Exploring deprescribing opportunities for community pharmacists: Protocol for a qualitative study

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Introduction

Discontinuing unnecessary or harmful medications to improve patient outcomes is not a new concept. Called *deprescribing*,[1,2] this notion has gained momentum in the past decade amid growing concerns about the overuse of medications and related consequences.[3,4] Deprescribing can be defined as a process of dose reduction or stopping of medications if they are no longer beneficial or have the potential for causing harm.[5] National organizations such as the Canadian Deprescribing Network are working to enact a cultural shift toward stopping medications that fall into these categories among clinicians, patients and decision makers.[3,4] This is part of a larger movement toward reducing unnecessary waste in the health care system, spearheaded by multinational initiatives such as Choosing Wisely.[3,6,7]

Deprescribing is often considered a multistep process that includes assessing therapy for the need to discontinue, agreeing on a plan of action with the patient (and ideally, other members of the health care team) and monitoring the outcomes.[8,9] Some consider deprescribing as simply a part of good prescribing or medication management and thus a necessary part of practice for health care providers involved in such aspects of patient care.[9,10]

As the primary prescribers for most patients, physicians are the logical health care practitioner to champion deprescribing.[9,10] However, physicians report that deprescribing is challenging, because of factors such as lack of time, a lack of confidence in knowing when and how to stop medications and a lack of direct reimbursement.[11-13] Physicians also perceive resistance from patients to accepting deprescribing interventions,[12] a finding that has been confirmed by studies of patient perspectives on deprescribing.[14] Patients are especially hesitant to accept deprescribing interventions if they feel insufficiently informed or monitored by their physician during the process.[14]

Pharmacists are health care professionals whose scope focuses on managing medication therapy, and so they may contribute to the deprescribing process. Currently, there is a paucity of research examining community pharmacists' contributions to and challenges with the deprescribing process, which this study seeks to address.

Through collaboration with patients and prescribers, pharmacists can identify and assess deprescribing opportunities, make recommendations to prescribers, facilitate patient agreement with the interventions and monitor outcomes. Community pharmacists in particular are well positioned to encounter deprescribing opportunities regularly through the dispensing process, where they are expected to assess whether medications are indicated, effective, safe and convenient before providing them to patients.[15] In addition, most provinces have programs to support medication reviews (such as MedsCheck in Ontario[16]), which may also facilitate opportunities for deprescribing. In Ontario, the Pharmaceutical Opinion program provides community pharmacies with the opportunity to be reimbursed for making

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recommendations (such as deprescribing interventions) to prescribers.[17]

Community pharmacists not only may participate in the deprescribing process in collaboration with a prescriber but also may themselves be prescribers in certain situations, such as in jurisdictions where they can independently initiate or adapt therapy.[18] In Ontario, where this study is based, pharmacists can independently initiate medications for smoking cessation only as well as renew and adapt certain prescriptions.[18] Thus, it is expected that, in Ontario, pharmacists most commonly are not the primary prescriber of a particular therapy for a given patient, and as such, opportunities for involvement in deprescribing are likely to occur through collaboration with other prescribers, such as physicians.

Despite the potential for community pharmacists to contribute to deprescribing, they may experience many challenges, which calls into question how much they can meaningfully contribute to deprescribing. Similar to physicians, they are likely to face time constraints, limitations in their knowledge or skills pertaining to deprescribing and patient reluctance to accept deprescribing interventions.[12] Further, obtaining clinical information relevant to making a deprescribing decision may be difficult for community pharmacists in Ontario, who often work in isolation from other health care providers and do not currently have independent access to information such as laboratory test results. Finally, since community pharmacies derive revenue directly from dispensing prescriptions, some postulate that this presents a potential conflict of interest that may discourage some pharmacists from deprescribing.

Research objectives

This study explores how community pharmacists in Ontario are involved in the deprescribing process as well as the potential for enhancing the role of community pharmacists in deprescribing. The aim is to inform the design of interventions that could support community pharmacists' roles in deprescribing.

Methods

This study will use qualitative semistructured interviews with Ontario community pharmacists. A qualitative approach allows exploration of "how," "why" and "what" research questions that do not have numerical answers.[19]

Interpretive description (ID) is being used as a methodology for this study. Originating from nursing research, this approach aims to produce findings that are applicable to clinical practice and accessible to clinicians.[20,21] As such, its results are conceptual descriptions with little to no abstract theorizing.[22,23] ID finds thematic patterns within complex psychosocial situations that can be individualized to particular cases, which is how it can be generalizable beyond the study participants and how it will be used to address this study's pragmatically oriented objectives.[21]

Eligibility criteria

Pharmacists must have been practising for a minimum of 30 hours per week in a community pharmacy (ie, where most patients of the pharmacy are community-dwelling, in Ontario) for at least 1 year to be eligible. The pharmacy must provide dispensing services to patients so that pharmacists have access to deprescribing opportunities through this process.

Pharmacists working in hospital inpatient units, institutional dispensaries or long-term care facilities will be excluded. This is because these pharmacists have unique experiences compared with community pharmacists because of greater face-to-face contact with nurses and physicians, a potentially medically more complex patient population and the institutional setting of the patients.

