# Impact of Language Barriers on Quality of Care and Patient Safety for Official Language Minority Francophones in Canada

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## Abstract

**Introduction:** The risks to patient safety and quality of care faced by members of linguistic minority groups have been welldocumented. However, little research has focused on the experience of official language minorities in Canada. **Methods:** This multiple method study (online and paper-based surveys combined with semi-structured individual interviews with patients and interpreters-health navigators) explored the experience of minority Francophones living in 4 Canadian provinces. **Results:** Patients and interpreters-navigators described experiences where language barriers contributed to poorer patient assessment, misdiagnosis and/or delayed treatment, incomplete understanding of patient condition and prescribed treatment, and impaired confidence in services received. Reliance on Google Translate and ad hoc, untrained interpreters are commonly reported, in spite of evidence highlighting the risks associated with such practice. **Conclusion:** Increased awareness that the risks of language barriers apply to official language minorities is essential.

#### **Keywords**

language barriers, quality of care, patient safety, patient satisfaction, linguistic minority

## Introduction

Concern over patient safety and quality of care in the Canadian health field has grown over the past decade. In 2014 to 2015, 1 in 18 Canadian patients experienced harm in hospital (1); less is known about patient safety in primary care (2). It has been demonstrated that, for patients from culturally and linguistically diverse backgrounds, language barriers contribute to poorer quality of care and patient safety (3–6). A recent review of international evidence related to language access in health care based on Accreditation Canada's dimensions of care highlighted the importance of addressing language barriers if quality and safety of care is to be achieved (7).

Quality of care can be defined as the degree to which health services for individuals and populations increase the likelihood of desired health outcomes consistent with current professional knowledge (8). In the language barrier literature, quality often focuses on differences in care (appropriateness, continuity, patient-centered services, safety) between those who are proficient in the dominant language (usually English) and those who are not (7). Language concordance between patient and provider is essential for effective communication to ensure accurate patient assessment, appropriate examinations, ancillary testing, diagnosis, and prescribed treatment (9-11). Language barriers also impact chronic disease management such as for asthma and diabetes (3,12-14), as well as end-of-life care (15) and pain management (16). Increased risk of failure to obtain informed consent (17,18) and protect patient privacy and confidentiality (19,20) when language barriers are present are also reported. Hence, language barriers have a great impact on quality of care throughout the health-care continuum.

Patient safety refers to the reduction and mitigation of unsafe acts and increased use of best practices leading to optimal patient outcome (8). Common out-of-hospital safety risks reported among patients with low English-language proficiency (LEP) are medication errors (21,22),

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readmissions for the same health problem (23–25), and prolonged hospital length of stay (26,27). Communication has been identified as the root cause of 59% of serious adverse events reported to the US Joint Commission's Sentinel Event Database (28). Sufficient evidence demonstrates that LEP patients are more likely than Englishspeaking patients to experience safety events because of communication errors (29–31).

Overcoming language barriers in health-care encounters may be a challenge. In countries with culturally and linguistically diverse populations, use of a second language by either the patient or the practitioner is common (32–34). When provision of care in one's preferred official language is not possible, trained interpreter services are a good alternative (35–37). However, use of untrained, ad hoc interpreters, common in Canada, has been identified as posing risks to both patient and provider, as this practice may provide the illusion that adequate communication is occurring (19,20,38,39). Appropriate screening and training of interpreters are essential to achieve best practice standards in interpretation (40).

In spite of consistent international evidence of the risks of language barriers to quality of care and patient safety, little research has explored the experience of Canadian official language minorities. English and French are both recognized as official languages in the Canadian Constitution (41); however, use of English is predominant in all provinces and territories except Quebec. The official minority language (OML) speakers in these regions are Francophones; they represent 3.8% of the population, although this percentage reaches 32% in 1 province (New Brunswick); it is consistently lower in other provinces and territories (42). Studies have shown that minority Francophones are at greater risk of poor health (43) and have poorer access to health care (43–45).

