Revista Brasileira de **Terapias Cognitivas**
2023•19(2)•pp.171-181

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CAMALEO TOC: Construction of a manual for the treatment of adolescents with obsessive compulsive disorder

CAMALEO TOC: Construção de um manual para o tratamento de adolescentes com transtorno obsessivo-compulsivo

ABSTRACT

Objective: This study aimed to present the construction process and the evidence of content validity of CAMALEO TOC, a manual of group cognitive-behavioral therapy (GCBT) for Brazilian adolescents with obsessive compulsive disorder (OCD). **Methods:** This study was structured in the following stages: 1) systematic review in search of manuals with scientific evidence; 2) appreciation of existing manuals; 3) preparation of the new manual; 4) expert assessment; 5) assessment of the manual by adolescents; 6) appreciation of the assessments; 7) adjustments according to expert and adolescent assessments. The CAMALEO TOC content was evaluated by a psychiatrist, four psychologists experts in adolescents with OCD, and seven adolescents. **Results:** The manual showed excellent applicability and evidence of content validity, both in adequacy (Finn = 0.98 mean score = 4.0) and relevance (Finn = 0.99 mean score = 4.0; on a rating scale of 0 to 4). **Conclusion**: Further studies with this population need to be conducted for the definitive validation of the CAMALEO TOC.

Keywords: Obsessive-compulsive disorder, Cognitive behavioral therapy, Psychotherapy, group, Adolescent.

RESUMO

Objetivo: Este estudo teve como objetivo apresentar o processo de construção e as evidências de validade de conteúdo do CAMALEO TOC, um manual de terapia cognitivo-comportamental em grupo (GCBT) para adolescentes brasileiros com transtorno obsessivo-compulsivo (TOC). **Métodos:** Este estudo foi estruturado nas seguintes etapas: 1) revisão sistemática em busca de manuais com evidências científicas; 2) apreciação dos manuais existentes; 3) elaboração do novo manual; 4) avaliação por especialistas; 5) avaliação do manual pelos adolescentes; 6) apreciação das avaliações; e 7) ajustes de acordo com as avaliações dos especialistas e dos adolescentes. O conteúdo do CAMALEO TOC foi avaliado por um psiquiatra, quatro psicólogos especialistas em adolescentes com TOC e sete adolescentes. **Resultados:** O manual apresentou excelente aplicabilidade e evidências de validade de conteúdo, tanto na adequação (Finn = 0,98 escore médio = 4,0) quanto na relevância (Finn = 0,99 escore médio = 4,0; numa escala de classificação de 0 a 4). **Conclusões:** Mais estudos com essa população precisam ser realizados para a validação definitiva do CAMALEO TOC.

Palavras-chave: Transtorno obsessivo-compulsivo, Terapia cognitivo-comportamental, Psicoterapia de grupo, Adolescente.

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This paper was submitted to the RBTC SGP (Management Publications System) on May 3, 2023. cod. 385.
Article accepted on August 29, 2023.

DOI: 10.5935/1808-5687.20230021

INTRODUCTION

Obsessive compulsive disorder (OCD) is considered a heterogeneous disorder, associated with several different symptoms and can be divided into at least four (*i.e.* contamination, symmetry, harm, taboo/intrusive thoughts - McCarty et al., 2017) or six (*i.e.* aggression, injury, natural disasters; sexual and religious; symmetry, ordering, counting and arranging; contamination and cleaning compulsions; hoarding; miscellaneous - Rosario-Campos et al., 2006) subcategories according to the content of obsessive or compulsive symptoms. Regardless of category, intrusive thoughts and images that generate anxiety and lead to compulsive behaviors are symptoms that affect most individuals with OCD (American Psychiatric Association [APA], 2014). These symptoms cause several social and occupational damages in the daily lives of individuals with OCD, including the impacts of the stigma associated with the disease, thus contributing to the worsening of symptoms (McCarty et al., 2017).

The global prevalence of OCD is estimated to range between 1% and 3% in adults (APA, 2014; Abramowitz et al., 2017) and between 2% and 3% in adolescents (Vivan et al., 2014; Mathes et al., 2019). In Brazil, the prevalence of OCD in adolescents is estimated at 3% (Vivan et al., 2014). Although the prevalence among adolescents is similar to the prevalence in adults, the occurrence of underdiagnosis of OCD in children and adolescents is known mainly due to the low capacity of insight of this population, difficulty in verbally expressing symptoms, thoughts, and feelings (Vivan et al., 2014; Abramowitz et al., 2017; Selles et al., 2018). In addition, parents have difficulty recognizing common behaviors of the age group and what can characterize a mental disorder (Monzani et al., 2020).

