

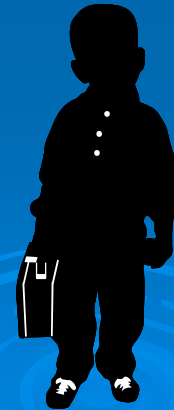
Québec Longitudinal Study of Child Development (QLSCD)

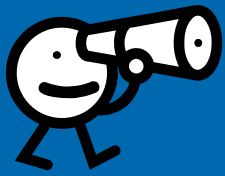


Continuing to Look Forward After 10 Years of Data
Collection!



Bertrand Perron (Ph.D.)
QLSCD Coordinator
Delphine Provençal (M. sc.)
Research agent
Direction Santé Québec
Institut de la statistique du Québec
(ISQ)





QLSCD: Who Makes this Study Possible?

Project management: Direction Santé Québec (DSQ) of ISQ

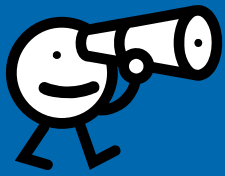
• Financial partners:

- MSSS (Qc Health ministry)
- MFE/MFACF (Qc min. of Family)
- ISQ
- GRIP - Research unit on children's psychosocial maladjustment
- Fondation Lucie et André Chagnon (FLAC)
- Québec en forme (QEF)

• Researchers:

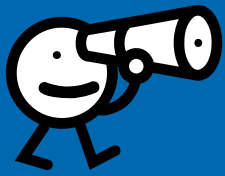
- U. of Montréal
- McGill U.
- U. Laval
- UQAM
- U. of Ottawa
- ISQ
- INSPQ (Qc Public Health inst.)
- UQTR
- MFE/MFACF

- Data collection: Bureau d'intervieweurs professionnels (BIP), DSQ, GRIP, Québec en forme
- Technical and administrative support: MELS (Qc min. of Education), Québec Medicare (RAMQ)

