs; is refusing to try new foods, a behavior often accompanied by an expression of disgust or turning away from the food; and is willing to eat food cooked only by her parents. Nevertheless, the participant's appetite is not different from children in general: She eats three times per day and often adds a portion of food when feeling hungry. The participant also does not show any

abnormal physical development. At school, the participant's eating behavior has become a major problem because the school required students to eat foods prepared by the school during joint school lunch activities; thus, students were not allowed to bring their lunch.

Based on an earlier psychological assessment, various negative thoughts underlie the eating behavior problems displayed by participant, for example, thinking that unfamiliar foods must have unpleasant taste. Therefore, the principle of CBT was applied to change the participant's eating behavior and the various, underlying negative thoughts. We expected the participant's adequate cognitive capacity (IQ=104, Weschler scale) to support the process of changing the maladaptive thoughts about food to be more adaptive.

Research Design

This study used a single case subject (n=1) with an accidental sampling technique. To observe the effectiveness of the intervention, this quasiexperimental study used a one-group pretest–posttest design. Therefore, behavioral measurements were carried out in the baseline phase (pretest) and right after the last intervention session was administered to the participant (posttest).

Measurement

The instruments used are the *Children's Eating Behavior Questionnaire* (CEBQ) and *Child Behavior Check List* (CBCL). The CEBQ is a measuring tool to describe the eating styles in children. The CBCL is a measuring tool to observe potential internalizing and/or externalizing behavior problems in children. These instruments were administered in the pretest and posttest phases. The participant was also asked to measure her level of willingness to taste new/disliked foods by using the *food stress level rating*. We also conducted interviews with the participant and the participant's parents and teacher in the pretest and posttest phases to observe the qualitative changes in the participant's eating behavior.

Quantitatively, the participant was expected to show an increase in the *enjoyment of food* score and a decrease in the *food fussiness score* on the CEBQ, a decrease in internalizing behavior score on the CBCL, and an increase in the *food stress level rating*. Although qualitatively, the participant is expected to be able to eat new/non-preferred foods in a whole form.

Research Procedure

Before conducting the research, we performed an assessment to determine the core problem and type of intervention that the participant needed to overcome the identified problems. Psychological examination, as a form of need assessment, was carried out at Klinik Terpadu Fakultas Psikologi Universitas Indonesia on October 13, 22, 23, and November 4, 2017. The assessment results showed that the participant had selective eating behavior problems that could potentially interfere with daily functioning but could not yet be categorized into clinical eating disorders. In a follow-up of the assessment, the participant and the parents were provided psychoeducation and counseling to explain the participant's condition. In addition, the parents and the participant were offered to participate in the *Yuk Makan!* program with the CBT principle to help overcome the selective eating behavior problem.

Baseline

At this stage, the researcher explained the *Yuk Makan!* program to the parents, including the targets to be achieved at the end of the program. The parents and the participant were then asked to state their willingness to join the intervention program by signing the informed consent. Interviews on the participant's eating behavior development were also conducted, and the administration of various instruments was used as a pretest.

Intervention

The intervention stage had nine sessions: five psychoeducation sessions and four exposure sessions. One psychoeducation session was conducted twice per week, and the exposure sessions were held for four consecutive days.

Post-intervention

This stage was carried out after all intervention sessions had been carried out. In the postintervention stage, the administration of various instruments used in this study was conducted as a posttest. In addition, we also conducted interviews with the participant and the participant's parents and teachers to observe the participant's eating behavior and determine the qualitative development of the participant's eating behavior.

Follow-up

We conducted a follow-up approximately 2 months after the postintervention stage. At this stage, one researcher re-conducted interviews with the participant and the participant's parents and teachers to re-observe the participant's eating behavior and re-administer the various instruments used in the baseline and postintervention stages to observe the difference in results between stages.

Table I. *Yuk Makan!* Program Overview

Session		**Topic**	**Description**
Psycho-education	1	*Makanan ini Musuhku* (This Food is My Foe)	Session 1 aims to help the participant identify negative thoughts, feelings, and body sensations that arise when managing new/disliked foods. Food Dictionary is used to assist the identification process.
	2	Coping Strategies Building	Session 2 aims to equip the participant with various coping strategies to overcome negative thoughts and unpleasant feelings that arise when managing new/disliked foods. Roleplay is used to help with the coping strategies debriefing process.
	3	*Makanan ini Temanku* (This Food is My Friend)	Session 3 aims to help the participant to modify negative thoughts about new/disliked food into more positive thoughts. The Food Dictionary is again used to assist the modification process.
	4	Introduction to Flexibility Concept	Session 4 aims to introduce the flexibility concept, along with daily life examples, advantages of being flexible, and strategies for being flexible. Roleplay is used to help the process of introducing the flexibility concept.

