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#### **ORIGINAL ARTICLE**

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## Therapists' experience of the cognitive orientation to daily occupational performance (CO-OP) approach: Shifting from conventional practice

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#### ABSTRACT

**Background:** The CO-OP Approach<sup>TM</sup> has been increasingly used in research and practice, yet its critical elements and implementation challenges are largely undescribed. Obtaining therapists' perspectives on CO-OP may reveal insights into potential critical and mediating factors.

**Aim/Objective**: To explore the experiences of CO-OP therapists by understanding their perceptions on the approach compared with conventional practice, and by identifying mediating factors in its implementation.

**Material and Method**: This exploratory study utilized a qualitative descriptive design. A purposive sample of occupational therapists (n = 3) was interviewed. Data were analyzed using thematic analysis and themes were validated within a focus group.

**Results/Findings**: Three themes were identified: 'CO-OP works,' 'CO-OP delivery is mediated by contextual factors,' and 'CO-OP shifts the therapeutic approach.' Therapists perceived CO-OP to be efficacious for client-centred goal attainment. Guided discovery and the problem-solving strategy were identified as unique and challenging CO-OP elements. Mediating factors such as level of cognitive impairment and guality of family member involvement may affect CO-OP efficacy.

**Conclusions**: Therapists found CO-OP to be efficacious and adopted unique elements into their professional approaches.

**Significance:** This is the first study to investigate CO-OP therapists' experiences. Future research is recommended to enhance training of therapists in key CO-OP features.

#### Background

The Cognitive Orientation to daily Occupational Performance Approach (CO-OP Approach<sup>TM</sup>, CO-OP) has been progressively applied in rehabilitation. A recent scoping review of the literature identified 27 research papers related to the use and efficacy of the CO-OP Approach<sup>TM</sup> [1]. CO-OP efficacy and/or feasibility has been successfully replicated across settings, therapists, and clients [2], including but not limited to Developmental Coordination Disorder [3], acute and chronic stroke [4,5], traumatic brain injury [6], cerebral palsy [7], and Asperger's Syndrome [8]. In addition, numerous training workshops have been provided suggesting that many therapists have some familiarity with CO-OP. Increased use of CO-OP in research and practice may be attributed to its alignment with key rehabilitation tenets: rehabilitation should enable clients to improve their occupational performance beyond the intervention period [9] and promote change in clients' functioning in real-life environments [10]. Although the CO-OP Approach<sup>TM</sup> improves occupational performance within the client's chosen activities and participations [11], its critical elements and implementation challenges are largely undescribed.

To date, the experience of therapists delivering the CO-OP Approach<sup>TM</sup> has not been explored despite the integral role of therapists in strategy training [12,13]. Obtaining the perspectives of therapists around other approaches has proven valuable for a variety of purposes, such as understanding an intervention or instrument's clinical utility [e.g. 14,15], and comparing perceived mediating factors with those of stakeholders such as patients and caregivers [e.g. 16] to clarify implementation issues. Moreover, it is appropriate to solicit therapists' perspectives when there is a paucity of literature on their experiences and on the enablers and barriers to delivering specific

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**KEYWORDS** CO-OP; brain injury; strategy training; rehabilitation; cognition; qualitative methods interventions [17,18]. By understanding the therapist experience of delivering an intervention, it is possible to specify critical variables of interest [e.g. 19,20]. Therefore, garnering therapists' perspectives on the CO-OP Approach<sup>TM</sup> may yield insights regarding critical intervention variables and factors mediating its implementation.

#### The CO-OP Approach<sup>TM</sup>

CO-OP has been described as a model of theorydriven design and protocol-based intervention [21]. The manualized protocol outlines the enabling approach the therapist should take in guiding rather than directing intervention. First, the client sets personally meaningful goals for areas of occupational performance where they want to improve. The therapist then teaches the client the global strategy of Goal-Plan-Do-Check (GPDC), whereby the client defines a target for goal achievement, makes a plan that will get them closer to reaching that target, and then executes the plan before checking whether the desired result was obtained. This feedback is incorporated into subsequent plans until the goal is reached [22]. Throughout the CO-OP process, the client learns to discover domain-specific strategies (strategies pertaining to the goal) and to generalize them to novel contexts.