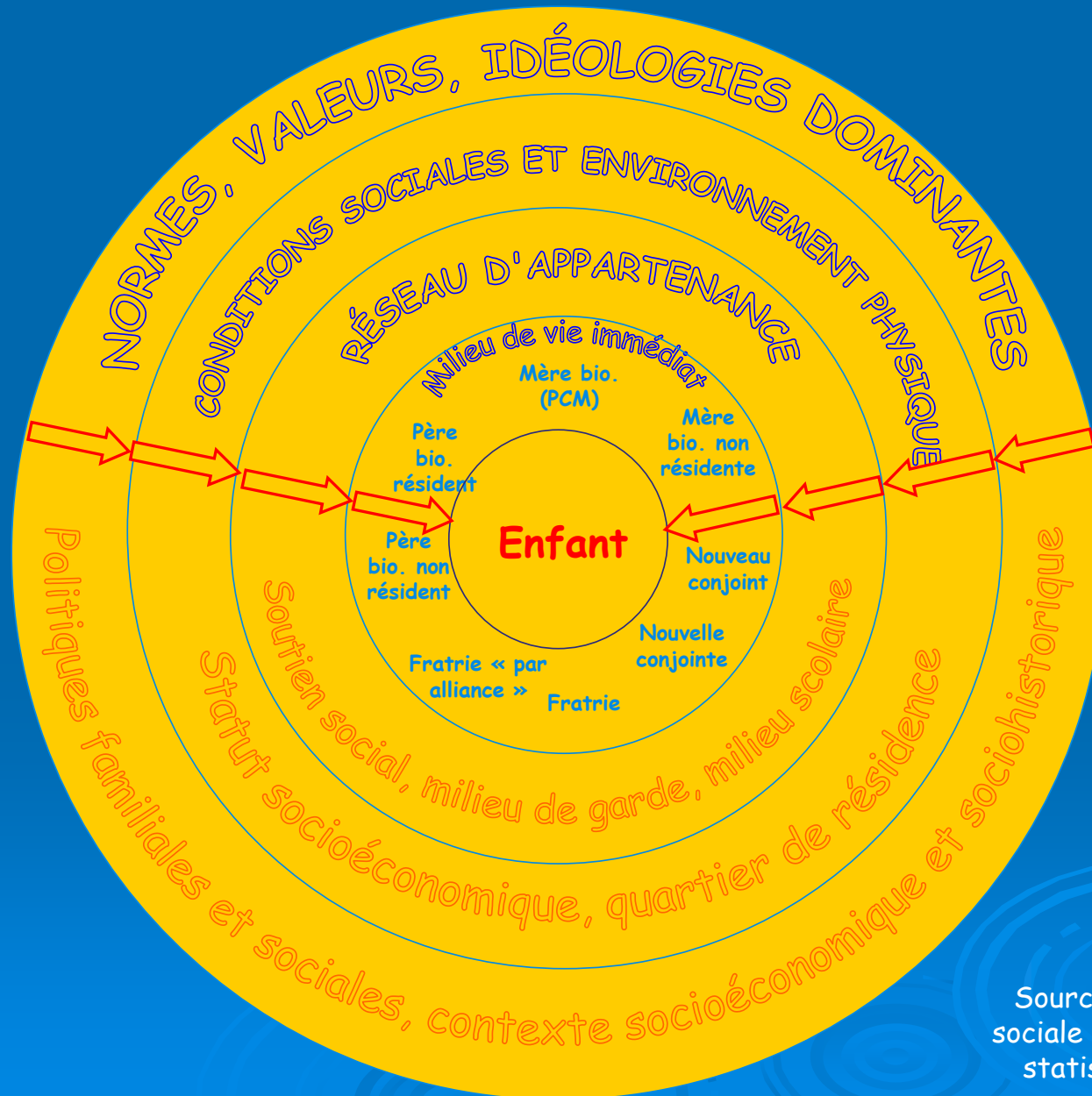


QLSCD: What are the Goals and Challenges?

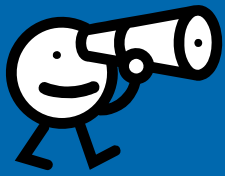
- **Methodological challenge:** Following about 2,000 children born in the province of Québec, from the age of 5 months until they finish elementary school
- **Main research goal:** Identifying factors occurring during early childhood which influence social adaptation and school achievement
- **Public policy goal:** Enhancing knowledge of the role of certain social programs (child care, public health prevention initiatives, physical activity programs, etc.) and providing scientific input into public policy development



QLSCD: A Bio-Psychosocial Approach



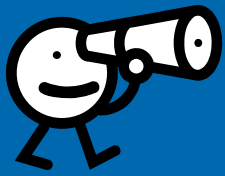
Source : Inspirée de l'Enquête sociale et de santé, Institut de la statistique du Québec, 1998.



QLSCD: Population and Sample

- Representative sample of all children born (singleton births) to mothers living in Québec in 1997-1998, excluding the following administrative regions:
 - Nord-du-Québec (10)
 - Nunavik (17)
 - Terres-Cries-de-la-baie-James (Cree Lands) (18)
- First data collection (T1) in 1998 when children were 5 months old
- Initial sample size for longitudinal monitoring: 2,800
- Effective sample size after T1: 2,120
- Year to year parental consent with a five-year moral engagement (T1 to T5)

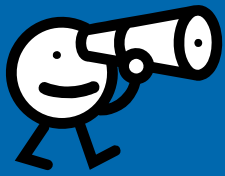
For more details about methodological aspects: www.jesuisjeserai.stat.gouv.qc.ca
(Publications section : Vol. 1 no 1)



QLSCD: Data Collection

Timeline Phase 1

| | Data collection | N | Attrition |
|------|--------------------------|-------|-----------|
| 1996 | Pretest 1 (5 months) | | |
| 1997 | Pretest 2 (17 months)... | | |
| 1998 | T1 (5 months) | 2,120 | -- |
| 1999 | T2 (17 months) | 2,045 | 3.5 % |
| 2000 | T3 (29 months) | 1,997 | 2.3 % |
| 2001 | T4 (41 months) | 1,950 | 2.4 % |
| 2002 | T5 (45-56 months) | 1,944 | 0.004 % |
| 2003 | T6 (45-56 months) | 1,759 | 10.5 % |



