Assessing the evolution of primary healthcare organizations and their performance (2005-2010) in two regions of Quebec province: Montréal and Montérégie



## HIGHLIGHTS FROM THE DESCRIPTIVE REPORT OF THE ORGANIZATIONAL SURVEY IN THE MONTRÉAL REGION

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In 2005, the Population Health and Health Services team, a joint team from Direction de santé publique de l'Agence de la santé et des services sociaux de Montréal and Institut national de santé publique du Québec, conducted a study in the two most populated regions of Québec (Montréal and Montérégie). The goal of the study was to evaluate the association between primary care organizational models used at that time and the population's care experiences. A second study was undertaken in 2010 to understand the evolution of primary care organizational models and their performance during the healthcare reform process, and to evaluate associated organizational and contextual factors.

The study consisted of three interrelated and hierarchically nested surveys:

- A population survey of adults randomly selected among the population of both regions to assess patient affiliation with primary care organizations, use of services, various attributes of patient care experience, preventive care received, and perception of unmet needs.
- A survey of primary care organizations to evaluate aspects related to organizational vision and structure, resources and clinical practice characteristics, as well as primary care service reorganization.
- A third survey of key informants from Health and Social Services Centres to assess the organizational contexts within which the different organizational models evolve.

### Introduction

In the early 2000s, two major reforms were undertaken in Québec. The goal for the first reform was to implement Family Medicine Groups (FMG). For the second, the objective was to create Health and Social Services Centres (CSSS), whose main responsibility was to develop Local Services Networks (RLS). In some regions, particularly in Montréal, the creation of FMG gave rise to an initiative to implement Network Clinics (NC) that would complement FMG. These new organizational models compelled CSSS to provide developmental support.

This summary report aims to describe the reform-related changes observed between 2005 and 2010 in primary care organizations in Montréal. Findings are reported first on changes in number of medical clinics\* between 2005 to 2010, and then on an analysis of the modifications in clinic characteristics over this period. The findings are presented for the region as a whole and for each CSSS territory in the region.

To measure organizational change, we calculated an index of conformity to an ideal type (ICIT). The ideal type was constructed based on the literature concerning the most

promising medical clinic models. We chose 26 indicators distributed according to the dimensions "vision", "resources", "structure" and "practices". The table on the next page presents the four dimensions that were used to construct the ICIT, along with their definitions and number of variables included. The higher the ICIT score (maximum: 100), the closer a medical clinic is to the ideal type. We set at 2.0 the value for significant differences between ICIT scores for 2005 and 2010. Between +2.0 and -2.0, the situation is considered stable. Data findings for this second part were weighted to take into account clinic size, measured by the number of full time equivalent physicians in the clinic. Data weighting allows for more accurate picture of services offered in CSSS territories.

Other methodological details can be found in a methodological report (Prud'homme et al., 2012). Detailed results are presented in a descriptive report, which is available on the Web sites of Direction de santé publique de l'Agence de la santé et des services sociaux de Montréal and of Institut national de santé publique du Québec (addresses at the end of the document).

<sup>\*</sup> In this summary, the term "medical clinic" is used instead of "primary care organization".

# Changes in number of medical clinics from 2005 to 2010

- The number of primary care clinics went down by 49 between 2005 and 2010, going from 434 to 385.
- The CSSS territories most affected by the losses are de la Montagne (-8), du Coeur-de-l'Île (-8) and de Bordeaux– Cartierville–Saint-Laurent (-7), even when new clinics are taken into account.
- The main reasons for clinic closures are, in order, retirement, death of physicians or giving up the practice (59.6%) and merges with other medical clinics (34.8%).

- Most clinics that closed were solo practices (79.8%) or, to a lesser degree, group clinics (not FMG, not NC) (19.1%).
- We noted that between 2005 and 2010, there was a relatively significant increase in FMG-type clinics (from 3.5% to 8.1%), NC (0% to 4.9%) and FMG-NC (0% to 3.6%); consequently, there was a relative decrease in the other types of clinics.
- FMG and NC implementation was unequal in the region.
   For example, FMG, NC and FMG-NC clinics account for only 4.3% of clinics in CSSS du Coeur-de-l'Île, but for 34.7% in de Bordeaux–Cartierville–Saint-Laurent. In 2010, for the region as a whole, these clinics made up 16.6% of all clinics.

