Cost-of-living challenges highlight urgency for clinicians to prescribe affordable medications

Iris Gorfinkel MDCM Joel R. Lexchin MD CCFP(EM) FCFP

More than half of prescribers in the United States use real-time prescription benefit (RTPB) technology as an add-on to electronic health record (EHR) systems.[1] If such technology were adopted in Canada, it eventually may allow clinicians here to access patients' true drug costs easily at the point of prescribing and thereby reduce cost-related nonadherence.

High out-of-pocket costs are a major contributor to medication nonadherence and to consequent poor health outcomes and higher overall health care spending.[2] Data from Statistics Canada show that consumer inflation rose by 8.1% in June 2022 compared with 1 year prior.[3] Yet average hourly wages rose by only 5.2% over that period,[4] leaving many people with less money to spend on necessities such as prescription drugs. Moreover, 14% of Canadians lost prescription drug coverage while only 7% gained it during the first year of the pandemic, according to an Angus Reid Institute survey published in October 2020.[5]

In a drug affordability study based on a 2016 Canadian Community Health Survey component with 28,091 respondents, 8.2% of those who had received at least 1 prescription reported being unable to afford 1 or more prescribed drugs in the prior year.[2] The authors estimated cost-related drug nonadherence resulted in approximately 303,000 Canadians having additional doctor visits, 93,000 seeking care in emergency departments, and 26,000 having hospital admissions they would not have needed otherwise. The authors concluded that Canadians forwent basic needs such as food (approximately 730,000 people), heat (238,000), or other health care expenses (239,000) to be able to purchase prescribed medications.

Despite these concerning findings, clinicians lack information needed to discuss affordable alternatives accurately, resulting in costly drugs sometimes being prescribed when less expensive alternatives are available, which contributes to cost-related nonadherence.

Information gap

It is difficult for clinicians to know drug costs for individual patients because of insurance plan and drug pricing complexity. Prices for generic drugs on provincial and territorial formularies are governed by an agreement between the pan-Canadian Pharmaceutical Alliance and the Canadian Generic Pharmaceutical Association. Drug costs for Canadians with private plan coverage vary based on the existence of more than 100,000 individual plans.[6] At the federal level, the Patented Medicine Prices Review Board sets a maximum introductory price for new patented drugs and limits price increases to roughly the rate of inflation. Provinces and territories strike confidential price-listing deals with drug companies that typically yield discounts between 25% and 30%.[7]

This complexity helps explain the observation that while clinicians almost universally inquire about patients' drug allergies they often do not ask whether a prescribed drug is affordable, even though 20% of Canadians have inadequate or no drug coverage at all and must pay the full cost out of pocket.[6]

Physicians, nurse practitioners, and pharmacists are the final arbiters in deciding which medications are prescribed and dispensed. Yet, of the 3, only pharmacists can directly access the cost of a patient's medication, and even they are only partially aware of what patients ultimately pay because out-of-pocket costs are based on patients' specific drug plans, whether private or public.

Real-time prescription benefit technology has the potential to reduce the problem of cost-related nonadherence substantially. It integrates into EHR systems and with patients' specific private insurers, allowing clinicians to access and discuss the costs of patients' prescriptions, including individualized copayments. It also suggests lower-cost alternatives available if a patient cannot afford a drug. Real-time prescription benefit technology facilitates much-needed dialogue at the point of care to help clinicians ensure that their patients will be able to afford prescribed drugs. This technology has the added benefit of teaching clinicians to consider cost when prescribing.

A randomized trial involving nearly 900,000 patients in a large US urban academic health system found RTPB technology recommendations resulted in out-of-pocket reductions of 11.2% for general medications (95% CI -15.7 to 6.4) and 38.9% for high-cost drug classes (95% CI -47.6 to -28.7).[8] If we consider that almost two-thirds of Canadians 65 or older were prescribed 5 or more different drug classes in 2016[9] and apply the same reductions to Canadian data (keeping in mind that prices for brand-name drugs in the United States are more than 3 times those in Canada[10]), one might expect the savings due to RTPB technology to be quite substantial.