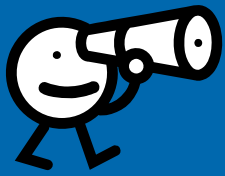
QLSCD: Data Collection

Timeline Phase 2

| | Data collection | N | Attrition |
|------|--------------------|---------------|-----------|
| 2004 | T7 (6 years old) | 1,492 | 15.2 % |
| 2005 | T8 (7 years old) | 1,528 | -2.4 %★ |
| 2006 | T9 (8 years old) | In process... | |
| 2007 | -- | | |
| 2008 | T11 (10 years old) | | |
| 2009 | -- | | |
| 2010 | T13 (12 years old) | | |

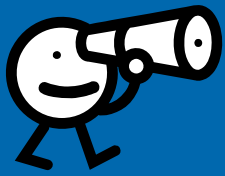
Cumulative attrition QLSCD T1-T7
29.6 %
(1.6% of official definitive refusal)

★ T8: beginning of the application of
sample retention strategies



QLSCD: Instruments

- **Interviewer Completed Questionnaires**
 - Computerized for Parent (ICCQ) : since 1998
 - Paper for Parent (ICPQ) : 1998 to 2003 and 2006
 - Paper for Child (PQAC) : since 2004
- **Self-administered Questionnaires**
 - for Mother (SAQM) : since 1998
 - for Father (SAQF) : 1998 to 2004
 - for Mother/Father not living with the child (SAQM/F abs) : since 1998
 - for Teacher (SAQT) : since 2004
- **Tests administered to the child**
 - Cognitive development (tests differ every year) : since 1998 (one-two-three hands, IST, WPPSI, VCR, PPVT, NKT, PEFT, WISC III, FIT, Lollipop Test, ROST, K-ABC)
 - Test of Gross Motor Development (Ulrich, 2000) and Physical Condition Assessment (Tremblay *et al.*, 2005) : 2004, 2006



QLSCD: Data Being Collected

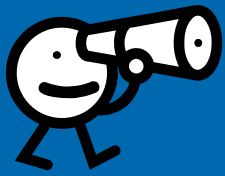
Contents

Cognitive Development (from children cognitive tasks)

- Mental Attention
- Working Memory
- Visual Coordination
- Literacy and Language
- Numeracy
- Analytical Processing
- Reading
- Spelling

Other Direct Observations and Measurements of the Children

- Motivation for Learning
- Relations with Peers
- Physical Condition (weight, height, endurance, strength, adiposity)
- Psychomotor Development
- Relations with the Teacher



QLSCD: Data Being Collected

Contents

Environmental factors (parents' questionnaires)

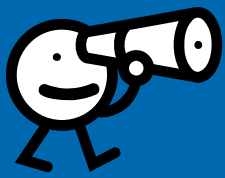
- Family Demographics
- Socio-economic Conditions
- Social Capital
- Parent/Child Interactions
- Mother/Father Relations
- Health Condition
- Child Care Services Use
- Physical, Social, and Artistic Activities
- Reading Habits and Computer Use
- Nutrition Habits
- Sleep Habits
- Child Behaviour
- Tobacco, Alcohol, and Drug Use
- Etc.

Environmental factors (teacher's questionnaire)

- Academic Aptitude
- Relations with Peers
- Child Behaviour
- School Atmosphere
- Child's Best Friend's Behaviour

Administrative data

- Medical Record at Birth
- Dental Health (RAMQ)
- Enrollment Record (MELS)
- Report Cards (School Boards)



QLSCD: What's going on in Québec and Canada?

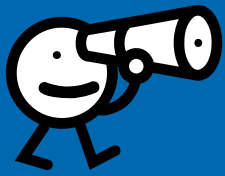
| | QLSCD | NLSCY |
|---|---|---|
| Objective | To identify factors that, coming into play during early childhood, affect social adjustment and academic performance later in life. | To determine the prevalence of various risk and protective factors for children and youth and to understand how these factors, as well as life events, influence children's development |
| Population | Children born in 1997/1998, first seen at 5 months of age in 1998 - extracted from the Master Birth Register (<i>fichier maître des naissances</i>) | Households with a child from 0 to 11 years of age at the first visit in 1994-95 - from the Canadian Labour Force Survey (LFS), monthly survey. |
| Sample | 2,800 children selected 2,120 households participating | 22,831 children selected 13,439 households participating in cycle 1 |
| Rythm of data collection | Annual | Biannual |
| Sample evolution | No additional cohort | Addition of cohort of children 0-1 years of age in cycle 2 and followed for 4-5 years |
| First direct developmental measure | At 5 months of age (Mental Capacity) (one-two-three hands) | At 4-5 years of age (Receptive Vocabulary) (PPVT-R) |