During adolescence, OCD usually causes significant changes in the routine of personal and social life, and it is common for both adolescents without or with OCD to perceive differences in their behavior. It is not uncommon for adolescents with compulsive symptom to feel ashamed of their thoughts and behaviors (Abramowitz et al., 2017; Cândea & Szentagotai-Tătar, 2018). In addition, adolescents with OCD often have other comorbidities, such as anxiety and depression disorders (Cordioli, 2008a; Abramowitz et al., 2017; Cândea & Szentagotai-Tătar, 2018; Jones et al., 2018). A network analysis has shown that OCS (obsessive-compulsive symptoms) are also associated with guilt, sadness, and concentration problems symptoms, mutually influencing, and reinforcing OCD and depression (Cordioli, 2008a; Jones et al., 2018).

Due to its prevalence and damage to physical and mental health, OCD is considered a public health problem, and the development of effective psychotherapeutic interventions is recommended, especially in developing countries (Abramowitz et al., 2017). Although both individual cognitive-behavioral therapy (ICBT) and group cognitive-behavioral therapy (GCBT) show evidence of efficacy in treating OCD in adults (Cordioli, 2008a; Öst et al., 2015; Schwartze et al., 2016; Pozza & Dettore, 2017; Jones et al., 2018) and adolescents (O'Leary et al., 2009; Farrel et al., 2016; Shabani et al., 2019), some authors suggest that GCBT should be used more to reduce the waiting lines and increase the population's access to mental health services (Schwartze et al., 2016; Pozza & Dettore, 2017).

This need to reduce the waiting time to receive treatment is vitally important since evidence suggests that early treatment increases the chances of lifelong remission of symptoms (O'Leary et al., 2009; Melin et al., 2020). It is recommended that adolescents receive a diagnosis and appropriate treatment as early as possible (Melin et al., 2020). Although the use of GCBT to reduce the waiting lines in public health services is recommended in Brazil, mainly due to its lower cost (Fatori et al., 2018), this practice is not usually performed. A possible explanation was provided by a systematic review with meta-analysis, which aimed to assess the effectiveness of existing GCBT manuals for OCD in adolescents. The authors located six GCBT manuals used for the treatment of OCD in adolescents from different countries. Although all manuals showed evidence of efficacy, none of them are available for use in Brazil (Bortoncello et al., 2022).

This finding highlights the need for a GCBT manual (or protocol), with evidence of validity and efficacy, for the treatment of adolescents with OCD in Brazil. Thus, aiming to reduce the waiting lines and providing early treatment to the largest possible number of adolescents with OCD in Brazil, this study aims to present the process of construction and evidence of content validity of a group cognitive-behavioral therapy manual for Brazilians adolescents with obsessive-compulsive disorder, entitled "CAMALEO TOC".

METHOD

The method of this study uses a quantitative and qualitative approach, as suggested by international guidelines for the development and adaptation of instruments in the health area (Boateng et al., 2018; International Test Commission [ITC], 2012, 2017). The elaboration of the GCBT CAMALEO TOC manual was performed in six stages: 1) Systematic review in search of manuals with scientific evidence (Bortoncello et al., 2022); 2) Appreciation of existing manuals; 3) Preparation of the new manual; 4) Expert assessment; 5); Assessment of the manual by adolescents; 6) Appreciation of the assessments. Figure 1 illustrates the flowchart of procedures followed to prepare the CAMALEO TOC Manual.

1. Systematic review in search of manuals with scientific evidence

Initially, a systematic review with meta-analysis was performed following the Preferred Reporting Items for Systematic Reviews and Meta-Analyses - PRISMA model (Page et al., 2021). The review aimed to locate and evaluate evidence of effectiveness of GCBT manuals used in the treatment of

