



Laboratory Testing, Case Management and Contact Tracing 2020 Special Report

Why We Did This Audit

- The impact of COVID-19 on the lives of all Ontarians is unprecedented. As of August 31, 2020, Ontario had the third highest number of cases and second highest number of deaths per 100,000 residents in Canada.
- It is critical to identify individuals with COVID-19 on a timely basis through laboratory testing, case management and contact tracing in order to prevent these individuals from spreading COVID-19 to others.

Why It Matters

- Ontario has unique demographics, geography and high population density that greatly increases the risk of community transmission of COVID-19.
- Research has shown that properly targeted and timely laboratory testing, case management and contact tracing are effective at reducing COVID-19 transmission.

What We Found

- The Ministry of Health (Ministry) did not take immediate actions to ramp up testing capacity, despite warnings by Public Health Ontario and experts in February 2020. A formal Provincial Diagnostic Network was not developed until one month later to oversee and co-ordinate laboratory testing between participating laboratories
- Public Health Ontario informed the Ministry in 2017 of the risk of its inability to comprehensively respond to emerging public health threats due to a lack of sustained funding. Public Health Ontario's annual base funding has remained since 2013/14 and the Ministry took no action despite this warning. Between 2014/15 and 2019/20, Public Health Ontario decreased its number of full-time equivalent staff positions by 120, representing 12% of its workforce.
- Ontario's lab testing, case management and contact tracing activities did not occur fast enough to effectively prevent COVID-19 transmission. Between March and August 2020, the average amount of time between collecting a specimen and contacting the person who tested positive and to start case management and contact tracing was more than four days. A study in the Lancet Public Health Medical Journal identified that when lab testing, case management and contact tracing activities are delayed by two days each, only 39% of COVID-19 transmission can be prevented. There were more than 1,000 instances where the person who tested positive was contacted by the public health unit more than 14 days after specimen collection, missing the 14-day isolation period when the person was most infectious.
- Between March and August 2020, it took on average 2.75 days between collecting a specimen and starting case management in most regions of the province. But it took a longer-than-average time for urban and densely populated regions—such as Toronto, Peel Region, Ottawa and York Region—to test specimens and start case management: Ottawa, 3.25 days; York Region, four days; Peel Region, 4.5 days; and Toronto, 5.75 days.
- The Ministry set targets for lab testing: 60% of lab tests completed and results reported within one day of specimen collection, and 80% within two days of specimen collection. The province overall has not met these targets: only about 45% of tests were completed within one day, and 77% of tests were completed within two days. Most public health unit regions did not meet either the one day or two day testing target.
- Due to the delay in expanding lab capacity, Ontario took one month longer than Alberta and three weeks longer than British Columbia to allow anyone with COVID-19 symptoms to be tested. As a result of this delay, as of August 31, 2020, based on Public Health Ontario's analysis, we estimated about 119,000 Ontarians may have contacted COVID-19 and were not tested for it. This meant that case management and contact tracing were not done on these cases.
- Ontario Lab Information System (OLIS) has been in place for almost 30 years, but labs still fax test results to public health units for them to start case management and contact tracing due to incomplete and inaccurate data in OLIS.
- The integrated Public Health Information System has been in place for almost 15 years; however, it contains numerous longstanding deficiencies that make it ineffectual for case management and contact tracing. These deficiencies make it harder to perform case management and contact tracing effectively. Some public health units developed their own standalone systems to perform case management and contact tracing.

- The Testing Strategy Expert Panel recommended on July 5 that the Chief Medical Officer of Health end asymptomatic testing, which has limited value based on evidence, but it was not discontinued until September 24.
- Ontario did not meet its laboratory testing capacity target of 50,000 tests per day either by the initial planned date of July 2020 or by the revised target date of September 2020. Hospitals told us that they did not aggressively increase their laboratory testing capacity because the information they received from the Ministry about funding to support more testing was unclear on the amounts and the timing.

Conclusions

- The Ministry of Health did not have available, when COVID-19 impacted Ontario, co-ordinated effective systems and procedures in place that could easily be adjusted to perform timely COVID-19 laboratory testing, case management and contact tracing
- The Ministry did collect and assess data on the efficiency and effectiveness of laboratory testing and case and contact management activities for performance management and service improvement. However, the data showed that the performance of these activities did not meet the Ministry's targets.

Read the report at www.auditor.on.ca