Tiré de Neill, 2005

Sources:

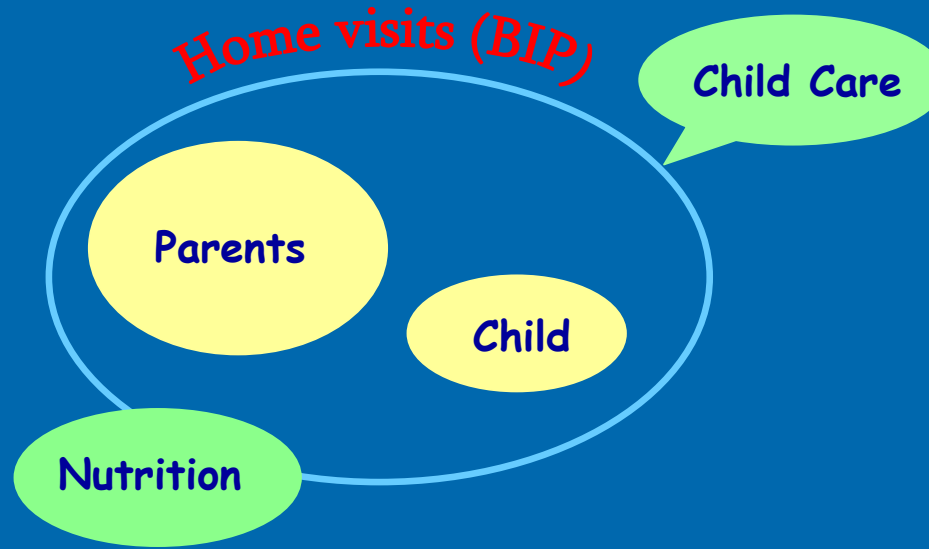
www.jesuisjeserai.stat.gouv.qc.ca

http://www.statcan.ca/english/sdds/document/4450_D4_T9_V1_E.pdf

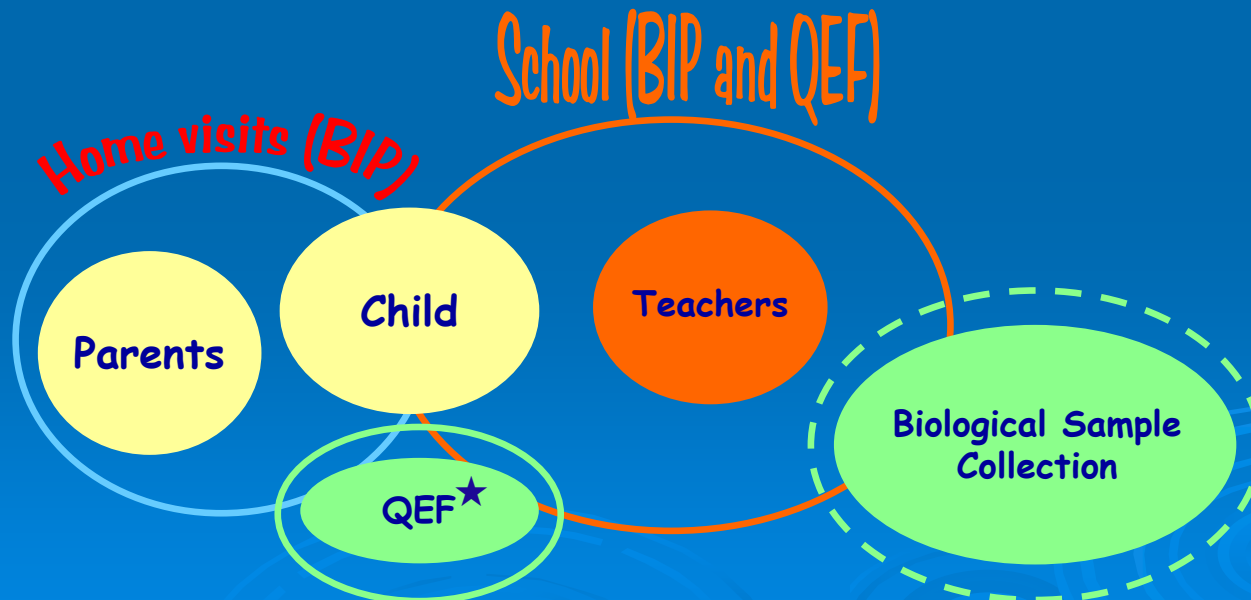


QLSCD: Complexification due to growing kids

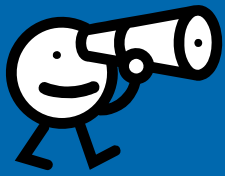
Phase 1



Phase 2



★ Gross Motor Development (Ulrich, 2000) and Physical Condition Assessment (Tremblay *et al.*, 2005)



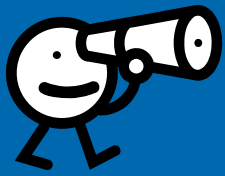
QLSCD: Subsurveys on the Sample

Phase 1

- Child Care :
 - Observation of the daycare
 - Questionnaire for daycare worker
- Nutrition :
 - 24-hour recall of everything eaten

Phase 2

- "Québec en Forme" program (www.quebecenforme.org):
 - QLSCD is the control group for the evaluation of the QEF program (increased physical activities during school hours for disadvantaged kids)
- Biological Sample Collection (under examination for T11) :
 - Blood samples
 - Salivary Cortisol Samples



QLSCD: And What do the Results Say? 1/5

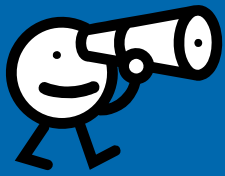
About the child

➤ Health :

- Income inadequacy has an impact on a child's cumulative health problems as early as 5 months of age, even controlling for health conditions at birth and certain mother's characteristics (Séguin *et al.*, 2001, vol 1 no 3, part 1)
- Some protective factors minimized the social inequalities in health matters : breast-feeding for a minimum of four months and the support from grandparents (Paquet & Hamel, 2003 and 2005. vol 3 fascicle 4)

➤ Lifestyle habits :