Session		Topic	Description
	5	*Berani Mencoba Makanan* (Dare to Try Food)	Session 5 aims to help the participant apply the flexibility concept in eating situations. Roleplay is used to help the application process of flexibility concept into eating situations.
Exposure	6	*Yuk Makan!* Introduction	Session 6 aims to introduce the participant and parents to *Yuk Makan!* Activities. The participant, together with a researcher, formulate six eating steps from one of the foods in the Food Dictionary. The six steps are exposed in sessions 7 to 9. The Food Plan Sheet is used to help the process of formulating the six eating steps.
	7	*Yuk Makan!* 1	Session 7 aims to train the participant to eat the target food until the second step of the six eating steps.
	8	*Yuk Makan!* 2	Session 8 aims to train the participant to eat the target food until the fourth step of the six eating steps.
	9	*Yuk Makan!* 3	Session 9 aims to train the participant to eat the target food until the sixth step of the six eating steps.

Results

The *Yuk Makan!* program was implemented in two places. The psychoeducation session was held at Klinik Terpadu Fakultas Psikologi Universitas Indonesia, and the exposure session was held at the participant's school during lunch time. Exposure in school is expected to help the participant move toward natural setting more easily, because the participant's selective eating problem was often observed in the school setting. The duration of the sessions were 30 to 90 minutes per session and was influenced by material differences and the level of the participant's ability to understand the material.

Table II. Overview of Intervention Implementation

Session	Day	Date	Time	Duration
Psychoeducation Session				
1	Monday	July 16, 2018	16.15–17.20	65 min
2	Monday	July 23, 2018	16.20–17.05	45 min
3	Friday	July 27, 2018	16.10–16.55	45 min
4	Tuesday	July 31, 2018	16.25–17.55	90 min
5	Tuesday	August 7, 2018	16.35–17.50	75 min
Exposure Session				
6	Monday	August 13, 2018	11.30–12.00	30 min
7	Tuesday	August 14, 2018	11.30–12.00	30 min
8	Wednesday	August 15, 2018	11.30–12.00	30 min
9	Thursday	August 16, 2018	11.30–12.20	50 min

Based on the CEBQ pretest results, two aspects of eating behavior were classified in problem range: *enjoyment of food* and *food fussiness*. *Enjoyment of food* indicated how comfortable an individual feels with eating activities, and *food fussiness* indicated how an individual can be selective about the range of food that she or he were able to receive (Wardle, Guthrie, Sanderson, & Rapoport, 2001).

Table III. Comparison of CEBQ Score at Pretest, Posttest, and Follow-up

Eating Behavior Aspect	Pretest Score	Category	Posttest Score	Category	Follow-up Score	Category	Description
Enjoyment of Food	3	Problem range– Below average	3,69	Normal range	3,75	Normal range	25% increase
Food Fussiness	4,17	Problem range– Above average	3,67	Problem range– Above average	3,17	Problem range– Above average	24% decrease

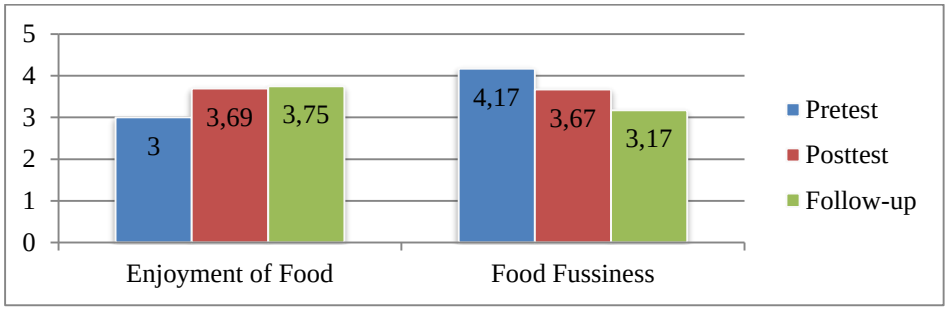

Fig. 1. Comparison of CEBQ Score at Pretest, Posttest, and Follow-up

An increase was observed in *enjoyment of food*, by 25% into the normal range. This result indicates that the participant is more able to enjoy eating activities and has greater interest in food than before the intervention. Figure 1 also illustrates a decrease in the *food fussiness* score by 24%, although the score remained in the problem range. This result indicates that the participant's selectivity of food decreased but continues to have the potential to interfere with daily functioning.

Table IV. Comparison of CBCL Scores at Pretest, Posttest, and Follow-up

Internalizing Behavior Aspect	Pretest Score	Category	Posttest Score	Category	Follow-up Score	Category
Withdrawn	4	Normal range	4	Normal range	3	Normal range
Somatic complaints	8	Clinical range	7	Clinical range	5	Borderline range
Anxious/depressed	9	Normal range	8	Normal range	8	Normal range

The comparison of the CBCL measurement results of the pretest and posttest is also provided. Based on the pretest results, the participant's internalizing behavior was in the clinical range, and the *somatic complaints* aspect was classified in the clinical range.

