

THE QUEBEC SURVEY OF CHILD DEVELOPMENT IN KINDERGARTEN

LSN* of des Sources



*Local Services Network



Summary of the Survey

Early childhood is a pivotal period in development. The experiences of children—positive and negative—affect the development of motor, cognitive, social, and language skills. Studies have shown that vulnerability in kindergarten is associated with past social adjustment and school success.¹ Indeed, nearly half of the vulnerable children in kindergarten will have lower-than-average school performance in the fourth grade.

The *Québec Survey of Child Development in Kindergarten* (QSCDK)²—conducted in 2012, 2017, and 2022 by the Institut de la statistique du Québec (ISQ) in all English- and French-language public and private schools in the province (excluding students with special needs or learning difficulties)—measures the development of groups of children. As part of this study, teachers filled out a questionnaire consisting of 103 questions that had been validated and used in other provinces and countries for each of their students.³ It should be pointed out that this questionnaire was based on observable behaviours related to developmental norms and was not designed to evaluate the educational program or teacher or school performance.

5 Domains Assessed

The questionnaire made it possible to assess the proportion of vulnerable children in the following five domains:

Domain	Topics of Interest
Physical health and well-being	General physical development, motor skills, diet and dress, cleanliness, punctuality, alertness
Social competence	Social skills; self-confidence; sense of responsibility; respect of peers, adults, rules, and routines; work habits and autonomy; curiosity
Emotional maturity	Prosocial behaviour and mutual help, fear and anxiety, aggressive behaviour, hyperactivity and inattention, expression of emotions
Cognitive and language development	Interest and skills in reading, writing, and mathematics; adequate language use
Communication skills and general knowledge	Ability to communicate so as to make themselves understood, capacity to understand others, clear articulation, general knowledge



We should keep in mind that not all children considered vulnerable in kindergarten will present difficulties throughout primary school.

Children are considered vulnerable when their score in a domain of development is equal to or lower than the threshold established in Quebec in 2012 (10th percentile of the distribution of results in the first cycle of the survey).

These children are:

- facing a challenge because their mastery of certain aptitudes or skills falls short.
- less well equipped to take full advantage of what school can offer.
- more likely to experience difficulties in school.

Information and mobilization activities will also be provided starting in fall 2023.

Findings for the LSN of des Sources



In the Estrie health and social services region, **316 kindergarten teachers** completed the questionnaire for **4,676 children** in **146 schools** between February and May 2022. This represents a response rate of 94.5%. The following table shows the proportions of five-year-old kindergarten children by domain, vulnerable in at least one developmental domain within the local service network (LSN; RLS in French).

In 2022, **43.4%** of five-year-old kindergarten children in the RLS des Sources were vulnerable in at least one developmental domain, representing nearly **60 children**. This proportion is statistically higher than that in the rest of Quebec for the 2022 survey cycle.

Children in the LSN are particularly vulnerable in three developmental domains: *physical health and well-being* (20.1%), *emotional maturity* (16.9%), *social competence* (24%), and *language and cognitive development* (9%). The proportion for the LSN in these three domains is significantly higher than in the rest of Quebec.

For the other two domains, the proportion is comparable to that in the rest of Quebec. It should be noted that the data have high coefficients of variation and need to be interpreted with caution.

Proportion of Vulnerable Children by Developmental Domain

Domain	LSN OF DES SOURCES				ESTRIE				QUEBEC			
	2012	2017	2022	Évolution	2012	2017	2022	Change	2012	2017	2022	Change
Physical health and well-being	15,7* (+)	14,4*	20,1* (+)	↑ (n.s.)	9,8	11,4	11,6 (+)	↑ (n.s.)	9,5	10,6	10,3	↓ (n.s.)
Emotional maturity	11,6*	18,5* (+)	16,1*	↓ (n.s.)	10,1	13,3 (+)	12,9 (+)	↓ (n.s.)	9,7	11,5	11,7	↑ (n.s.)
Social skills	12,1*	20,6* (+)	16,9* (+)	↓ (n.s.)	9,7	12,6 (+)	11,8 (+)	↓ (n.s.)	9	10,2	10,6	↑ (s)
Cognitive and language development	12,8*	17,9* (+)	24,9* (+)	↑ (n.s.)	10,7	13,2 (+)	13,3 (+)	↑ (n.s.)	10	11,1	12,1	↑ (s)
Communication skills and general knowledge	8,7**	12,4*	11,4**	↓ (n.s.)	10	11,4	9,8 (-)	↓ (s)	10,8	11,1	11,5	↑ (s)
At least 1 domain	32,7	37,7 (+)	43,4 (+)	↑ (n.s.)	26,8	29,4 (+)	30,2 (+)	↑ (n.s.)	25,6	27,7	28,7	↑ (s)