There are seven key features in the CO-OP process: intervention format, client-chosen goals, dynamic performance analysis (DPA), cognitive strategy use (global and domain-specific), guided discovery, enabling principles, and parent/caregiver involvement [22,23]. Two features – DPA and guided discovery – require additional explanation. Using DPA entails in-themoment scrutiny of occupational performance; the therapist helps the client understand how well their strategy is working for the task at hand. The guided discovery technique is used by the therapist to encourage client adeptness at generating, applying, and evaluating cognitive strategy use. Taken together, these seven key CO-OP features are intended for clients to improve confident occupational performance of personally meaningful activities in real-life situations. As implementers of the CO-OP Approach<sup>TM</sup>, therapists are asked to shift from an impairment reduction perspective common in rehabilitation, to one of occupational enablement; their experience of delivering this novel intervention merits investigation.

Accordingly, the purpose of this exploratory study was to explore therapists' experiences using the CO-OP Approach<sup>TM</sup>, which in turn may inform subsequent studies on CO-OP delivery and its potential critical intervention elements. Specific objectives were to understand how therapists perceive CO-OP compared with conventional practice, and to identify mediating factors in its implementation.

#### Methods

This study used qualitative description methodology as it facilitates obtaining data about participant experiences without researchers imposing predetermined interpretations of the data [24]. Ethics approval was obtained from the Research Ethics Boards at Baycrest and the University of Toronto.

#### **Participants**

Purposive convenience sampling was used with potential participants being identified by authors (DC, HP, DD) among clinicians they had trained in the CO-OP Approach<sup>TM</sup>. Participants were eligible for the study if they: (1) had been trained in CO-OP, (2) had used CO-OP with clients and/or research participants, and (3) were able to communicate in English. Three therapists provided informed, written consent to participate. Participants were female occupational therapists who had delivered CO-OP with various neurological populations in research contexts (Table 1) and experienced with task-specific approaches as part of conventional practice. As this was an exploratory study, participants were recruited from among those trained by the authors (DC, DD HP) working at universityaffiliated institutes within a diverse, metropolitan area in central Canada. The therapists were similarly trained to ensure intervention fidelity; this

Table '	1.	Participant	demographics
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	Participant 1	Participant 2	Participant 3	
Gender	Female	Female	Female	
Age (years)	34	46	43	
Years of OT experience	4	>20	>20	
Clinical Experience (populations/settings)	Pediatrics	Varied adult and pediatrics (physical-medicine)	Varied adult and pediatric (physical-medicine)	
CO-OP context	Research	Research	Research	
CO-OP experience	Children (8–9 years) with CP ( $n = 3$ )	Children (7–12 years) with CP ( $n = 4$ )	Adults with ABI ( $n = 20$ )	

ABI: Acquired Brain Injury; CP: Cerebral Palsy; OT: Occupational Therapy.

homogeneity allows inferences regarding training gaps relevant to clinical contexts that are less resourced. The authors who trained the therapists were not present during the interviews or the focus group and were not in direct contact with participants during this study; further, these authors only viewed de-identified data during analysis.

#### Procedure

Semi-structured interviews and focus group were conducted to elicit an in-depth exploration of participant experiences with delivering CO-OP, and perceptions of its effectiveness. Individual, in-person interviews lasting approximately one hour were conducted by one author (DM). An interview guide was developed to provide some structure while allowing participants the flexibility to offer perspectives that might otherwise not be considered by the researchers [25]. The three main questions were: (1) 'Tell me about your experience using CO-OP', (2) 'What value (if any) has been derived through the use of the CO-OP approach?' and, (3) 'Tell me how the CO-OP approach differs from what you may have done prior to being trained in this approach.' Probing questions (e.g. You mentioned that this particular aspect was a challenge/beneficial/remarkable/etc. Can you elaborate on your experience?) were used in all interviews to stimulate discussion and to clarify responses. Interviews were audio recorded, transcribed verbatim, and de-identified prior to analysis. The interviewer (DM) also made detailed notes during the interviews to augment information gathered from the verbal exchange. Following preliminary data analysis, participants were invited to attend a one-hour focus group to validate and/or shape identified themes, thus enhancing trustworthiness of the analysis. Member reflection was used to enhance rigour and triangulate experiences.