Dimension	Definition	Number of variables
Vision	Goals, values and orientations shared by clinic members	4
Resources	Quantity and type of resources available in the clinic	7
Structure	Rules of governance, agreements and procedures that guide clinic activities	6
Practices	Administrative and professional procedures put in place to support clinical practices	9

## Dimensions of the index of conformity to an ideal type (ICIT)

## Analysis of changes in organizational characteristics of clinics between 2005 and 2010

- Nine of the CSSS territories in the region saw their overall ICIT scores go up between 2005 and 2010. The strongest increase was for CSSS Cavendish (+10.7). ICIT scores remained stable in the three other CSSS territories. We also note a wide variation in ICIT scores for 2010 among CSSS territories; they range from 65.7 for CSSS du Sud-Ouest-Verdun to 48.6 for CSSS de Dorval–Lachine–LaSalle (Figure presented on the next page).
- For the region, we note that the increase in ICIT scores between 2005 and 2010 is related mostly to structures (+9.0) and resources (+5.2). Moreover, ICIT scores for the dimensions "vision" and "practices" remained relatively stable.
- The most significant changes are related to the dimension "structure". We note increase in ICIT scores for ten CSSS territories. The strongest increases were for CSSS d'Ahuntsic et Montréal-Nord (+17.5) and Cavendish (+14.3). Scores remained stable for CSSS de Dorval–Lachine–LaSalle and de la Montagne. In 2010, ICIT scores for this dimension varied significantly among CSSS territories, ranging from 32.7 for CSSS de Dorval–LaSalle to 62.0 for CSSS du Sud-Ouest-Verdun.
- For the "resources" dimension, we also note increases for nine CSSS territories and stable scores for three others between 2005 and 2010, although these increases are lower than for "structure". CSSS Cavendish showed the most significant rise in ICIT score (+16.2). In 2010, ICIT scores for this dimension varied significantly among CSSS territories, ranging from 66.2 for CSSS de Bordeaux– Cartierville–Saint-Laurent to 47.6 for CSSS d'Ahuntsic et Montréal-Nord.

- ICIT scores for the "practices" dimension rose more modestly and involved only six CSSS territories. The most significant increases were for CSSS Cavendish (+9.3) and du Sud-Ouest-Verdun (+7.2); CSSS de la Pointe-de-l'Île showed the most significant decrease (- 6.9) among the three CSSS territories for which scores dropped. Three CSSS territories remained stable. In 2010, ICIT scores for this dimension varied significantly among CSSS, ranging from 67.0 for Sud-Ouest-Verdun to 47.7 for Coeur-de-l'Île.
- Of the four dimensions, "vision" is the one for which changes among CSSS territories diverged the most. Indeed, we observe higher ICIT scores for three CSSS territories, lower scores for four others and stable scores for the other five. The greatest increase was for CSSS du Sud-Ouest-Verdun (+5.1). We should recall that this CSSS territory also registered a significant increase in ICIT score for the other dimensions, especially for "structure" and "practices". For 2010, we note a wide variability in ICIT scores among CSSS territories for the dimension "vision", with highest score for CSSS du Sud-Ouest-Verdun (70.7) and the lowest for CSSS de la Pointe-de-l'Île (56.7).



Average global score of conformity to ideal type of primary care medical clinics (on 100), by CSSS territory, Montréal, 2010 (weighted data)

## Conclusion

- In the region, we observe a decline in the number of primary care medical clinics between 2005 and 2010; this decrease, mostly due to small (mostly solo) clinics closures, was compensated by merges and the spread of larger clinics, and especially by the marked increase in FMG, NC and FMG-NC.
- There was also significant improvement in the index of conformity to organizational ideal type (ICIT) between 2005 and 2010.
- This improvement is due mostly to the implementation of FMG and NC in existing clinics.
- Given the nature of these changes, we find that ICIT scores for the dimensions "structure" and "resources" are the ones that changed the most.
- The same pattern is observed for CSSS territories in the region, but with greater variability. For instance, CSSS Cavendish reports a significant increase in overall ICIT score (+10.7), due mostly to the dimensions "resources" (+16.2) and "structure" (+14.3). This change can largely be explained by numerous medical resources moving from the de la Montagne to the Cavendish CSSS territory. Moreover, CSSS du Sud-Ouest-Verdun and de Bordeaux–Cartierville–Saint-Laurent, which had high ICIT scores in 2005, registered the highest increases between 2005 and 2010.
- To conclude, major disparities can be observed in 2010 among CSSS territories in the region. This marked variability reflects the territories broad diversity in this urban region, and is an indication of its distinct character.

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#### Funding organizations and partners

This study was funded by Canadian Institutes of Health Research (CIHR) and Fonds de la recherche du Québec – Santé (FRQS) along with ministère de la Santé et des Services sociaux du Québec. It also receives financial support from the Agences de la santé et des services sociaux (ASSS) de Montréal and Montérégie, and from the Institut national de santé publique du Québec (INSPQ). The Fédération des médecins omnipraticiens du Québec and the Collège des médecins du Québec have given their support to the project.

The project has received ethical approval from the research ethics committee of the Agence de la santé et des services sociaux de Montréal, the main committee. The multicentre nature of the research project requires ethical approval from research ethics committees in each health and social services centre in the territories under study.

This document is available on the Web sites of the Direction de santé publique (<u>www.dsp.santemontreal.qc.ca/dossiers\_thematiques/</u> <u>services\_preventifs/thematique/sante\_des\_populations\_et\_services\_de\_s\_</u> <u>ante/documentation.html</u>) and the INSPQ (<u>www.inspq.qc.ca/publications/</u>).

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