Sampling and recruitment

Maximum variability sampling will be used to select pharmacists who vary with respect to important characteristics that may influence their approach to deprescribing.[24] This strategy allows for comparison of data across different contexts or participant characteristics to enhance understanding as well as increase transferability of the findings.[24,25] Maximum variability characteristics are pharmacist years of experience in community practice (self-reported as less than 5, or 5 or more), urban or rural location of the pharmacy based on postal code (rural addresses have a 0 as the second digit[26]) and position of the pharmacist as manager/owner or staff. Other potentially influencing characteristics (eg, where graduated, gender) will be noted to provide context during analysis.

Potential participants will be identified through snowball methods based on the research team's networks of pharmacist colleagues and social media. They will then be called or emailed

to elicit interest in the study and provided with a study information letter prior to obtaining verbal consent to participate.

Data collection

Semistructured interviews will be conducted by phone to remove location barriers. We expect the interviews to take between 40 and 60 minutes. All interviews will be audio-recorded and transcribed verbatim. The interviewer (C.K.) is a pharmacist with experience practising in an Ontario community pharmacy—this will be disclosed at the beginning of each interview. Reflection notes written during and after each interview will provide data on the context of the interview or any factors that may affect interpretation of the written transcripts.

Subjects explored in the interview guide (see the appendix, available in the online version of the article) will be informed by the Behavior Change Wheel (BCW), a theoretical framework from implementation science research.[27] ID methodology encourages the use of analytic frameworks such as the BCW to guide initial study design and conduct.[21,22] To this end, the interview questions encompass the causes of behaviour identified in the BCW: opportunity, motivation, and capability. These concepts are linked to targeted intervention strategies to facilitate behaviour change in the BCW and can therefore be used to guide application of findings into practice.

Four "test" interviews with community pharmacists were conducted to refine the interview guide for clarity and utility in addressing the research objectives. The interview guide will also be reviewed after each study interview for the same purpose.

Interviewing will cease once thematic saturation is achieved: when no new meaningful information is derived from subsequent interviews.[24,28,29] An estimated 15 to 20 participants will be required.[24] However, given the diversity in the sample, additional interviews may be conducted to reach thematic saturation, limited to a maximum of 25 by study resources. Future research can be used to expand on the findings of this study should thematic saturation not be reached.

Analysis

With the exception of sensitizing concepts from the BCW, coding will be mostly inductive (driven by the data) and done primarily by the interviewer, C.K.[30] Three other researchers (L.M., S.J.T.G., K.D.) will independently review 3 interview transcripts to refine the codebook and coding process. An audit trail of changes to the coding scheme will be kept by C.K. and reviewed by the research team as necessary. Coded transcripts will be analyzed using thematic analysis. This method is compatible with ID's goals of generating conceptual thematic patterns that can describe commonalities between participants and their contexts, while being sensitive to variations between them as individuals.[21,30]

A summary of the analysis of all the interviews will be sent to participants for feedback on how well the results reflect their personal perspectives.[25] Interpretations will be revisited in light of the feedback and incorporated into the final analysis.

Ethics approval for this study has been received from Women's College Hospital and University of Toronto Research Ethics Boards.

Project Status

Data collection and individual interview analysis have begun.

Methodological challenges and reflexivity

One challenge in qualitative research is how to account for researchers' assumptions and subjective opinions.[31] Self-reflexivity is a tool that researchers use to make their assumptions explicit and understand how they influence research.[31]

In our experience, an important reflexive observation is that certain members of the research team are pharmacists who can identify with participants professionally. As the study was being designed, C.K. wrote reflexively about viewing pharmacists optimistically as potential champions of deprescribing. To minimize the influence of this assumption on data production or interpretation, the original research question was neutrally worded as, "What are the perspectives of Ontario community pharmacists on deprescribing in their practices?"

However, upon critically analyzing the interview guide, it became apparent that certain assumptions persisted despite a neutrally worded research question. For example, one of the interview questions asked what the participants thought their roles as pharmacists are in stopping medications. This assumes that pharmacists do have a role (however large or small), whereas the research question avoided making this assumption. Building on this is the assumption that there is room for improvement in pharmacists'

practices to both increase and improve their participation in the deprescribing process. This assumption is inherent in the study design, given the choice of conceptual framework to inform the study, since the BCW is intended to help design practice-changing interventions.

Awareness of these assumptions through reflexivity helped design the current research questions. Reporting how researcher perspectives influence study design and conduct also improves transparency and credibility.[25,32] Rather than attempting to avoid assumptions altogether, awareness of the researcher's influence on the study can be used to improve the depth and credibility of the results.[32]

A limitation of this study, as discussed above, is that results will only apply to Ontario, which may be significant, as Ontario pharmacists have a limited scope of practice and little to no access to patient information.

Implications for practice

This study explores the involvement of Ontario community pharmacists in the deprescribing process, as well as the potential for enhancing this involvement.

Community pharmacists may be able to alleviate challenges faced by physicians and patients when trying to incorporate deprescribing into routine practice, such as a lack of time and reimbursement incentives. However, pharmacists may themselves face many challenges. Study results can be used in conjunction with the BCW to design interventions aimed at enhancing community pharmacists' roles in deprescribing. Connections between study results and the concepts in the BCW can guide the selection of interventions that will most successfully target the specific challenges faced by pharmacists with respect to deprescribing.

By exploring current patterns of practice and opportunities for improvement, findings from this study will inform how community pharmacists can potentially contribute to improving patient access to effective deprescribing services. The ultimate intention of this work is to facilitate community pharmacists' involvement in the deprescribing process to lead to improved health outcomes for patients. ■

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