#### Data analysis

We used the thematic approach described by Braun and Clarke (2006), an iterative process that involves locating patterns of meaning which are repeated across a data set. This inductive method was selected to illuminate the experiences, meanings, and realities of participants at the semantic level, where descriptions and patterned responses can be analyzed flexibly within an essentialist/realist epistemology [26]. Consequently, the coding process can unfold without forcing data into an existing framework.

Data analysis proceeded in six phases, whereby two authors (AC, DM) independently (i) became familiar with the data through the reading of interview transcripts, (ii) generated initial codes by systematically noting and collating patterned features, and (iii) searched for themes by gathering codes into potential categories before checking that all data with similar meanings were clustered appropriately. Any coding discrepancies were resolved by consulting with a third author (DD). Next, (iv) a refined thematic map was developed, whereby (v) appropriate names and definitions were generated for each theme. Themes were confirmed after considering their 'internal homogeneity' (similarity of included codes) and 'external heterogeneity' (differentness of themes). Finally, (vi) themes were compared to literature and findings were reported. Analytical rigour was enhanced through independent coding by two individuals during the initial three phases, and through validation of the themes by the focus group during the fourth phase for credibility of results prior to continuation.

#### Results

Therapists experienced using CO-OP as a rewarding yet challenging approach to enabling occupational performance. Their responses were captured within three key themes and associated subthemes (Table 2). Although not all subthemes were mentioned by each participant during the interviews, they were all endorsed by participants in the focus group. Select quotations are presented to illustrate these themes.

#### **CO-OP** works

All participants perceived CO-OP to be an efficacious approach that: enables occupational performance, exceeds expectations, and enhances therapist practice.

Table 2.	Themes	and	subthemes.
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Theme	Subthemes
1. CO-OP works	a. Enabling occupational performance b. Exceeding expectations c. Enhancing therapist practice
2. CO-OP delivery is mediated by contextual factors	a. Personal factors b. Environmental factors c. Occupational factors
3. CO-OP shifts the therapeutic approach	a. Client-centred enablement b. Problem-solving skills c. Guided discovery technique

#### Enabling occupational performance

Therapists observed that positive changes were evident in their clients who differed by age, condition, and number of years post-injury. All therapists perceived CO-OP to be effective for clients' goal attainment: 'I saw people make progress towards goals. Most often I saw them accomplish them or at least one of their three goals' (Participant 3, P3). Most clients 'did achieve their goals...fairly easily in the 12-week block' (P2). P3 elaborated on CO-OP's utility, stating that 'I don't recall having a... a really negative experience with it,' and that 'I found it really, really powerful.' By achieving personal goals, clients experienced 'increased self-confidence [and] increased motivation' (P3) and were 'more excited about [CO-OP]' (P1).

#### Exceeding expectations

In many instances, clients achieved their goals even when they, their therapist, and/or family members doubted the feasibility. This was exemplified in the words of P3:

You know in almost every case there was sort of an 'aha' moment where you know somebody, whether it was the client or the family member who said, wow – I can't believe I could do that or I can't believe they could do that.

Initially, therapists may have deemed client goals to be unrealistic given their underlying impairment, but one had a client who 'not only [achieved a goal of cooking], he did it safely and did it well' (P3). Changes in clients' abilities were noted even beyond time in therapy which further reinforced therapists' views that CO-OP works.

And in a number of cases I noticed that they, aside from the goals that we worked on as part of CO-OP, they took on some pretty significant activities outside of the therapy that I was doing with them. Um, all on their own, but they blamed it on using CO-OP (laughing). They said, 'Oh I would have never done this, but CO-OP helped me figure out how to go about doing this' (P3).

#### Enhancing therapist practice

Although all therapists began their CO-OP practice in a research context, each 'have since also expanded the principles in [their] own clinical practice' (P2), though some did so 'with less structure' than the CO-OP version used in the research setting (P1). Some therapists perceived individual components of CO-OP such as guided discovery to be an effective tool: 'I have to say that the biggest impact I think [CO-OP] had, is in my personal life – in dealing with my kids  $\dots$  [instead] of telling someone what to do, asking them what to do' (P3).

#### **CO-OP** delivery is mediated by contextual factors

The second theme reveals that CO-OP delivery was perceived to be helped or hedged by personal factors, environmental factors, and occupational factors.