- Diet: While 72% of the children had been breast-fed at birth, only 30% were still being breast-fed at six months of age; nearly 25% were being fed cow's milk as of 6 months of age, despite the public health recommendations of the MSSS (Dubois & Girard, 2002, vol. 2 no 5)



QLSCD: And What do the Results Say? ^{2/5}

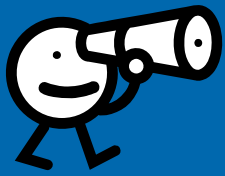
➤ Behaviour :

- A large proportion of infants manifested problem behaviours before 29 months of age; sex differences in behaviours were already present by the 17th month after birth (Baillargeon & Tremblay, 2002, vol. 2 no 7)

About the parents

➤ Parenting behaviours :

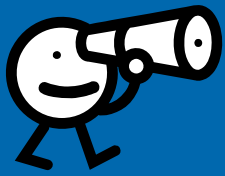
- At 5 months of age, the support of the spouse (as perceived by the mother) was positively associated with parental self-efficacy in the father; differences observed between mothers and fathers with regards to parental self-efficacy, parental overprotection and parental coercive behaviours tended to narrow as the child aged (Boivin *et al.*, 2002, vol. 2 no 9)



QLSCD: And What do the Results Say? ^{3/5}

➤ Child Care Use :

- The proportion of children attending low-cost, publicly-funded daycare (\$5 a day) increased as the children aged; children in low-income families using daycare tended to make greater use of the \$5-a-day daycares (Desrosiers *et al.*, 2003, vol. 3, fascicle 2)
- Daycare centre attendance fostered better dental health (fewer cavities and promoting visits to the dentist) (Paquet & Hamel, 2005, vol. 3, fascicle 4)



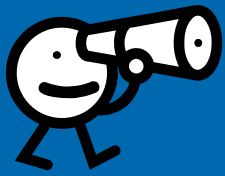
QLSCD: And What do the Results Say? ^{4/5}

