Research Centre

Towards more accurate and meaningful measurement of client experience: The Client Experience Survey for Integrated Home and Community Care (CESI-HCC)

Patient-reported experience measures (PREMs) provide critical outcome data for evaluating health system improvements against the gold standard Quadruple Aim and Health Equity framework.[1-3] Current tools are insufficient for evaluating emerging and needed models of integrated home and community care.[4,5] We developed a new PREM with a goal to meaningfully measure equity, life care and continuity in home and community care.

> "The CESI-HCC gives us meaningful, reliable and valid client experience data – critical to SE Health's commitment to delivering high quality care that is responsive to individual needs, preferences and goals. The creation of the CESI-HCC learning community is exciting because it will help us build organizational capacity to meaningfully collect data from practice, transform this data into knowledge, and move this knowledge back into practice."
> - Tricia Swartz, VP Operational Excellence & Professional Practice, SE Health

Project overview

The principles of equity, life care, and continuity are foundational to emerging models of integrated home and community care. These models aim to meet client needs and preferences through a combination of home healthcare services (e.g., nursing and needed medical equipment) with supportive community-based services (e.g., housekeeping, meal preparation, transportation, and socialization).

Equity: is about care that is accessible and feels safe, respectful, and fair.[3,6]

Life care: is about care that meets holistic needs such as bodily functions, daily functioning, mental well-being, participation, meaningfulness, and quality of life and is perceived to be collaborative and person-centred.[7,8]

Continuity: is about care that feels connected, continuous, and coherent – that care providers know what happened to clients before, and what the plan is now.[9]

Patient-reported experience measures (PREMs) are important for identifying, monitoring, and addressing the concerns and priorities that matter most to clients and their families at the practice, organizational, and system levels.[5] While PREMs have been developed and validated across a variety of facility-based health care settings,[10] none exist that were intentionally designed and validated for use in the unique context of integrated home and community care accounting for the principles of equity, life care and continuity.

What have we done?

As part of our research portfolio investigating Health and Care Experiences, we conducted a 4-phase research study to develop a new PREM for integrated home and community care that included experts-by-experience (healthcare leaders, clients, caregivers, and providers) in the development process.[11]

Phase 1 – Item pool generation: we conducted an environmental scan of academic & grey literature on PREMs for integrated home and community care. We then used a consensus process to organize and define a list of items that could be included in the PREM (i.e., the item pool). This involved grouping the items into three domains, or key topic areas: equity, life care and continuity. Finally, we interviewed healthcare

leaders (n=6) to assess item relevance and coverage.

Phase 2 – Item refinement: we engaged clients & caregivers (n=17) in focus groups, and health & social care providers (n=15) in interviews to assess coverage and relevance of items and domains.

Phase 3 – PREM user testing: we engaged a diverse group of clients and caregivers (n=11) in a "thinking aloud" process to understand how the new PREM items were being interpreted, if they were clear, and if scale options made sense.[11]

Phase 4 – PREM field testing: we analyzed data from administering the CESI-HCC via telephone to diverse home and community care clients in Ontario, Canada (T1 n=184; T2 n=20) to test validity (i.e., determine if the PREM measures what it is intended to) and reliability (i.e., determine if the PREM produces the same results on different occasions).

What did we find?

Phase 1 – Item pool generation: we found 30 PREMs containing 839+ items relevant to patient experience of integrated home and community care. From these, we created a literature-based item-pool with 3 domains (i.e., equity, life care and continuity), 14 sub-domains and **72 items**. Interviews with healthcare leaders confirmed the relevance and coverage of the item pool based on their expertise in leading integrated home and community care programs.

Phase 2 – Item refinement: client, caregiver, and provider recommendations led to several adaptations including creating a fourth **'Relational Caring' domain** with six items (five moved from equity and life care, and a new item to measure 'kindness') and excluding or combining redundant or vague items. The resulting **39 items** were scaled on a 5-point Likert scale from 'strongly disagree' to 'strongly agree' to produce the CESI-HCC. Options for 'not applicable' and 'I choose not to answer' were included, along with participant instructions and demographic questions.

Phase 3 – PREM user testing: client and caregiver feedback led to several changes including role-specific instructions for clients and caregivers, re-ordering of questions, clarifying wording for 19 items, collapsing non-response options to 'No answer,' amending an item to capture appropriate care, and combining two items about involvement in decision-making.

Phase 4 – PREM field testing: The CESI-HCC is a valid and reliable index of client experience of integrated home and community care in Ontario, with four unique scales representing each domain. This is supported by preliminary Exploratory Factor Analysis (EFA), internal consistency, test-retest reliability and convergent validity with a global rating of home care experience (**Table 1**). As field testing data showed response bias towards the upper bound of the Likert scale, the scale was adjusted to add more agreement options (i.e., maintaining a 5-point scale but removing the neutral point).

Table 1. Reliability and validity testing results

CESI-HCC Domain	# of Items	Kaiser-Meyer-Olkin MSA[a]	EFA item loadings	Internal Consistency (α) (n=184)	Convergent Validity (r) (n=182)	ICC 2, A1 (95% CI) (n=20)
Life Care	12	0.90	0.54 – 0.80	0.95	0.72, p < .001	0.65 (0.51-0.80)
Equity	12	0.93	0.66 – 0.85	0.94	0.69, p < .001	0.67 (0.52-0.81)
Continuity	6	0.88	0.67 – 0.90	0.90	0.75, p < .001	0.71 (0.57-0.84)
Relational Caring	6	0.87	0.84 – 0.90	0.91	0.75, p < .001	0.74 (0.61-0.86)

What are the next steps?

The CESI-HCC is being implemented in Ontario as part of a quality improvement initiative led by SE Health. To support this, a knowledge mobilization workshop was held with healthcare leaders in October 2024, leading to the creation of a learning community focused on building capacity for moving CESI-HCC data to knowledge to practice. We will also continue refining the CESI-HCC to ensure it measures what it is intended to and that it produces consistent results.[11]

How is this research funded and supported?

This work is currently funded and supported by SE Health, one of Canada's largest social enterprises.

To learn more about this work

Review the questions in the CESI-HCC

To cite this work/ References