#### Personal factors

Although therapists perceived that CO-OP works for clients with different diagnoses, they also identified that the CO-OP experience was mediated in part by a client's personal factors such as having a 'significant learning disability' (P2) or a different 'learning style' (P1). For one client, P1 expressed that 'the approach just wasn't really working for her,' and speculated that the client 'does get frustrated typically when she gets challenged... so, it may have just been a personality [thing].' She noted that this approach worked better for:

The type of person that's a bit more of a problemsolver... some people are more self-directed and want to try things that are their ideas, whereas other people they're happy to have someone suggest something and see if that works for themselves.

Participant 2 observed that client cognitive abilities may dampen the efficacy of CO-OP:

[CO-OP] works well with kids that are quite bright and that, but for kids again that have you know maybe some cognitive challenges or um that that it doesn't work as well I don't think... for them to be able to analyze and come up and problem solve you know.

However, P3 provided a counterpoint based on her experience using CO-OP with adults who have traumatic brain injury, finding 'this approach useful ... almost regardless of a person's level of impairment' and adding, '... it almost seems like it's applicable to anybody that can come up with goals for themselves.'

#### **Environmental factors**

All therapists noted that the home environment promoted positive results for clients as sessions involved familiar, consistent objects in a relevant setting. 'I guess the nice thing again is doing it in the client's home using their bike, you know their dinner table, that kind of thing is very helpful' (P2). P3 supported this idea, noting that 'being in the context of their home made things more real... and they were able to say what their goal was.'

The involvement of family members could have an positive or negative influence, as 'whether or not the [child] was successful with their goals was very much dependent on whether or not they had um enough parental support in between ... sessions to achieve the goal' (P2). P3 emphasized how problematic it is when clients were prevented from developing their own goals: 'A number of times we've run into situations where the family's tried to step in and you know I mean I believe it's their intention to help, but it changes the whole dynamic of the treatment session.'

In contrast, some family members modelled well the CO-OP Approach<sup>TM</sup> by using the language and strategies with the individual with brain injury:

One of [the client's] goals was not to ask repetitive questions, so when he would ask his wife what's for dinner, she'd say, 'Well we're going to Swiss Chalet,' and he would have to write it in his book, 'We're going to Swiss Chalet,' so if he had that question again, he was to be directed back to his book. So his kids started to do that. 'What does it say in your book dad?' (P3)

#### **Occupational factors**

Thirdly, therapists perceived that the complexity of the occupational goal appeared to mediate its attainment.

You could already tell in the first assessment that [some goals] are doable with practice ... [but the other goals] of bike riding and the area with this child with things like doing up the zipper and perceptually with doing up the buttons and those kinds of things it would REALLY require a lot of diligence on the parents' part to work on every day, or every other day, not just the once a week that I came (P2).

Non-challenging goals affected motivation and could make the CO-OP process less beneficial. One individual was not engaged in CO-OP because her goal of printing neatly was suggested by the parent: 'That part was a little bit hard because we'd go to do printing and it looked quite good. So it was hard to try to come up with strategies' (P1).

#### **CO-OP** requires shifting the therapeutic approach

The final theme illuminates how therapists perceived that CO-OP differed from conventional practice in its focus on key elements: client-centred enablement, problem-solving skills, and guided discovery.

#### **Client-centred enablement**

Clients had to take an active role in CO-OP whereas 'other therapies you could sort of do passively' (P1). 'Just making sure the goals were things that were important to [the client]' seemed to make the goals 'real life' (P2). Within conventional practice settings, one client was told repeatedly by therapists that his cooking goal was not safe and so was discouraged from working on it. However, the client was eventually able to cook safely and well using CO-OP.

Having a very, very client-centred approach [be]cause this is .... I even look at the goals that I thought were inappropriate that the client chose. I shouldn't say inappropriate, but I'd say unattainable (laughing). Um... and the progress that people made towards those makes me think ....(P3).

P1 elaborated that 'it was empowering for [the client] to come up with strategies and try them and to decide for herself what worked and what didn't.' Indeed, the CO-OP Approach<sup>TM</sup> requires that therapists embolden the client 'to be more engaged, like they have to be, like they can't be a passive participant' (P1). All therapists reiterated this, identifying CO-OP as an 'active approach' (P3) that places 'more onus on the client' (P2).