Implementing the link between EHR systems and the prices individual patients pay for medications does not guarantee cost-effective prescribing. Prescribing decisions are affected by many additional factors such as pharmaceutical company promotion of drugs; physician demographic characteristics; whether physicians are salaried, paid on a per capita basis, or bill fee for

service; and patient expectations, but raising awareness of cost-effectiveness is a critical step in the right direction.[11] Combining a patient's EHR with RTPB technology at the point of care to foster discussions about drug affordability has the potential to increase patients' well-being, to lessen the consequences of cost-related nonadherence, and to reduce the need for additional health care services, emergency department visits, and hospital stays.[6] The possible advent of a universal pharmacare plan in Canada, with accompanying public payment for most prescriptions, should further incentivize incorporating RTPB data into drug information systems to potentially lower the cost of such a plan.

Challenges

Integrating RTPB technology into EHR systems comes with challenges. First, in the United States, medical practices already have information about virtually every patient's health insurance plan because it is needed for payment. Having this information would facilitate the use of RTPB technology, since practices do not have to ask most patients for additional details about drug coverage. In Canada, because physician and hospital services are publicly insured, asking patients for information about insurance coverage is not routine. Therefore, medical practices here would not necessarily know whether patients have private or public drug coverage.

Second, it is unclear who would pay the upfront costs of purchasing software and ongoing maintenance costs. Clinicians may be hesitant to implement new technology and may feel overwhelmed in learning how to use it. Clinicians may also resist using it because of time constraints and could believe that discussions around drug affordability would add to their burden of care. Finally, there may be privacy considerations that would need to be taken into account in implementing RTPB technology.

Additional research is needed to address the degree to which RTPB technology could lead to patients saving on drug costs, the impact it may have on drug adherence, and how clinicians' end-user experiences with RTPB technology could be optimized with Canadians EHR systems. The overall impact of RTPB technology on cost savings also needs further investigation, as the aforementioned US study found alternative recommendations were provided for less than 5% of prescription medications.[8] Finally, we cannot be sure that any money saved through more cost-effective use of drugs would be reinvested in other health care needs.

Conclusion

Of per capita health care spending in Canada, the amount spent on drugs is second only to that spent on hospitals, according to 2021 data from the Canadian Institute for Health Information.[12] Clinicians need to be enabled to take on a far more proactive role in prescribing affordable drugs to Canadians and should no longer be viewed as passive bystanders in the complex process of ensuring that medications are accessible to patients.

Dr Iris Gorfinkel is a general practitioner and Principal Investigator and Founder of PrimeHealth Clinical Research in Toronto, Ont. **Dr Joel R. Lexchin** is a Fellow of the Canadian Academy of Health Sciences and Professor Emeritus in the School of Health Policy and Management at York University in Toronto.

Competing interests

Dr Iris Gorfinkel has participated in more than 60 clinical research trials funded by several major pharmaceutical companies and by the US National Institutes of Health. She has received funding from GSK and Bayer for educational programming. She has received payment for expert testimony for a sexual assault care service operated through Shaughnessy Hospital and later through BC Women's Hospital. Dr Gorfinkel has also received lecture fees from GSK, CME Outfitters, and Doctors Nova Scotia; holds stock in Johnson & Johnson and Merck; and was co-chair of a Shingrix (GSK) advisory board. She has contributed to the following in the forms of medical writing and presentations, some with pay: CBC Radio and Television, Zoomer Radio and Television, Global News, CTV News, Bored Panda, the *Globe and Mail*, the *Canadian Medical Association Journal*, and *Canadian Family Physician*. **Dr Joel R. Lexchin** received $3361 from the legal firm Koskie Minsky LLP between 2019 and 2022 for writing briefs on the role of promotion in generating prescriptions. He is a member of the Foundation Board of Health Action International and a board member of Canadian Doctors for Medicare. He receives royalties from the University of Toronto Press and from James Lorimer & Company Ltd for books he has written.