Provision of language access services (LASs), including service by bilingual providers, trained interpretation services, signage, and translated health information, is increasingly being recognized by health systems as essential both for providing appropriate care for vulnerable populations (46) and for managing organizational risk (47). Some regional health authorities in Canada, such as the Winnipeg Regional Health Authority (48) and the Toronto Central Local Health Integration Network (49), have interpreter policies and service standards; however, particularly in less urbanized areas, reliance on community-based interpreting services such as l'Accueil francophone de Thunder Bay (50) and volunteer-based organizations such as Canadian Volunteers United in Action in Alberta (51) is more common.

Recruitment, training, and retention of professionals fluent in French have also been promoted as the primary strategy to increase provision of French language services (FLSs) (52,53). Shortage of bilingual health professionals (44,53), however, results in inconsistency or unavailability of language concordant services. To facilitate access to FLSs, providers are encouraged to practice active offer (54). This includes asking patients in what language services should be provided, documenting in French, wearing bilingual name tags, offering bilingual health-related telephone services, and advertising availability of FLSs.

There is little in the published literature on the impact of language barriers among OML patients in Canada, even though the experience of migrants to Canada has been well explored (45,55). The purpose of this study was to provide a more comprehensive picture of the impact of language barriers for members of low-density OML Francophone populations. We aimed to describe challenges these Francophones experience when accessing and using healthcare services, focusing on their perspectives and experience with quality and safety of care. We also explored the perspectives of community-based interpreters involved in health care encounters between Francophone patients and Anglophone providers, as these interpreter-health navigators are the main source of interpretation support for low-density OML Francophone populations.

## Methods

This multiple method study surveyed OML Francophones living in 4 Canadian provinces: Newfoundland and Labrador, Saskatchewan, Alberta, and 2 sites in Ontario (North Simcoe/ Muskoka and Thunder Bay). An online or paper-based 21question survey, using both closed and open-ended questions, focused on personal experiences with health care and LASs. For example, participants were asked to rate access to social and health services in French in their community and the health system's awareness of Francophones' needs and difficulties related to such services using a 5-point Likert scale. Respondents were also invited to select from a list what LASs were available to them, actions taken to access FLSs, and barriers commonly encountered preventing this access. Finally, participants were asked to describe circumstances where they believed FLSs were essential, how often they were needed, and for what reasons. Université de Saint-Boniface Research Ethics Board approval (ETH-2015-19 octobre) was received, as well as participants' written informed consent. A subset of survey respondents (N = 20) accepted an invitation to participate in a semi-structured telephone interview focusing on patient experience (their own or of a family member or friend) in accessing and using health-care services, including perceived impact of language barriers on quality of care. These participants provided verbal informed consent for this additional activity.

Community interpreter-health navigators from the same provinces were interviewed regarding provider awareness of language barriers and associated risks. These communitybased employees or volunteers provide interpreter services and assist vulnerable patients in overcoming barriers within the health system to improve access to appropriate services in a timely fashion. Convenience sampling was used: Société Santé en français Network coordinators or community partners provided a list of 6 interpreter-health navigators, of whom 5 agreed to participate in a semi-structured in-person or telephone interview focusing on OML Francophone patients' access to FLSs and their experience as interpreter-health navigators. Université