#### Problem-solving skills

Therapists needed to 'step back' in CO-OP to '[give] them a way to problem-solve for themselves' (P3). 'I liked that, the goal-plan-do- and the check... because it really structured the sessions, you know it was something consistent throughout the whole block of therapy' (P1). The CO-OP approach enables clients to 'refer back to GPDC,' and have 'a strategy' as well as an 'alternative plan' (P3).

P3 clarified that suffering setbacks is a valuable component of problem-solving: 'I mean in CO-OP you don't necessarily set them up for failure, but if they fail as part of their plan, then that's okay, they learn from that and you move on and make another plan.' Therapists had to '[facilitate] them coming up with their intervention strategies and giving them more ownership of the suggestions of how to approach a task' (P2).

#### Guided discovery technique

Therapists had to adopt the language and interaction patterns befitting a guide rather than 'expert' health care professional. 'My previous clinical experience has been to set someone up for success...so changing/ adapting the environment, or adapting um... whatever needed adapting in order to give somebody the experience for success ... and in CO-OP, you don't do that' (P3). Allowing clients to 'make a mistake and learning from their own mistakes' differed from conventional practice and challenged therapists to 'shift your paradigm into that mode of thinking' (P3).

Therapists reflected that their instincts from conventional approaches was 'right away, wanting to effect change and sort of spoon feeding [clients] different ideas' (P2) rather than to guide clients toward generating their own solutions. Therapists delivering CO-OP found that the hardest part was 'knowing when to shut up... reframing how you speak (P3).

I was always having to be careful about not giving away strategies and giving them enough time to come up with them on their own. That was probably a challenge for me since I'm used to jumping in and trying to fix things so it um, you definitely had to be more cognizant of how you were, what you were doing as [a therapist] (P1).

#### Discussion

To our knowledge, this is the first study to explore therapists' experience of delivering the CO-OP Approach<sup>TM</sup>. Objectives understand were to therapists' perceptions of CO-OP compared with conventional practice and to identify factors mediating its implementation. This exploratory study identified themes where therapists perceived that CO-OP works, but that CO-OP delivery is mediated by contextual CO-OP shifts factors, and that the therapeutic approach.

Client-centred goal-setting is identified as a key feature of CO-OP and therapists' comments supported it as a critical intervention element of the CO-OP Approach<sup>TM</sup>. Therapists observed that goal-setting appeared to enable client motivation, engagement, and problem-solving efforts toward goal attainment. Therapists noted clients' enhanced personal commitment towards goal attainment when goals were selfselected and reciprocally, that achieving client-centred goals boosted self-efficacy. While therapists are typically invested in the rehabilitation successes of their clients, this implicit bias is offset by their comments that their personal expectations were surpassed by clients' occupational performance achievements, and by research evidence of CO-OP's efficacy [e.g. 1]. The significance of client-centred goal-setting in CO-OP aligns with Locke and Latham's [27] theory where the effect of goal-setting on goal attainment is regulated by personal commitment (including goal importance and self-efficacy), task demands, and provision of feedback on performance.

Therapists agreed that CO-OP would not work without client-centred goals, and that efficacy of the approach is affected by contextual factors such as family member support or interference. Indeed, therapists reported that problems arose when family members (environmental factor) were reluctant to allow the client to set their own goals. If a client appears to lack commitment or motivation (personal factor), one can question whether those goals were truly selfselected, since rehabilitation goals are of minimal worth when they are not meaningful, achievable, or motivating [28]. As the types of goals (occupational factor) set by parents often differ from those set by children [29] and because expectations were often exceeded in CO-OP, therapists should ensure goals are client-centred. Self-selected goals are intrinsically motivating [30] and therapists perceived that CO-OP requires active engagement from the client. Although client-centred goal-setting is posited to be a critical variable in CO-OP, its role, timing, and application in rehabilitation are issues of contemporary debate [31] and warrant investigation.

Witnessing the efficacy of CO-OP in enabling occupational performance may have compelled therapists to incorporate certain features into their own clinical practice. This is not surprising as therapists have been known to adapt and adopt techniques from various approaches that they believe would suit their clients' individual needs [32]. In particular, guided discovery and the GPDC problem-solving strategy merited inclusion into therapists' personal and professional approaches as they perceived these elements to enhance conventional practice. Guided discovery obliges the therapist to provide the right amount of guidance and not tell the client what to do, so therapists needed to switch from providing directives to clients and adhere instead to principles like 'ask don't tell' and 'coach don't adjust' [22]. Therapists found having to 'shift [their] paradigm into that [CO-OP] mode of thinking' (P3) challenging. This may be because therapists tend to combine approaches and techniques based on prior experiences [33], and CO-OP requires them to avoid utilizing techniques that would conflict with enabling the client to apply the GPDC problem-solving strategy independently.