(+/-): Figure significantly higher/lower than in the rest of Quebec (threshold of 0.05)

(s): Significant difference between the 2017 and 2022 cycles (threshold of 0.05 for Estrie and RLSs; 0.01 for Quebec)

(n.s.): Difference not significant between the 2017 and 2022 cycles (threshold of 0.05 for Estrie and RLSs; 0.01 for Quebec)

* Coefficient of variation greater than 15% and less than or equal to 25%

** Coefficient of variation greater than 25%. The proportion is given only as an indication.

Legend:
Increase ↑
Decrease ↓

Between 2017 and 2022, the proportions of vulnerabilities increased significantly for two developmental domains: *emotional maturity* and *language and cognitive development*. The other domains remained comparable to the rest of Quebec between the two collection periods.



Most Vulnerable Subgroups

The proportion of five-year-old kindergarten children in the LSN vulnerable in at least one domain is higher among certain subgroups, although the differences are not statistically significant when compared to the rest of Quebec.



Percentage of Vulnerable Children in at least One Domain (2022)



CHARACTERISTICS	LSN OF DES SOURCES	ESTRIE	QUEBEC
	% of vulnerable children	% of vulnerable children	% of vulnerable children
Population breakdown	43,4 (+)	30,2 (+)	28,7
By sex			
Boys	39,4*	36,6	35,6
Girls	47 (+)	23,5 (+)	21,6
By age			
Under 6 years of age	49,3 (+)	34,4	32,7
6 years or older	38* (+)	26,1	24,7
By spoken languages			
At least French	43,2 (◇)	29,2 (◇)	27,1
English but not French	NP	44,9	37,5
Neither French nor English	NP	51,7 (◇)	38,4
By place of birth			
Canada	42,9 (◇)	29,6 (◇)	28
Outside of Canada	NP	42,3	37,3
According to physical and social deprivation			
Privileged	36,4*	22,8	23,8
Average	37*	30,7	28,8
Underprivileged	50,2*	39,4 (◇)	34,8
Regular day-care attendance before starting school			
Yes	35,6 (◇)	27	25,8
No	54*	40,8	40,9

(+): Figure significantly higher than in the rest of Quebec (threshold of 0.05).
 (◇): Figure significantly higher than in Quebec overall (threshold 0.05)
 * Coefficient of variation greater than 15% and less than or equal to 25%
 ** Coefficient of variation greater than 25%. The proportion is given only as an indication.
 NP: Due to the low number of children or to respect confidentiality, the data is not presented.

Nearly 1 girl in 2 is vulnerable in at least one domain (47%). The proportion is also higher among children aged under 6 (49.3% vs. 38% for children aged 6 and over). Children living in more disadvantaged areas have higher proportions (50.2%), which is also the case for children who did not attend daycare regularly before starting school (54%). It is important to remember that the coefficients of variation for RLS data are relatively high and need to be interpreted with caution.



The response rate reached **95,8%** in the LSN of des Sources

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References

- 1 SIMARD, Micha, Amélie LAVOIE and Nathalie AUDET (2022). *Enquête québécoise sur le développement des enfants à la maternelle 2022*, Québec, Institut de la statistique du Québec.
- 2 Gouvernement du Québec. *Enquête québécoise sur le développement des enfants à la maternelle* <http://www.eqdem.stat.gouv.qc.ca/> [Online.] (Accessed September 19, 2023).
- 3 Instrument de mesure du développement de la petite enfance, © 2000, McMaster University, Hamilton, Ontario, Canada. http://www.eqdem.stat.gouv.qc.ca/enquete_2017/documentation/guide-imdpe-eqdem2017.pdf/ [Online.] (Accessed September 19, 2023).