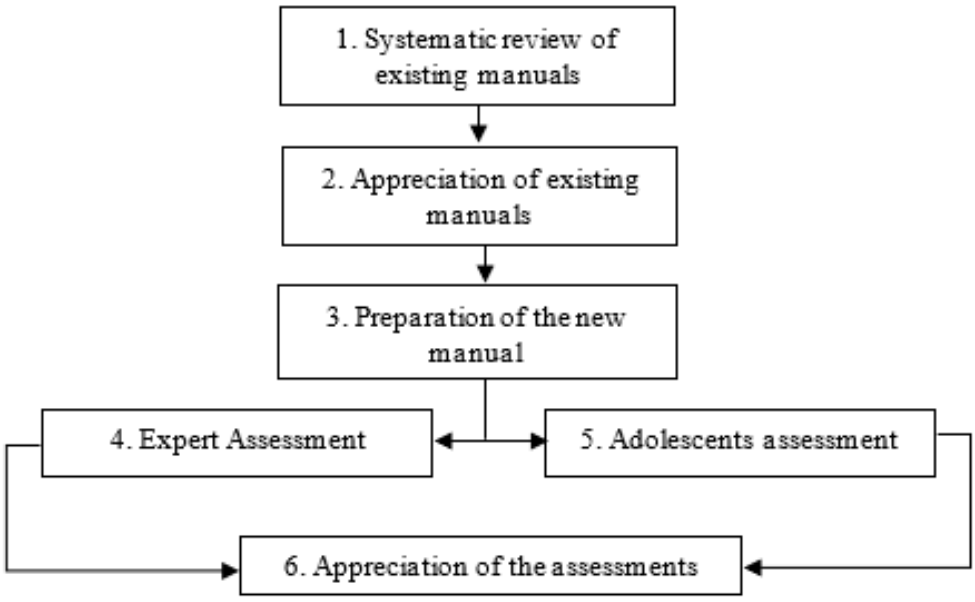

Figure 1. Procedures for prepare the CAMALEO TOC Manual.

adolescents with OCD. For this, five databases were consulted, and 713 studies were retrieved. After applying the inclusion and exclusion criteria, 13 articles remained for qualitative analysis and eight for quantitative analysis (meta-analysis). The results of the systematic review indicated the existence of six manuals and the meta-analysis showed that GCBT is effective in reducing OCD symptoms in adolescents (d = -1.32). However, none of the manuals are available for use in Brazil (Bortoncello et al., 2022).

2. Appreciation of existing manuals

Based on these results, the six manuals identified in the systematic review were acquired and their contents were extensively reviewed by a psychologist specializing in childhood and adolescence with OCD (CFB). Some data from these manuals were used as a basis for the preparation of the manual CAMALEO TOC. For example, the average total duration of treatments, number of weekly sessions and duration of each session, type of family participation during the consultations, structure and topics covered in each session (Bortoncello et al., 2022).

3. Preparation of the new manual

The CAMALEO TOC manual was prepared by an expert psychologist (CFB) in childhood and adolescence OCD, aiming to provide quality group psychotherapy treatment for Brazilian adolescents with OCD between 10 and 19 years of age. The manual consists of 130 pages and is divided into 12 sessions, as shown in Table 1.

Sessions 1 and 2 occur with the simultaneous presence of adolescents and their guardians (2:00 hours each), to provide important information about the entire treatment and verify family accommodation. Sessions 3 to 12 are divided into two parts: 1st Part: session with adolescents (1:30 hours) to ensure confidentiality and freedom to talk about the adolescents› symptoms throughout the treatment. 2nd Part: session with adolescents and guardians (30 minutes remaining) to observe the severity of symptoms, family accommodation, and provide adequate support for adolescents throughout the treatment.

During treatment, both adolescents with OCD and their guardians have access to information that allows them to obtain a better understanding of OCD and the suffering generated by it. Participants will also receive suggestions to improve interpersonal and family relationships, which contribute to the effectiveness of treatment (Lebowitz et al., 2016).

During the preparation of the manual, the semantic, idiomatic, and conceptual equivalence of terms adapted from the six international manuals were considered. In addition, simple language was used instead of scientific to simplify the understanding of the manual by adolescents of different ages and types of schooling (*i.e.,* public, or private). Furthermore, another GCBT manual for the treatment of adults with OCD developed by a Brazilian researcher and therapist, with extensive experience in the field of OCD (Cordioli, 2008b), was used to support the adaptation of certain cultural and language (*i.e.,* expressions and metaphors) aspects.

Table 1. Structure of the CAMALEO TOC Manual.