Table I	<ol> <li>Demographics</li> </ol>	of Survey	Participants	by Province.
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Characteristics <sup>a</sup>	Newfoundland and Labrador, N = 16 (5.3%)	Ontario, <sup>b</sup> N = 24, (8%)	Saskatchewan, N = 108 (36.4%)	Alberta, N = 53 (17.8%)	Total, N = 297 (100%)
Female	12 (75)	23 (95.8)	78 (75)	38 (71.7)	194 (78.9)
Married or common-law	8 (50)	19 (79.2)	79 (75.2)	40 (75.5)	181 (73)
Education					
Elementary or secondary school	0 (0)	I (4.2)	8 (7.6)	7 (13.7)	17 (6.9)
College	7 (43.8)	6 (25)	23 (21.9)	18 (35.3)	74 (30.1)
University	9 (56.3)	17 (70.8)	74 (70.5)	26 (51)	155 (63)
Income	( )	( )		( )	
Less than Can\$25 000	2 (13.3)	I (4.2)	14 (13.8)	11 (21.6)	34 (14.2)
Can\$25 000 to Can\$49 000	6 (40)	10 (41.7)	28 (27.7)	11 (21.6)	69 (29)
Can\$50 000 or more	7 (46.7)	13 (54.2)	58 (57.4)	28 (54.9)	133 (55.9)
Origin					· · · ·
Born in Canada	14 (87.5)	18 (75)	66 (62.3)	35 (66)	169 (68.4)
In Canada less than 5 years	l (6.2)	3 (12.5)	13 (12.3)	8 (15.1)	29 (II.7)
In Canada more than 5 years	l (6.2)	3 (12.5)	27 (25.5)	10 (18.9)	48 (I9.4)
Language most often used in the hou	usehold		. ,	. ,	. ,
French	10 (66.7)	21 (87.5)	80 (79.2)	40 (78.4)	188 (78)
English	l (6.7)	0 (0)	3 (3)	I (2)	8 (3.3)
French and English	4 (26.7)	3 (12.5)	18 (17.8)	10 (19.6)	45 (18.7)
English proficiency during a medical	consultation		. ,	. ,	. ,
Very good—excellent	7 (43.8)	(47.8)	59 (56.2)	33 (62.3)	139 (56)
Good	6 (37.5)	7 (30.4)	30 (28.6)	13 (24.5)	68 (27.4)
Weak	3 (18.8)	5 (21.7)	l6 (l5.2)	7 (13.2)	41 (16.5)

<sup>a</sup>No statistically significant differences are observed between provinces.

<sup>b</sup>Data collection in Ontario was limited to North Simcoe Muskoka and Thunder Bay areas.

de Saint-Boniface Research Ethics Board approval (ETH-2015-19 octobre) was received; permission to participate during work time was obtained from employers or supervisors. Participants provided verbal informed consent before participating.

Interviews, all conducted in French, were audio recorded and partially transcribed, focusing only on segments relevant to categories or themes emerging from inductive analysis. Qualitative analysis was conducted using a general inductive approach (56,57). Codes were identified and combined into categories and themes using NVivo v.10 (QRS International, Burlington MA, 2012). Triangulation of sources (surveys, interviews with Francophones and with interpreter-health navigators) helped ensure data quality and validity (57). Quantitative survey data were analyzed using 2-sided significance testing to compare for the  $\chi^2$  test and Kruskal-Wallis test with post hoc Mann-Whitney U tests using SPSS v.21 (IBM Corporation, Markham, ON, Canada).

## Results

### Participant Demographics

A total of 297 OML Francophones participated in the survey. As illustrated in Table 1, a larger proportion of participants were female (78.9%), married or in common-law relationships (73.0%), of higher than average income (personal annual income of Can50 000 or more; 55.9%), university educated (63.0%), born in Canada (68.4%), and identified French as language most

often used at home (78.0%). Approximately half the participants felt they could communicate well in English during a medical consultation, whereas 16.5% reported LEP (defined here as those with self-assessed poor fluency of conversational English during a medical consultation). A larger proportion of participants reported Saskatchewan residence (36.4%), although 32.3% of participants did not specify province of residence. No statistical differences in participant demographics were noted between provinces; however, participants with LEP were more likely to be of lower income or born outside of Canada.

The OML Francophones interviewed were more often female (65%), married or in common-law relationships (60.0%), with university-level education (70.0%), and a personal annual income of Can50000 or more (45.0%). Two-thirds (63.2%) were born in Canada; 85% reported French as language most often used at home, and 42.1% reported LEP during a medical consultation. One participant was also a nurse and therefore shared some of her patients' experiences; this, however, was an exception.

Of the 5 interpreter-health navigators interviewed, 4 were women and 3 were Canada-born. One worked full-time and 1 part-time; 3 were volunteers. All worked for urban community-based organizations.

# Patient Experience With Language Barriers

Most of the OML Francophones interviewed shared experiences where they believed language barriers had contributed to poorer quality of care and increased risk of adverse events for themselves, family members, or friends. Many gave examples of situations where LEP contributed to prolonged and/or inadequate health assessment, misdiagnosis, delayed treatment, and/or poor understanding of diagnosis or treatment. Some perceived inequity in quality of care received; others reported increased stress. Examples illustrating these concerns are provided below.