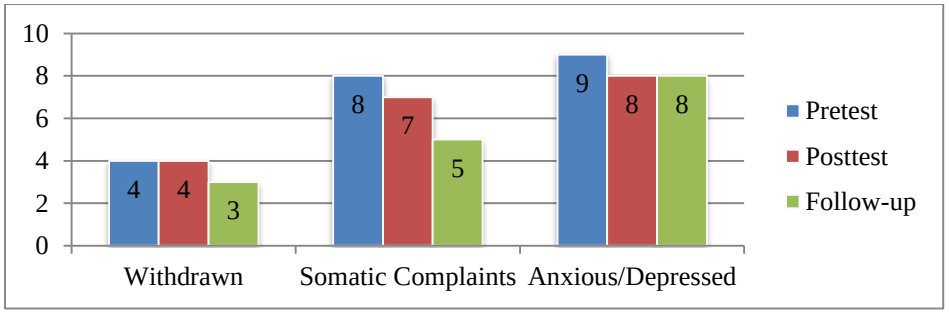

Fig. 2. Comparison of CBCL Scores at Pretest, Posttest, and Follow-up

No significant decrease was observed in the internalizing behavior scores. However, two of the three aspects of internalizing behavior, namely, *withdrawn* and *anxious/depressed*, had been in the normal range since the pretest phase. Additionally, the *somatic complaints* aspect decreased by only one point, remained in the clinical range in the posttest stage, and decreased two more points at the follow-up, which made this aspect move to the borderline range.

Based on the parental report in the pretest phase, the somatic complaints observed were mostly related to eating activities. The participant often complained of not feeling well in situations such as going to school on the day of a joint lunch activity where school officials forbade students from bringing a lunch or while deciding whether to eat new/non-preferred food. Although the *somatic complaints* score did not move to the normal range at the end of intervention, qualitatively, the parents reported that the participant's somatic complaints decreased considerably in these situations: (1) when going to school on the day of a joint lunch activity, and (2) when deciding whether to eat non-preferred food that the participant had previously seen. After the intervention, the somatic complaints most often reported by the participant were observed only when deciding whether to eat new food never seen before, such as dim sum.

Table V. Scoring of *Food Stress Level Rating*

Number of Circled Forks	Meaning
1	Unwilling to taste the food
2	A bit willing to taste the food
3	Quite willing to taste the food
4	Willing to taste the food
5	Very willing to taste the food

For intervention purposes, the participant was asked to fill in the Food Dictionary with three non-preferred foods. For each food, the participant was asked to fill in the *food stress level rating* inside the Food Dictionary to assess the willingness to taste the food later on.

Table VI. Comparison of *Food Stress Level Rating* at Pretest, Posttest, and Follow-up

Food	Pretest Rating Score	Posttest Rating Score	Follow-up Rating Score	Description
Nugget	1	5	5	Participant was not expecting that nugget was actually not too salty and did not smell like chicken the way she had thought before.

Food	Pretest Rating Score	Posttest Rating Score	Follow-up Rating Score	Description
Fried chicken	1	3	4	Participant stated that fried chicken was actually edible if it was shredded into small pieces.
Fried fish	1	2	2	Participant admitted that it was difficult to ignore the fishy smell. In addition, she is still worried about fish's small spikes.

We observed that the participant showed an increase in willingness to try all three non-preferred foods. Before filling out the *food stress level rating*, the participant was first asked to explain the reasons for the dislike of the foods. Next, along with one researcher, the participant was able to find strategies to anticipate the reasons for the dislike of the food.

Table VII. Underlying Reasons of Participant's Dislike of Food and Anticipation of the Reasons

Food	Reasons for Participant's Dislike of Food	Anticipation of the Reasons
Nugget	Shape is not attractive, looks disgusting.	Find nuggets with more attractive shapes (alphabet or dinosaur shape).
	Discomfort in throat because of its rough texture.	Ask mother to cut nuggets into smaller sizes, immediately drink when feeling uncomfortable in throat.
Fried chicken	Unattractive shape.	Can be shredded and mixed into other dishes, such as scrambled eggs.
	Unpleasant taste, leaving a sour sensation in the mouth.	Can be eaten together with other foods, such as rice or tempeh, to reduce the sour sensation.
Fried fish	Sharp spikes in the fish meat.	Ask mother to shred the fish meat into smaller sizes and separate the meat from the bones.
	Fishy smell.	Not smelling the fish at a close range, drinking immediately when noticing the fishy smell in throat.