Session	Themes and goals
1	Do you have obsessive compulsive disorder (OCD)? Psychoeducation on obsessions, compulsions, mental compulsions, sensory phenomena, avoidances, and symptom list.
2	Do you know how this happened to you? Psychoeducation on the causes of OCD, cognitive model of OCD, sensory phenomenon, family accommodation, and tasks.
3	How do I overcome OCD? Information on treatment with Cognitive-Behavioral Therapy, exposure and ritual prevention, habituation, and medication.
4	Coping with symptoms related to contamination, disgust, cleaning rituals, excessive washing, and bathing. Psychoeducation about excessive worry, normal hygiene habits, beliefs, CBT and EPR tasks.
5	Facing the symptoms related to doubts, checks, doing, and redoing. Psychoeducation on beliefs related to the need to check and tasks.
6	Facing symptoms related to symmetry, ordering, counting, and organization. Psychoeducation on perfectionism, insight, cognitive rigidity, and tasks.
7	Facing symptoms related to superstition (lucky or unlucky numbers, colors with special meaning), and natural disasters. Psychoeducation and beliefs about magical or superstitious thoughts and related tasks.
8	Facing obsessive rumination symptoms related to aggression, violence, sex, and religion. Psychoeducation and beliefs about intrusive thoughts, thought power, thought control, and related tasks.
9	Facing the hoard. Psychoeducation and beliefs about hoarding, pathological hoarding and related tasks.
10	What have I learned so far and how do I protect myself so OCD doesn't come back? Psychoeducation about lapses, relapses, and related tasks.
11	Preparing for Graduation. Relapse prevention, reinforcement session and related tasks.
12	Graduation. Last session to clarify possible doubts, confraternization and evaluate the treatment.

The name of the manual CAMALEO TOC is based in a character designed by an illustrator to represent the dimensions of OCD symptoms. It is a chameleon mix with OCD, by the acronym in Portuguese "TOC" (*transtorno obsessivo-compulsivo*). The chameleon is an animal that camouflages itself (changes color) to hide and stay alive, as well as OCD, which tends to change the dimensions of symptoms and intensity throughout life as a strategy for survival and maintenance of the disorder. The character was created as a possibility for adolescents to look from the outside (in concrete) at their symptoms, verify the intensity and the damage caused, be able to think from the outside the most effective strategies for exposure, and at the same time "try to play" with the disorder and make it lighter. Figure 2 presents the manual character cover logo.

Figure 2. CAMALEO TOC manual character cover logo.

The character appears in session 3 exemplifying each dimension of OCD symptoms, and at the end of the manual in a smaller size, showing that coping through exposure can reduce or eliminate symptoms. Figure 3 presents the character from session 7 related to superstitions (lucky and unlucky numbers, colors with special meaning) and natural disasters.

4. Expert assessment

The initial version of the manual was sent for consideration by four psychologists and one psychiatrist specializing in childhood and adolescent OCD. These professionals were invited to perform the content validity (Haynes et al., 1995; Pasquali, 1997) through a critical and detailed analysis. For each session of the manual, experts assessed face relevance/validity (*i.e.,* degree to which the session is appropriate for treating OCD) and adequacy (*i.e.,* Is it a common situation and can be easily understood by adolescents with OCD?) through two closed-ended questions in a Likert type scale (*i.e.*, 0 Not at all adequate/relevant and 04 Totally adequate/relevant) and two semi-structured questions with a dichotomous response option (Yes/No).

The questions were presented in the following format: 1) Is the language of the information presented clear and appropriate for the adolescent audience? (adequacy); 2) Does the session use CBT assumptions and is it suitable for use in treating adolescents with OCD? (relevance); 3) The text is too long and/or could be summarized (Yes/No?); 4) Are any words or phrases unclear to you? (Yes No?). If the option "Yes" was selected, in the semi-structured questions, the expert was invited to specify which word or phrase was not clear and to suggest an alternative to improve the indicated passage.

