



Tracking the Canadian Economy through COVID-19: Insights from customer transactions – March 4, 2021

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1. Key Insights from Canadian Customer Transactions

This presentation is part of the weekly series intended to draw insights about the state of the Canadian economy from the flow of Scotiabank's retail and non-retail transactions data.

Key takeaways from the payments data in this week's publication:

- Updated to February 27th, business sector transactions continued to run significantly above last year's levels, in line with indications from Statistics Canada that the latest round of restrictions imposed in early 2021 is having a muted impact on the economy outside the retail sector:
 - Incoming payments showed steady positive y/y growth since the start of 2021, with wholesale, retail and financial services sectors boosting the overall growth. Payments to the wholesale sector picked up significantly since early January, supporting the preliminary assessment from Statistics Canada that wholesale sales rose in January, despite the tighter restrictions imposed in January. Manufacturing payments have improved so far in 2021, also a positive sign.
 - Growth in outgoing payments remained stable, supported by steady payroll deposits and improving rent payments. Growth in rental payments turned positive in late January, possibly in response to the rising reach of pickup in the emergency rent subsidy program (CERS).
- Growth in consumer card spending improved further in the second half of February (data to February 26th), as public health measures started to be relaxed in some regions:
 - The improvement can be seen in the hardest-hit provinces such as Ontario, Quebec, Manitoba and Saskatchewan.
 - Purchases of clothing, hardware and automotive products saw growth pick up significantly since the lockdown-induced dip in January.

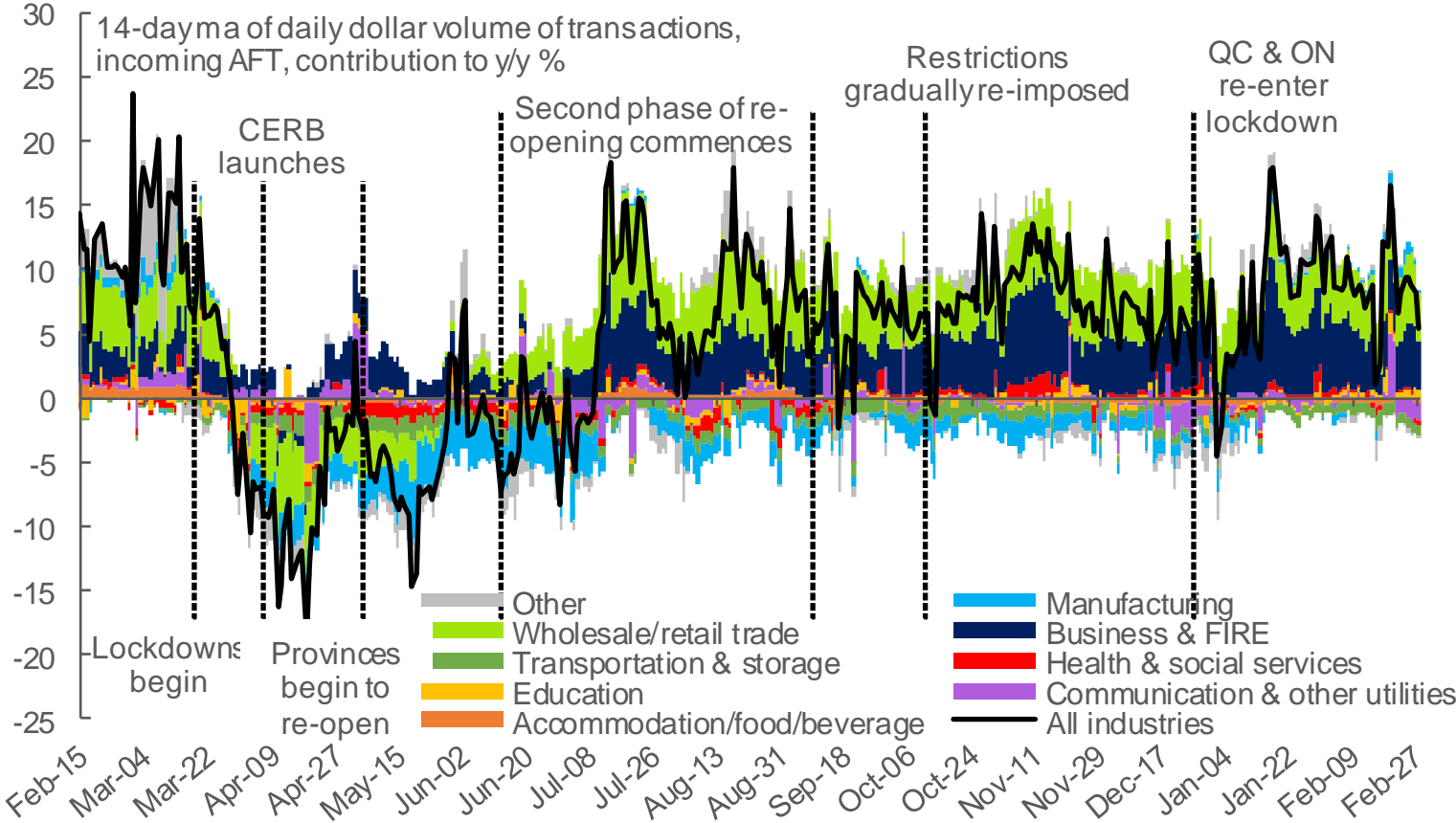
2. COVID-19 and the Canadian Economy: Scotiabank Transactions Data