Qualitative data obtained through interviews with the participant and the participant's parents and teachers and through observations of participant's eating behaviors showed a change in the quality of participant's eating behavior after the intervention. The parents and teacher reported changes: an increased willingness to eat preferred foods cooked by someone other than the parents, an increased willingness to be persuaded to try new foods, and displayed more positive moods and attitudes at joint lunch activities at school. Differences in the cognitive and behavioral aspects of the participant before and after the intervention are available in Table VIII.

Table VIII. Comparison of Participant's Condition Before and After Intervention

Aspect	Before Intervention	After Intervention
Cognitive	Participant had false belief that she will never be able to taste new/non-preferred foods. She felt helpless against the feelings of wanting to vomit, dizziness, disgust, and being unable to stand the unpleasant smell of new/non-preferred foods.	Participant managed to change her views about herself. She believed she was able to taste new/non-preferred foods with the help of certain strategies. *E.g.* by always preparing drinking water in her left hand which she can immediately drink when she feels an unpleasant sensation in her throat when swallowing the food.
Behavior	When facing new/non-preferred foods, the participant tended to lean away from food, displayed a disgusted facial expression, and swallowed saliva repeatedly. When tasting the food, she chewed with the impression of attempting to keep food away from the tongue area and immediately drank although the food had not been swallowed.	In facing new/non-preferred foods, participant still occasionally displayed disgusted facial expression, but no longer lean away from food. In tasting new/disliked foods, the participant was able to chew with her mouth closed, not in a hurry, and swallowed the food first before drinking some water.

Discussion and Conclusion

Quantitative results of the research indicate that the *Yuk Makan!* program was not able to fully overcome the participant's selective eating problem. However, the program managed to increase the participant's interest and enjoyment in eating situations. These results were supported by the parent and teacher reports, stating an increase in the participant's eating behavior quality, that is, a willingness to eat familiar foods (e.g., scrambled eggs) cooked by someone other than the participants' parents. Furthermore, the parents also reported that the participant became more cooperative when asked to taste some foods, and the participant also tasted fried chicken—one of her non-preferred foods—in a whole form.

Two things must be considered based on this study's results: (1) the absence of a significant decrease in the CBCL internalizing behavior score, and (2) the CEBQ *food fussiness* score, despite showing a decrease, did not move to the normal range.

The CBCL is often used as an assessment tool in food refusal cases to assess internalizing and externalizing behaviors that accompany a child's eating behavior problem. Somatic complaints in an eating context are the most common behavioral aspects observed in food refusal cases (Schroeder & Gordon, 2002). For children, somatic sensations that emerge through unpleasant situations are clearly felt in the body. Even so, the *Yuk Makan!* program only helped the participant to identify these sensations consciously, with the aim that the participant understands that the somatic sensation arises because of certain underlying situations and thoughts. The program does not provide a participant with concrete techniques to eliminate those somatic sensations. In this case, concrete means are required by the participant because cognitive development remained in the *concrete operational thought* stage.

Next, related to the CEBQ *food fussiness* score that did not move into normal range, the *Yuk Makan!* program specifically targets the participant's willingness to taste new/disliked food as early step in improving the participant's eating behavior. This targeting explains the condition where there are only a few *food fussiness* items that increased, namely, items related to the participant's willingness to taste new foods. Although for the other broader *food fussiness* items, such as "My child enjoys a wide variety of foods" and "My child is difficult to please with meals," no increases were observed because these behavioral changes could only be observed in the long term. This result also implies that the number of sessions, especially exposure, must be extended to ensure that the participant receives more opportunities to taste additional diverse new/disliked foods.

In the next similar study, we recommend that researchers use child-report measurement tools to record changes that cannot be observed by parents or teachers. In addition, the increasing satisfaction of parents and the teacher that is shown qualitatively in this study would be much better if quantified by using a client satisfaction measurement tool, such as the Client Satisfaction Questionnaire (Kuschner et al., 2017).

Application of CBT principles in the eating behavior area is often used to overcome various clinical eating disorders such as anorexia nervosa, bulimia nervosa, and obesity (Cooper & Fairburn, 2011; www.eatingdisorderhope.com). Those applications are also commonly aimed at adolescents and adults. Additionally, application of CBT principles for children has rarely been found in the eating problems area; instead, researchers have investigated other problems such as trauma handling, excessive anxiety, and socialization difficulty (Foa, 2009; Seligman & Ollendick, 2011). A CBT program targeting selective eating problems in children designed by Kuschner et al. (2017)—which we used as a reference—specifically targeted children with ASD and also was performed in groups. Therefore, this study was expected to provide information on the application of CBT principles to address selective eating problems in children with typical development, was carried out individually, and was fully tailored to the specific conditions of the participant and habits that have often been observed in Indonesian society.

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