Poor patient assessment, misdiagnosis, and delayed treatment. Many health-care users recognized that because of language barriers, providers had greater difficulty making a diagnosis. As observed by one LEP participant, "My family physician does not speak French, he is very nice but he has more difficulty understanding my needs" (P14).

A few examples of misdiagnosis were described. One participant shared her colleague's experience:

His mother had bad odours coming from her lower body, but because she had problems expressing herself in English, the doctor diagnosed it as an infection. When she passed away shortly after, they found she had cancer of the uterus, which had remained untreated (P12).

Another Francophone interviewee, also an urgent care nurse, recalled an incident in her workplace:

A Francophone patient was describing her symptoms: she was suffering from cardiac arrest with pulmonary emboli, but what the staff understood was abdominal pain. After eight hours, she was transferred to intensive care. She almost died (P19).

Most patients described delays in treatment because of language barriers. Several reported having to repeat their concerns, struggling to find the correct terms, or having the provider repeat questions, thus prolonging the assessment process. As stated by one participant, "If I could make them understand what I felt, they could have reacted more quickly" (P3). Other patients reported repeat consultations for the same medical problem because of LEP, such as this interviewee: "Had they had an interpreter, they would have quickly seen the gravity of the situation. She [Francophone patient] had to come back the next day so that other staff could reevaluate and understand her condition" (P11).

Delayed patient-initiated contact in requesting care was also reported: "If services were in my language, I wouldn't hesitate to [consult various providers]" (P15), says a participant with LEP. One participant described delaying seeking assistance for her 2 children with learning disabilities; their previous records were in French and she felt unable to consult without language assistance.

**Poor understanding of diagnosis or treatment.** Examples of poor understanding of diagnosis were also described during both health-care user and interpreter-health navigator interviews. For example, one patient understood that her condition was

much more serious than the actual diagnosis. The interpreter who accompanied her in a subsequent appointment was able to rectify the patient's understanding of her diagnosis and reduce her anxiety.

Poor understanding of prescribed treatment also contributed to patient confusion, resulting in failure to follow treatment instructions. As one participant with LEP explained: "The dermatologist had given me a medication that I was to apply in one spot, but I hadn't understood, I administered the medication the wrong way" (P10).

Low confidence in health-care encounter. Examples provided by health-care users illustrate that language barriers also have an emotional impact on patients. Some describe lack of confidence that appropriate care was received or a sense of inequity in care, while others felt increased stress.

A few health-care users reported lack of confidence in receiving quality care because of unaddressed language barriers: "With health, it's frustrating because we are not sure of understanding instructions, and therefore we are not satisfied" (P10). Some participants said they felt like "second-class citizens" (P3) or disadvantaged: "If we only know French, we are limited" (P10). Another LEP patient described discomfort when a provider became impatient with the language barrier, while another was reluctant to ask her family physician to repeat instructions: "You pretend to understand, when, really, you don't" (P10). Another patient commented on the impact of language barriers on building a trusting relationship with the caregiver:

It's hard to explain something, especially emotional, if it isn't in your language and you don't have the correct vocabulary... When I need to confide in someone or relate my pain, I need an attentive ear and the assurance and confidence that the doctor will understand, and will make sure I understand what I need to do (P19).

Several participants described additional stress related to the inability to adequately describe symptoms or understand treatment. For example, an LEP participant suffering from asthma described how language barriers increased her anxiety level and may have contributed to the urgency of receiving care. Stress caused by language barriers may have long-term effects, as reported by this participant describing the experience of an LEP friend: "... his level of stress is such that he refuses to go to the hospital [...], he hesitates to put himself in a situation where he won't be able to express his needs" (P20).