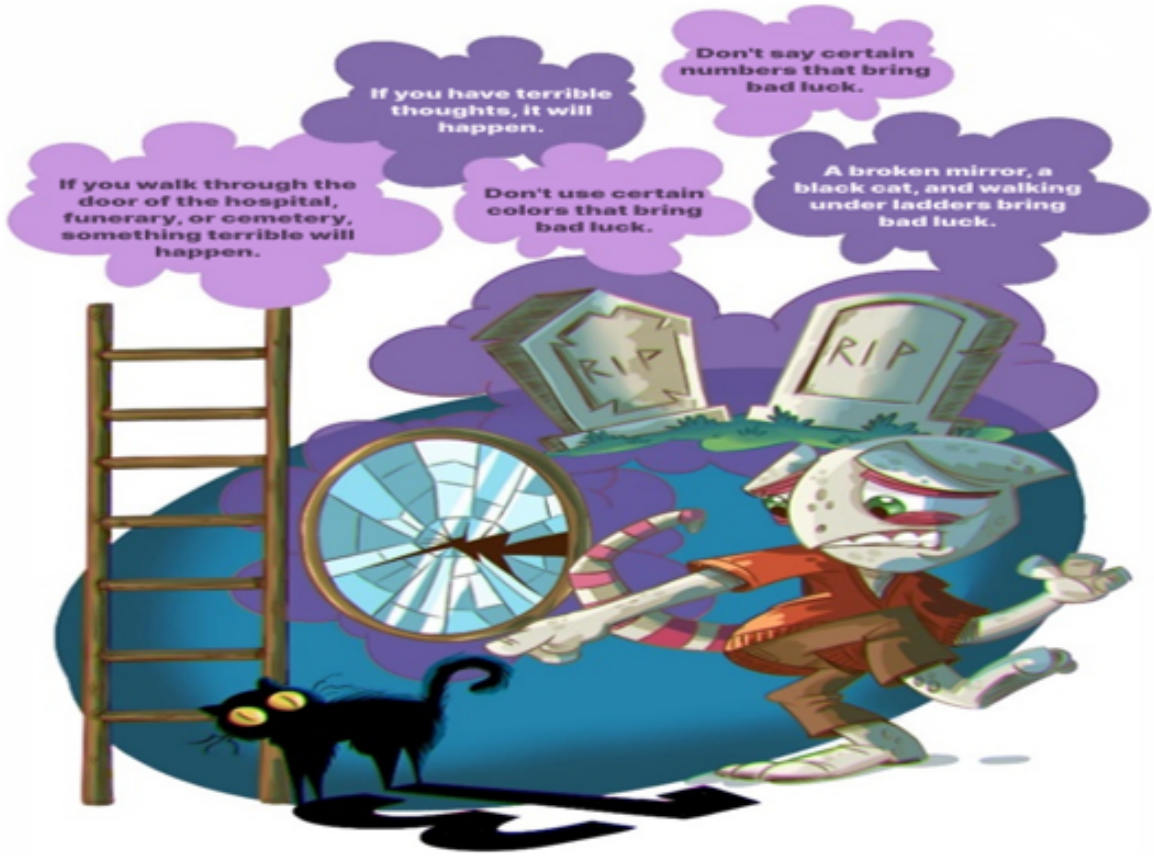

Figure 3. Example of the CAMALEO TOC character used in section 7 of the manual.

5. Assessment of the manual by adolescents

To assess the clarity of the manual's presentation format and language (*i.e.,* content validity/adequacy - Pasquali, 1997), seven healthy adolescents (without a psychiatric diagnosis) who had never undergone psychotherapy were invited to answer a quantitative question (Likert-type scale 0-4) and two qualitative. The questions presented to the adolescents were the same as those answered in the previous stage by the expert group, except for question 2, which was removed since adolescents were not expected to have technical knowledge about CBT and/or scientific methods. Table 2 presents the sociodemographic profile of adolescents and Table 3 the main observations of experts and adolescents.

6. Appreciation of the assessments and adjustment of the manual

The qualitative responses from the experts and the adolescents were assessed by a psychologist expert in OCD (CFB). All suggestions for modifying words/phrases have been addressed, except some suggestions for reducing the amount of text, as some information is important and cannot be removed from the structure of each session and/or the manual. Quantitative assessments were conducted by a psychologist expert in psychometrics (NOC). Considering that there were few suggestions for modifications and that the adequacy and relevance scores of the sessions were (≥ 3.5), there was no need to resubmit the manual, after modifications, for reassessment by experts and/or target audience.

Ethical and data collection procedures

The GCBT CAMALEO TOC manual was sent via email to the experts and hand-delivered to the adolescents. In both cases, a link was made available on Google Forms to evaluate the content of the manual. Adolescents were selected by convenience and snowball sampling. The study was approved by the Research Ethics Committee of the Federal University of Health Sciences of Porto Alegre (CAAE: 30918720.9.0000.5345).

Data analysis

Evidence of content validity of the GCBT CAMALEO TOC manual was obtained considering the relevance and adequacy of each session of the manual, through the assessment of expert judges and adolescents (target audience). All analyzes were performed in version 4.1.2 of the R software (R Core Team, 2022). The reliability index between experts and participants in the pilot study was measured using the Finn coefficient (Finn, 1970), which was developed for the analysis of agreement when there

Table 2. Sociodemographic profile of adolescents.