About the child's family

- 19% of children born in the late 1990s had experienced an episode of single parenthood before the age of 2 1/2 yrs (Desrosiers *et al.*, 2002, vol. 2 no 2)

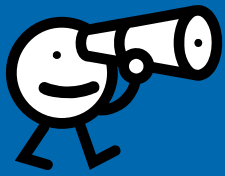
- Among these, 53% had seen their parents separate while 47% were born into a single-parent family (Desrosiers *et al.*, 2002, vol. 2 no 2)

- The median duration of the first episode of single-parenthood varied with the type; the longest ones were experienced by children born into a single-parent situation (Desrosiers *et al.*, 2002, vol. 2 no 2)



QLSCD: And What do the Results Say? ^{5/5}

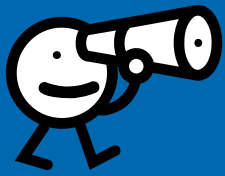
- Children who had always been in a single-parent family were far more likely to be in a family experiencing persistent financial insecurity (Desrosiers *et al.*, 2002, vol. 2 no 2)
- Children whose parents separated before or after their birth were less likely to rise from a low-income situation than those whose parents were still living together (Desrosiers, Gingras & Neill, 2004)
- Exposure to poverty affects negatively the acquisition of receptive vocabulary in children while changes in family structure showed no net influence when controlling for other factors (Neill, Desrosiers, Ducharme et Gingras, 2005)
- For more results or more details, please consult our website at www.jesuisjeserai.stat.gouv.qc.ca, Publications section.



QLSCD: How to Access the Data ^{1/2}

- Researchers should provide the CADRISQ (ISQ Data Access Center (514) 343-2299) coordinator with :
 - The purpose of requesting access
 - Summary of their research project(s)
 - Their postal and e-mail addresses, and those of any researchers or assistants associated with the project
 - The location where they would like to access the data, i.e. Montréal or Québec.
- Upon receipt of the application, a form will be sent to the head researcher. He or she must provide details on the research project.
- Once completed, the form should be emailed to the CADRISQ coordinator along with the curricula vitae of the researchers associated with the project.

Source: www.jesuisjeserai.stat.gouv.qc.ca
www.stat.gouv.qc.ca/cadrisq/default_an.htm



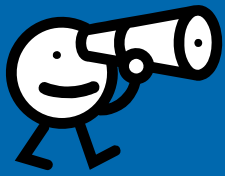
QLSCD: How to Access the Data ^{2/2}

- A review committee will then assess the application and, where appropriate, will recommend to the Director General of the ISQ that a contract be arranged between the ISQ and the researcher.
- Lastly, after taking the oath of confidentiality and signing the contract, researchers may begin their research and/or analysis using the microdata files in the CADRISQ laboratory, as stipulated in the contract.

Looking forward to another 10 years!!!



Source: www.jesuisjeserai.stat.gouv.qc.ca
www.stat.gouv.qc.ca/cadrisq/default_an.htm



QLSCD: For more informations

Bertrand Perron

QLSCD Coordinator, project management, coordination of ongoing operations,
E-mail: bertrand.perron@stat.gouv.qc.ca, Phone: 514-873-4749 Ext. 6132

Josette Thibault

Internal QLSCD coordination, communications with survey respondents, operations monitoring
E-mail: josette.thibault@stat.gouv.qc.ca, Phone: 514-873-4749 Ext. 6125

Hadi Eid

Database management, validation, programming and analysis
E-mail: hadi.eid@stat.gouv.qc.ca, Phone: 514-873-4749 Ext. 6137

Micha Simard

Validation and technical documentation
E-mail: micha.simard@stat.gouv.qc.ca, Phone: 514-873-4749 Ext. 6115

Delphine Provençal

Questionnaires, data collection instruments, data collection monitoring and technical documentation
E-mail: delphine.provencal@stat.gouv.qc.ca, Phone: 514-873-4749 Ext. 6112

Amélie Ducharme

Validation, technical documentation and analysis
E-mail: amelie.ducharme@stat.gouv.qc.ca, Phone: 514-873-4749 Ext. 6105

Source: www.jesuisjeserai.stat.gouv.qc.ca