# Awareness of Risks of Language Barriers

Interviews with health-care users, especially those with LEP, demonstrated awareness of risks of language barriers in the patient-provider interaction: "I can't function 100% in English. If I'm hurting somewhere and I can't describe my pain in English, it will be difficult for the doctor" (P13). Interpreter-health navigators also observed that patients were aware of such risks: "When it comes down to health

concerns, they (patients) realize it doesn't take much to change a diagnosis or treatment. It is easy to make a mistake" (I4). Some patients observed that their language barrier became more prominent in stressful situations, such as those concerning urgent health issues, or when under the influence of medication or in pain. To one patient's surprise, awareness of language barriers only occurred during her recent hospitalization: "I had to live it to understand it. I had never realized that I couldn't speak English when in pain. I'm perfectly bilingual, but when I'm in pain, I'm not" (P3). Language barriers were identified as preventing accurate description of symptoms and contributing to additional diagnostic testing and medication errors: "By explaining better, the doctor understands what the real problem is and doesn't need to have this test or that test done" (P18), said one LEP participant. Another commented: "Sometimes, we will receive medication that is not appropriate for the health problem, and therefore we will not get better. It could even be dangerous" (P9).

## Experience With Health System Response

The majority of survey participants (84%) felt that the health system recognized poorly, if at all, the needs of minority Francophones, their challenges with language barriers, and the need for LASs. A shortage of bilingual staff, low patient awareness of services available in French, and negative attitudes toward minority Francophones (reported by 66.7%, 53.5%, and 26.6% of survey participants, respectively) were identified as barriers to accessing care in the minority language. Statistically significant differences were noted between provinces: access to bilingual family physicians is lower for Newfoundland participants (31.2%) than in Alberta or Ontario (67%). Ontario survey respondents reported longer travelling distances (58.3%) and lesser quality of services (16.7%) compared to the average national response (28.6%)and 10.4%, respectively). Participants with LEP identified limited availability of interpreter services (70.7%): only 17.8% had used such services. Several health-care users who were aware of interpreter services reported limited availability: "Don't be sick in the afternoon or the evening, because the interpreter service is only available mornings" (P20). Few interviewees had used telephone interpreter services: those who had commented on prolonged wait periods to access service and poor quality of interpretation.

Although some health services were available in French, health-care users reported they were limited. Several participants had encountered only 1 bilingual provider among the many consulted. In other cases, bilingual forms were available, but associated phone services were only available in English. Awareness of bilingual service availability by both providers and service users was described as limited, as bilingual staff identification and an active offer of services in both official languages were not apparent.

Some health-care users felt that health systems did not anticipate language barrier issues. Calling on allegedly bilingual staff or family to provide ad hoc interpretation appeared to be common practice: "The hospital did not have an interpreter. A nurse who had taken some French courses did the interpretation" (P11). A few patients were informed that for future appointments, they should be accompanied by someone able to interpret. One participant, commenting on being unable to cover the cost of professional interpretation, questioned why such services were provided for immigrants through Immigration Canada but not for official language minorities.

## Patient Actions to Cope With Language Barriers

When confronted with language barriers, 51.5% of all survey respondents reported doing the best they could without linguistic assistance; this percentage increased to 68.3% for LEP participants. Furthermore, 20% of all participants reported not seeking health services when these were not available in French for fear of not understanding or being understood. Few (3%) requested formal interpretation services. Among LEP respondents, 58.5% reported asking family members or friends to accompany them for interpretation purposes. A considerable proportion of low-income participants (41.7%) also relied on family members for assistance. It should be noted, however, that several interviewees commented on challenges associated with availability and confidentiality issues when using these ad hoc interpreters.

Many health-care users reported undertaking prior preparation, such as consulting the dictionary, Internet sites, or Google Translate, to gain knowledge about their condition, possible treatment, and correct terminology. Although considered helpful in communicating more efficiently, patients observed that this approach was not always feasible, especially during emergencies or hospitalization. As one LEP participant observed: "When I am hospitalized, I do not always have access to my computer; I need an interpreter, I need to explain now" (P18). Use of Google Translate was also not considered adequate for consultations about mental health issues. One patient with an Anglophone psychologist explained: "I'd write in French on Google Translate, and the psychologist would read the translation" (P4). The patient, seeking a healing intervention, instead experienced frustration and discontent.