Sociodemographic variables			
Sex	**Age (mean = 16.1; SD = 2.1)**	**Study/Studied at school**	**Grade/Semester**
Male	15	Private	9th Grade
Female	14	Private	8th Grade
Female	19	Private	4th Semester*
Female	19	Private	2nd Semester*
Female	17	Public	10th Grade
Female	15	Public	9th Grade
Female	14	Public	9th Grade

*Higher education.

is low variability in responses. For this, the data package Various Coefficients of Interrater Reliability and Agreement - IRR was used (Gamer et al., 2019). Reliability analyzes considered the listwise method for the treatment of missing values.

RESULTS

Assessment of experts and adolescents

The GCBT CAMALEO TOC manual showed a great index of reliability among experts in the adequacy (Finn = 0.98) and relevance (Finn = 0.99) assessments. Most (*n* = 11) of the sessions analyzed by the experts had Finn ≥ 0.90 (mean session score = 4.0; range 3.6-4.0) in the adequacy and relevance criteria, which indicates almost absolute agreement between the quantitative assessments. However, even in sessions with an average score ≥ 3.6, modifications of some sentences/excerpts were suggested (*i.e.,* qualitative analysis). Table 3 presents a summary of the excerpts from the sessions that underwent reformulations based on the suggestions by experts.

Although wording from some sessions have been reworked, none have undergone significant content or structural reformulations after expert review. Furthermore, only one session presented Finn < 0.90, some excerpts from four sessions were reformulated based on qualitative analysis and eight sessions did not change. Tree of the five experts suggested modifications of phrases or words in at least one section of the manual. After the experts' analysis, the adolescents performed the reliability analysis of the GCBT CAMALEO TOC manual, with Finn = 0.98 (mean session score = 3.7; range 3.6-3.9) in the adequacy criterion in all analyzed sessions, which indicates almost absolute agreement between quantitative assessments. However, even in sessions with a mean score ≥ 3.6, changes in terms/words (*i.e.,* qualitative analysis) were suggested. Table 4 presents the synthesis of excerpts from the sessions that underwent reformulations based on the adolescents› suggestions.

Differently from the analysis of the experts, in the analysis of the adolescents only modifications of some specific terms/words of 10 sessions were recommended. None of the sessions underwent significant content or structural reformulations and/or had excerpts removed after the analysis of the adolescents. Differently from what happened in the experts' analysis, none of the sessions presented Finn < 0.90, that is, the changes made in the 10 sessions were based only on the qualitative analysis. Three of the seven adolescents suggested modifications to some word or phrase in the manual. Although two of the five experts and five of the seven adolescents reported that the GCBT CAMALEO TOC manual was too extensive, it was not possible to reduce the size of the sessions/manual due to the need to present specific/necessary contents for the treatment of adolescents involving psychoeducation performed in sessions 1 and 2.

Comparison of the structure of the CAMALEO TOC manual with other GCBT manuals for OCD in adolescents

Table 5 presents the structure data of the CAMALEO TOC manual and the comparison with similar manuals identified in our systematic review (Bortoncello et al., 2022). It is noteworthy that, although there is an international GCBT manual for adolescents with OCD that was adapted and tested in Brazil (Asbahr et al., 2005; Fatori et al., 2018), this manual did not perform the translation and adaptation stage recommended by Boateng et al., (2018) and by the ITC (2012, 2017) as a literature review and language assessment by the target audience (adolescents). Furthermore, no evidence of psychometric and/or cross-cultural adaptation process of the manual has been published and the manual is not available for use by health professionals, whether paid or free.

Regarding the number and duration of sessions, studies with other protocols have an average of 13 sessions (SD = 3) lasting 1.52 hours (SD = 0.24). Thus, CAMALEO TOC is within the average number and duration of sessions of other manuals. In addition, one of the most used GCBT manuals for the treatment of OCD in children internationally (March & Mulle, 1998) is usually adapted in different formats, with variations in the number and duration of sessions.

Table 3. GCBT CAMALEO TOC manual sessions reworked based on experts suggestions.