Correspondence

Dr Iris Gorfinkel; email **i.gor@outlook.com**

The opinions expressed in commentaries are those of the authors. Publication does not imply endorsement by the College of Family Physicians of Canada.

References

1. *More than half of U.S. prescribers use Surescripts real-time prescription benefit to address medication affordability and adherence* [media release]. Arlington, VA: Business Wire; 2022. Available from: **https://www.businesswire.com/news/home/20220614005026/en/More-than-Half-of-U.S.-Prescribers-Use-Surescripts-Real-Time-Prescription-Benefit-to-Address-Medication-Affordability-Adherence**. Accessed 2023 Aug 1.
2. Law MR, Cheng L, Kolhatkar A, Goldsmith LJ, Morgan SG, Holbrook AM, et al. The consequences of patient charges for prescription drugs in Canada: a cross-sectional survey. *CMAJ Open* 2018;6(1):E63-70.
3. *Consumer price index, June 2022*. Ottawa, ON: Statistics Canada; 2022. Available from: **https://www150.statcan.gc.ca/n1/daily-quotidien/220720/dq220720a-eng.htm**. Accessed 2023 Aug 1.
4. *Labour force survey, June 2022*. Ottawa, ON: Statistics Canada; 2022. Available from: **https://www150.statcan.gc.ca/n1/daily-quotidien/220708/dq220708a-eng.htm**. Accessed 2023 Aug 1.
5. *Access for all: near universal support for a pharmacare plan covering Canadians' prescription drug costs* [media release]. Vancouver, BC: Angus Reid Institute; 2020. Available from: **https://angusreid.org/pharmacare-2020/**. Accessed 2023 Aug 1.
6. Health Canada. *A prescription for Canada: achieving pharmacare for all. Final report of the Advisory Council on the Implementation of National Pharmacare*. Ottawa, ON: Government of Canada; 2019. Available from: **https://www.canada.ca/content/dam/hc-sc/images/corporate/about-health-canada/public-engagement/external-advisory-bodies/implementation-national-pharmacare/final-report/final-report.pdf**. Accessed 2023 Aug 1.
7. Office of Auditor General of Ontario. *2017 Annual report*. Toronto, ON: Queen's Printer for Ontario; 2017. Available from: **https://www.auditor.on.ca/en/content/annualreports/arbyyear/ar2017.html**. Accessed 2023 Aug 1.
8. Desai SM, Chen AZ, Wang J, Chung WY, Stadelman J, Mahoney C, et al. Effects of real-time prescription benefit recommendations on patient out-of-pocket costs: a cluster randomized clinical trial. *JAMA Intern Med* 2022;182(11):1129-37.
9. *Drug use among seniors in Canada, 2016*. Ottawa, ON: Canadian Institute for Health Information; 2018. Available from: **https://secure.cihi.ca/free_products/drug-use-among-seniors-2016-en-web.pdf**. Accessed 2023 Aug 15.
10. Patented Medicine Prices Review Board. *Annual report 2021*. Ottawa, ON: Government of Canada; 2022. Available from: **https://www.canada.ca/content/dam/pmprb-cepmb/documents/reports-and-studies/annual-report/2021/2021-Annual-Report-en.pdf**. Accessed 2023 Aug 1.
11. Allan GM, Lexchin J, Wiebe N. Physician awareness of drug cost: a systematic review. *PLoS Med* 2007;4(9):e283.
12. *Where is most of the money being spent in 2021?* [infographic]. Ottawa, ON: Canadian Institute for Health Information; 2021. Available from: **https://www.cihi.ca/en/where-is-most-of-the-money-being-spent-in-2021**. Accessed 2023 Aug 1.

This article has been peer reviewed.
Can Fam Physician 2023;69:599-600 (Eng), 606-8 (Fr).
DOI: 10.46747/cfp.6909599

Cet article se trouve aussi en français à la **page 606**.