Therapists provided contrasting viewpoints regarding the effect of clients' cognitive ability on the CO-OP process, and within the focus group, acknowledged that cognitive ability did seem to affect goal achievement. One therapist believed that CO-OP works regardless of clients' cognitive abilities, so long as they could set their own goals; however, other therapists noted that CO-OP efficacy may hinge upon cognitive abilities. This inconsistency suggests a limitation in the CO-OP Approach<sup>TM</sup>, and/or a limitation in the therapists' skills in delivering CO-OP. Given the accumulating evidence on the success of CO-OP for people with cognitive difficulties [1], this discrepancy in therapists' CO-OP experience provides impetus for therapists to develop greater proficiency in supporting clients' strategy use. CO-OP trainers can also provide targeted training for therapists to anticipate and identify where occupational performance is breaking down (i.e. dynamic performance analysis, DPA). Reflective practice and feedback from CO-OP trainers can further support therapists in building skill and confidence regarding DPA when clients' cognitive difficulties challenge CO-OP use. These challenges have been noted in research contexts where ongoing feedback is given by CO-OP trainers; therefore, doing DPA well with clients who have cognitive deficits is likely more challenging in clinical settings where CO-OP experts are not readily accessed.

Overall, therapists perceived the outcomes and key ingredients in the CO-OP Approach<sup>TM</sup> differently than did clients and family members as reported in the literature [cf. 34,35]. Moreover, of the seven key CO-OP features, therapists in this exploratory study perceived four as intervention variables necessary for achieving benefit: client-centred goal-setting, global strategy use (GPDC), guided discovery, and enabling principles. This aligns well with the elements recently deemed 'essential' to the CO-OP process by an international working group convened regarding CO-OP intervention fidelity [36]. However, the expert working group also identified a fifth element of importance: DPA. This interesting omission by therapists in this study indicates that further exploration of the therapist perspective is needed, and harkens back to their stated struggle regarding adhering to CO-OP techniques with clients of varying cognitive ability. Perhaps elevating therapists' proficiency and confidence with DPA would lead to greater goal attainment for clients with challenging cognitive impairments. The lack of DPA mention by therapists yields implications for their training in the CO-OP Approach<sup>TM</sup> and raises the question of ensuring ongoing intervention fidelity. Future research can investigate the effect of cognitive impairment levels on CO-OP efficacy, and whether improved DPA training will better prepare therapists to deliver CO-OP. As the CO-OP therapist experience was previously uninvestigated, findings from this study may guide future research on the critical variables and mediating implementation factors of the CO-OP Approach<sup>TM</sup>.

#### Limitations

Although the perspectives offered by this qualitative study originate from a limited breadth of participants, the data was rich in diversity and novelty which has been argued to be a valuable criterion in qualitative research [37]. While data saturation was not reached, a focus group allowed therapists to meet where they agreed with one another's perspectives on CO-OP. Therefore, the scope of the conclusions and bounds of interpretations reflect the restricted size of this work. The perspective of one therapist working with adults is more heavily represented perhaps because she delivered CO-OP to a greater number of clients. While findings may not be generalizable to other contexts, the intent was not to maximize generalizability but instead to reach a 'substantive' analysis fitting the characteristics of the participants and their contexts [38]: the sample is appropriate given the exploratory nature of this study [e.g. 32,39]. In addition to recruiting larger, more diverse participant samples, future research should provide detailed description of therapist experiences with other forms of therapy (e.g. goal-setting, task-focused) to enhance comparison between intervention elements.

#### Conclusions

Therapists perceived CO-OP to be efficacious for promoting client goal attainment. Guided discovery and the GPDC problem-solving strategy were CO-OP elements considered by therapists to be unique compared with conventional practice. These two elements were also perceived to contribute to efficacy of the approach; however, the implementation of these novel elements was challenging because it necessitated an intentional shift in therapists' professional paradigms. While data saturation was not reached with the small participant sample, this exploratory study does provide important insights to guide future research into CO-OP's critical intervention elements underlying its efficacy, and on how best to train practitioners on the CO-OP Approach<sup>TM</sup>.