	Excerpts from the sessions (*CAMALEO TOC*)	
Sessions (Finn)	Before the expert review (Average of the evaluations of the sessions)	After expert analysis
Session 1 (1.0R; 0.90A)	Title Session 1: DO YOU HAVE OBSESSIVE COMPULSIVE DISORDER (OCD)?	What is OCD? (It was placed as a subtitle)*
	If I believe that going under the stairs will bring bad luck to my family, I feel the need to cross the street.	...I feel the need to stay away from stairs*
Session 2 (0.85R; 0.85A)	Be kind and polite and if he doesn't listen, remember that you are on this journey together.	Be kind and polite! It is very difficult for him to deal with the symptoms, so remind him that you are on this journey together**
Session 3 (1.0R; 1.0A)	Remember that anxiety rises and then falls.	Remember that the anxiety, fear or discomfort you will feel during the exposure is temporary, you are able to bear it, but if it is too difficult, you can ask someone you trust for help*
	Change or remove the example "don't take your shoes off to enter the house". With the pandemic, it became a welcome habit. It can generate confusion.	Removed*
Session 4 (1.0R; 1.0A)	30 seconds is the maximum time for hand washing.	30 seconds is adequate time for...*
	Shampoo or soap no more than twice	Shampooing or soap once is considered sufficient*
	Not washing dishes and cutlery before meals.	Do not wash dishes and cutlery before meals, when they are already clean*
	I suggest reviewing all examples of coping with "normal hygiene" habits. With the pandemic, it is no longer correct to drink from the same glass, share food, pull over a railing...	These and other examples that could generate doubts have been removed or clarified*
	Avoid social interaction (for example: not to feel anxiety if you have to share the bathroom, not to run the risk of touching someone you think is contaminated, etc.);	Avoid social interaction, outside the pandemic period...*
	Avoid touching toilets, faucets, doorknobs, handrails, sick people for fear of contaminating yourself, etc.	Avoid touching toilets, faucets, doorknobs and handrails in your own home for fear of contaminating yourself (outside the pandemic period)*
	Touching stair, mall, or bus handrails.	Touching stair, mall, or bus handrails and not washing hands immediately*
Session 5 (1.0R; 1.0A)	-	-
Session 6 (1.0R; 1.0A)	-	-
Session 7 (1.0R; 1.0A)	-	-
Session 8 (1.0R; 1.0A)	-	-
Session 9 (1.0R; 1.0A)	-	-
Session 10 (1.0R; 1.0A)	-	-
Session 11 (1.0R; 1.0A)	-	-
Session 12 (1.0R; 1.0A)	-	-

*Modified based on qualitative expert comments, **Modified based on comments + quantitative analysis (*i.e.*, session Finn < 0.90), A: Adequacy, R: Relevance.

Table 4. CAMALEO TOC manual sessions reworked based on adolescents' suggestions.

	Excerpts from the sessions (CAMALEO TOC)	
Sessions (Finn)	**Before adolescents'analysis** (Average of the evaluations of the sessions)	**After adolescents' analysis**
Session 1 (0.93A)	Bad omen Blasphemies Unanimous and Socratic	Bad omen removed Added explanation (insult, outrage)
Session 2 (0.94A)	Unanimous and Socratic	
Session 3 (0.93A)	Unanimous and Socratic	Socratic Questioning (questioning the automatic negative or catastrophic thought that comes to your mind, paying attention, so you don't let fear or distress drive you to do a ritual). Unanimously removed
Session 4 (0.93A)	Unanimous and Socratic	
Session 5 (0.93A)	Unanimous and Socratic	
Session 6 (0.93A)	Unanimous and Socratic	
Session 7 (0.96A)	Obsessive rumination	
Session 8 (0.96A)	Obsessive rumination	Word removed
Session 9 (0.94A)	Obsessive rumination	
Session 10 (0.94A)	Obsessive rumination	
Session 11 (0.94A)	-	-
Session 12 (0.94A)	-	-

A: Adequacy.

Regarding the presence of family members, the CAMALEO TOC is one of the manuals with the longest participation of family members during treatment. This decision was made by the creator of the manual since the involvement of parents can be useful to maximize the effectiveness of the treatment (Sun et al., 2019). Regarding the number of pages, although some experts and adolescents have mentioned that the CAMALEO TOC was very extensive and could be summarized, this manual is half the size of other international manuals (March & Mulle, 1998; Selles et al., 2018).

DISCUSSION

This study aimed to present the stages of construction of the CAMALEO TOC manual and verify its evidence of content validity. The results of the experts' assessment of the relevance of the content of the manual (Finn = 0.99) and the adequacy of the experts and adolescents (Finn = 0.98) suggest that the structure of the CAMALEO TOC presents excellent preliminary evidence of content validity for use in Brazilian adolescents.