Some patients preferred accessing services in French elsewhere in Canada. One participant accessed diagnostic testing in French in Quebec for her autistic child; traveling costs and salary loss incurred were not reimbursed. Others relied on previously consulted bilingual providers in Quebec or France for prescriptions when services were not available in French in their own province.

## Discussion

Findings of this study are consistent with international research on other minority language populations, demonstrating that language barriers contribute to poorer quality of care and patient safety (3–6). This study, one of the first to

explore the impact of official language minority populations in Canada, indicates that Francophones living outside Quebec face similar barriers and report issues with patient assessment, misdiagnosis and/or delayed treatment, and limited patient understanding of their health condition or prescribed treatment. It should be of concern to providers that even those who felt they could normally communicate in English reported losing this ability in situations of stress, intense pain, or while under influence of medication.

Participants dealing with language barriers also described increased stress and decreased confidence that care received was appropriate. Consistent with the findings of Ngwakongnwi et al. (2012), Francophone patients often felt disadvantaged as compared to the majority population. They were less likely to experience patient-centered care, as language barriers were not addressed and LASs were limited. The literature indicates that minority Anglophones living in Quebec face similar experiences with respect to language barriers and access to care in their language (43,58).

Continued negative attitudes toward providing LASs for minority Francophones were also reported, possibly because these patients are perceived as "difficult" or "demanding" and do not conform to providers' expectations; this may have a detrimental effect on communication (59) and treatment the patient receives (60). As a result, many did not experience equity in health-care services or believed that services in both official languages were not a priority for the health system. Increasing health-care professional awareness of the impact of language barriers for official language speakers and promoting the practice of active offer of services in both official languages are essential.

Use of Google Translate to address language barriers not only appeared of limited benefit in emergencies or to address emotional distress, but inadequate for meaningful medical encounters. While readily accessible and potentially useful in limited situations, recent research demonstrates that it is not a substitute for either bilingual care or trained interpreter services (61,62). Francophone patients rarely reported using formal interpreter services, possibly because of low awareness of available services, but more likely because they were aware of the limited availability and lack of support in hospitals for providing such services. Instructing (or expecting) patients to bring their own interpreter places responsibility and costs for safe care on vulnerable and ill individuals rather than on the health system. This has important legal and ethical implications: such practice means that health organizations (probably unintentionally) are promoting a practice proven to be unsafe (20,38,39). In order to achieve safe quality care, trained health interpreter services should be provided when direct service in French is not available.

This research has a number of limitations. Survey sample size was small and participant selection was nonrandom and nonstratified, with greater representation from certain provinces. Reliance on language advocates as recruitment agents may have also introduced bias, as those most committed to LASs would be more likely to respond. However, differences between provinces were minor, suggesting that findings may be generalized to minority Francophones across Canada. The small number of individuals in interpreter-health navigator roles and their isolation required convenience sampling: Assistance from Société Santé en français was used to identify participants. This preliminary exploration was a first attempt to document their experience and perspectives.

Raising awareness of the need for, and promoting, LASs is essential at the organizational level (63). New health standards, to be developed by the Canadian Health Standards Organization, may assist health-care organizations who serve official language minority populations in evaluating, at the organizational level (planning, data collection, staff training, policies and procedures, resource allocations), quality of services which have been linguistically adapted (64).

Avenues for investigation include further exploration of language barrier issues for both OML populations in Canada; for example, readmission rates and hospital length of stay may be of interest. Collection of language variables in medical records (as has recently been implemented in Prince Edward Island (65) and as a pilot study in Ontario) (66), will enable comparison of quality and safety indicators between official language minorities and dominant language speakers. In addition, evaluation of the feasibility and effectiveness of formal interpreter services is needed.

## Conclusion

Effective communication between health-care provider, patient, and families is critical for provision of safe highquality care. Language barriers, and their associated risks, are also experienced by OML speakers in Canada. Health-care organizations should be supported, at all levels, in their efforts to increase awareness of the impact of language barriers and developing and implementing practical strategies to reduce them. Only then can we ensure equity in quality of care and patient safety for official language minority populations.

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