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#### References

- Scammell EM, Bates SV, Houldin A, et al. The Cognitive Orientation to daily Occupational Performance (CO-OP): a scoping review: L'approche CO-OP (Cognitive Orientation to daily Occupational Performance): examen de la portée. Can J Occup Ther. 2016;83:216–225.
- [2] Dawson D, McEwen S, Polatajko H. The CO-OP Approach<sup>TM</sup>: enabling Participation across the Lifespan. Bethesda (MD): AOTA Press; 2017.
- [3] Thornton A, Licari M, Reid S, et al. Cognitive Orientation to (Daily) Occupational Performance intervention leads to improvements in impairments, activity and participation in children with Developmental Coordination Disorder. Disabil Rehabilit. 2016;38:979–986.
- [4] Ahn SN, Jung MY, Park HY, et al. Comparison of cognitive orientation to daily occupational performance and conventional occupational therapy on occupational performance in individuals with stroke: a randomized controlled trial. Nre. 2017;40:285–292.
- [5] Skidmore ER, Holm MB, Whyte EM, et al. The feasibility of metacognitive strategy training in acute inpatient stroke rehabilitation: case report. Neuropsychol Rehabilit. 2011;21:208–223.
- [6] Dawson DR, Binns MA, Hunt A, et al. Occupationbased strategy training for adults with traumatic brain injury: a pilot study. Arch Phys Med Rehabil. 2013;94:1959–1963.
- [7] Cameron D, Craig T, Edwards B, et al. Cognitive Orientation to daily Occupational Performance (CO-OP): a new approach for children with Cerebral Palsy. Phys Occup Ther Pediatr. 2017;37:183–198.
- [8] Rodger S, Pham C, Mitchell S. Cognitive strategy use by children with Asperger's syndrome during intervention for motor-based goals. Aust Occup Ther J. 2009;56:103–111.
- [9] Polatajko HJ, McEwen SE, Ryan JD, et al. Pilot randomized controlled trial investigating cognitive strategy use to improve goal performance after stroke. Am J Occup Ther. 2012;66:104–109.
- [10] Üstün TB, Chatterji S, Bickenbach J, et al. The International Classification of Functioning, Disability and Health: a new tool for understanding disability and health. Disabil Rehabilit. 2003;25:565–571.

- [11] McEwen S, Houldin A. Generalization and Transfer in the CO-OP Approach<sup>TM</sup>. In: Dawson D, McEwen S, Polatajko H, editors. The CO-OP Approach<sup>TM</sup>: enabling Participation across the Lifespan. Bethesda (MD): AOTA Press; 2017.
- [12] Geusgens C, Winkens I, van Heugten C, et al. Occurrence and measurement of transfer in cognitive rehabilitation: a critical review. J Rehabil Med. 2007;39:425-439.
- [13] Toglia JP, Rodger SA, Polatajko HJ. Anatomy of cognitive strategies: a therapist's primer for enabling occupational performance. Can J Occup Ther. 2012;79:225-236.
- [14] Gustafsson SM, Sunnerhagen KS, Dahlin-Ivanoff S. Occupational therapists' and patients' perceptions of ABILHAND, a new assessment tool for measuring manual ability. Scand J Occup Ther. 2004;11:107–117.
- [15] Rowland T, Turpin M, Gustafsson L, et al. Chedoke arm and hand activity inventory-9 (CAHAI-9): perceived clinical utility within 14 days of stroke. Top Stroke Rehabil. 2011;18:382–393.
- [16] Doig E, Fleming J, Cornwell P, et al. Qualitative exploration of a client-centered, goal-directed approach to community-based occupational therapy for adults with traumatic brain injury. Am J Occup Ther. 2009;63:559–568.
- [17] Carson K, MacIlfatrick S. More than physical function? Exploring physiotherapists' experiences in delivering rehabilitation to patients requiring palliative care in the community setting. J Palliat Care 2013;29:36–44.
- [18] Nielsen M, Keefe F, Bennell K, et al. Physical therapist-delivered cognitive-behavioral therapy: a qualitative study of physical therapists' perceptions and experiences. Phys Ther. 2014;94:198–209.
- [19] Doig E, Fleming J, Kuipers P. Achieving optimal functional outcomes in community-based rehabilitation following acquired brain injury: a qualitative investigation of therapists' perspectives. Br J Occup Ther. 2008;71:360–370.
- [20] Pattinson KM, Brooks D, Cameron J, et al. Factors influencing physical therapists' use of standardized measures of walking capacity poststroke across the care continuum. Phys Ther. 2015;95:1507–1517.
- [21] Cohn ES, Coster WJ. Unpacking our theoretical reasoning. In: Schell BA, Gillen G, Scaffa M, Cohn ES, editors. Willard and Spackman's Occupational Therapy. 12th ed. Philadelphia (PA): Lippincott Williams & Wilkins; 2013. p. 478–493.
- [22] Polatajko HJ, Mandich A. Enabling Occupation in Children: the Cognitive Orientation to Daily Occupational Performance (CO-OP) Approach. Ottawa, ON: CAOT Publications ACE; 2004.
- [23] Polatajko HJ, Mandich AD, Missiuna C, et al. Cognitive Orientation to daily Occupational Performance (CO-OP): part III-the protocol in brief. Phys & Occup Ther Pediatr. 2001;20:107–123.
- [24] Sandelowski M. Focus on research methods: whatever happened to qualitative description? Res Nurs Health. 2000;23:334–340.
- [25] Hurley WL, Denegar CR, Hertel J. Research Methods: a Framework for Evidence-Based Clinical