Although there is no minimum number of psychometric evidence for a given instrument to be considered valid, it is known that the greater the number of evidence, the greater its reliability (Boateng et al., 2018). Therefore, considering that this article presents a type of validity evidence, other studies that include a larger number of participants and perform other analyzes (*e.g.,* intervention/manual effectiveness) should be conducted. In addition to the small sample size, this study also has as a limitation the use of a sample composed almost exclusively of girls aged ≥ 14.

Therefore, before testing the effectiveness of the GCBT CAMALEO TOC manual, future studies are recommended to verify the content validity of the manual in adolescents between 10 and 13 years old, with equal numbers of boys and girls in the sample. Especially considering the existence of Brazilian population data (Vivan et al., 2014) that indicate that OCD symptoms usually appear at an average age of 10 years (SD = 2.4), therefore, it is important to verify the adequacy of the language of the CAMALEO TOC for this age group. Despite these limitations, CAMALEO TOC has some advantages compared to other manuals available for OCD treatment. As far as is known, the CAMALEO TOC is the only instrument that rigorously followed the stages suggested for the development of instruments in the health area, such as conducting a systematic review and content validation by experts and target audience (Boateng et al., 2018; ITC, 2012, 2017). In this sense, the evidence of content validity of the CAMALEO TOC contributes to a better understanding of the manual by adolescents, which may imply greater effectiveness of the intervention since a manual or evaluation instrument with inadequate/invalid content may erroneously indicate the

Table 5. Structure of the CAMALEO TOC manual and comparison with similar manuals.

Reference	Manual/protocol	Number of sessions*	Duration of sessions	Family participation (how many/ which sessions)	Manual pages
Brazil (present study)	CAMALEO TOC	12	2h	2 sessions with parents and 10 sessions with parents in last 15 min	130
EUA (Fischer et al., 1998)	A standardized behavioral group treatment program for obsessive-compulsive disorder[1]	7	1.5h	Optional in all sessions	NR
(Martin et al., 2005)		14	1.5h	Two simultaneous groups: 60 min children (G1) 60 min parents (G2) At the end of each session, the groups got together for 30 min	
EUA (Thienemann et al., 2001)	How I ran OCD off My Land[2]	14	2h	Last 15 min of each session + 1 session with the participation of parents	298
Brasil (Asbahr et al., 2005)		12	1.5h		
Brasil (Fatori et al., 2018)		14	1.7h		
Irã (Shabani et al., 2019)		12	1h	Last 5 min of each session, they received a summary of what was discussed and were instructed not to reinforce obsessive behaviors	
EUA (Himle et al., 2003)	Group behavioral therapy for adolescents with obsessive compulsive disorder[1]	7	1.5h	1 optional weekly session with patients and family	NR
Australia (Barret et al., 2004)	Freedom From Obsessions and Compulsions Using Cognitive-Behavioral Strategies (FOCUS)	17	1.5h	10 min parents + children and parents 30 min (skills training)	NR
Australia (Farrel et al., 2012)	OCD Busters	16	1.5h	Last 15 min of each session + 3 group sessions with parents (1h) and two individual sessions with each family (1h)	NR
Canada (Selles et al., 2018)	OCD is Not the Boss of Me	12	1.5h	Parents participated in a Parent Group and in the final 15-30 min of each session they join their children to answer questions	252

Note: *All manuals hold one session per week;[1] Protocol originally developed by Krone et al. (1991) for the treatment of OCD in adults; [2] Protocol originally developed by March and Mulle (1998) for the treatment of OCD in children and adolescents. NR – Not reported.

occurrence or no clinically significant effects during treatment (Haynes et al., 1995).

Furthermore, the CAMALEO TOC is one of the manuals with the longest participation of parents/family members during the sessions, which can also contribute to the greater effectiveness of the intervention. Especially considering the existence of evidence suggesting that family involvement in sessions significantly influences the effect size of ICBT and GCBT interventions with adolescents (Sun et al., 2019). Thus, family accommodation is present in relatives of patients with obsessive compulsive disorder, regardless of the type of obsessive-compulsive symptom (Matos et al., 2022) and the family plays an important role in the development and maintenance of OCD (Demaria et al., 2021).

CONCLUSION

The CAMALEO TOC manual presents excellent preliminary evidence of content validity for use in Brazilian adolescents. We hope that this new manual will bring contributions to the fields of psychology and clinical psychiatry. A GCBT manual for Brazilian adolescents can be used by the public health network to reduce waiting lines. Such a recommendation has already been made by other Brazilian researchers (Fatori et al., 2018). In addition, an efficacy and validation study of the manual presented in this article is being conducted by the manual's developer and will be published as soon as possible.

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