Practice. Baltimore (MD): Lippincott Williams & Wilkins; 2011.

- [26] Braun V, Clarke V. Using thematic analysis in psychology. Qual Res Psychol. 2006;3:77–101.
- [27] Locke EA, Latham GP. Building a practically useful theory of goal setting and task motivation. A 35-year odyssey. Am Psychol. 2002;57:705–717.
- [28] Scobbie L, Wyke S, Dixon D. Identifying and applying psychological theory to setting and achieving rehabilitation goals. Clin Rehabil. 2009;23:321–333.
- [29] Morgan M, Long T. The effectiveness of occupational therapy for children with Developmental Coordination Disorder: a review of the qualitative literature. Br J Occup Ther. 2012;75:10–18.
- [30] Siegert R, Taylor W. Theoretical aspects of goalsetting and motivation in rehabilitation. Disabil Rehabilit. 2004;26:1-8.
- [31] Plant SE, Tyson SF, Kirk S, et al. What are the barriers and facilitators to goal-setting during rehabilitation for stroke and other acquired brain injuries? A systematic review and meta-synthesis. Clin Rehabilit 2016;30:921–930.
- [32] Copley J, Nelson A, Turpin M, et al. Factors influencing therapists' interventions for children with learning difficulties. Can J Occup Ther 2008;75: 105–113.
- [33] Nelson A, Copley J, Flanigan K, et al. Occupational therapists prefer combining multiple intervention

approaches for children with learning difficulties. Aust Occup Ther J. 2009;56:51–62.

- [34] Henshaw E, Polatajko H, McEwen S, et al. Cognitive approach to improving participation after stroke: two case studies. Am J Occup Ther. 2011;65: 55-63.
- [35] Rodger S, Springfield E, Polatajko HJ. Cognitive Orientation for daily Occupational Performance approach for children with Asperger's syndrome: a case report. Phys Occup Ther Pediatr. 2007;27: 7–22.
- [36] Skidmore E, McEwen S, Green D, et al. Essential elements and key features of the CO-OP Approach<sup>TM</sup>. In: Dawson D, McEwen S, Polatajko H, editors. The CO-OP Approach<sup>TM</sup>: enabling Participation across the Lifespan. Bethesda (MD): AOTA Press; 2017.
- [37] Tracy SJ. Qualitative quality: Eight "big-tent" criteria for excellent qualitative research. Qualitative Inquiry. 2010;16:837–851.
- [38] Eakin JM, Mykhalovskiy E. Reframing the evaluation of qualitative health research: reflections on a review of appraisal guidelines in the health sciences. J Eval Clin Pract. 2003;9:187–194.
- [39] McEwen SE, Polatajko HJ, Davis JA, et al. 'There's a real plan here, and I am responsible for that plan': participant experiences with a novel cognitive-based treatment approach for adults living with chronic stroke. Disabil Rehabil. 2010;32:540–550.