- We present data on retail and non-retail transactions, which capture distinct but related aspects of economic activity in Canada.
- The data comprises actual observed daily transactions going through debit or credit card payment networks in the retail space, and automated funds transfers (AFTs) in the non-retail space.
 - The transactions are anonymized and aggregated to protect the privacy of Scotiabank's clients.
- The AFT payments show bill payments to/from companies in Canada.
 - Incoming payments can be associated with company revenue, and outgoing payments can be associated with costs.
- Debit and credit card payments can be used to measure the evolution of retail spending at various types of establishments.
 - The transactions can serve as a measure of economy-wide retail spending, and of the extent to which households are resuming pre-COVID levels of activity.
 - Note that the use of electronic payments has increased because of COVID-19, so comparisons to year-ago levels can be misleading. These data are best used to observe directional movements rather than to make specific assessments on the level of activity.
- In the current circumstances, comparing the dollar volumes of transactions in the current year to its level of a year ago should help track growth through the re-opening phase.

3. Business Transactions Data: Business Payments Continue to Show Resilience

- Updated to February 27th, business sector transactions continued to run significantly above last year's levels, in line with indications from Statistics Canada that the latest round of restrictions imposed in early 2021 is having a muted impact on the economy outside the retail sector (Chart 1):
 - Incoming payments showed steady positive y/y growth since the start of 2021, with wholesale, retail and financial services sectors boosting the overall growth.
 - Payments to the wholesale sector picked up significantly since early January, while manufacturing payments have finally started to improve in 2021 (Charts 2-6).

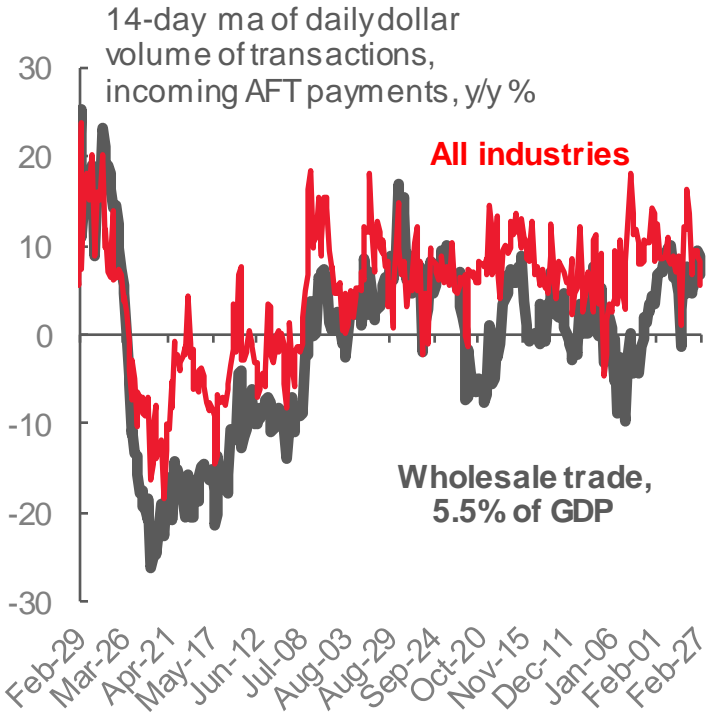
Chart 1



Sources: Scotiabank Economics, Data Science and Analytics.

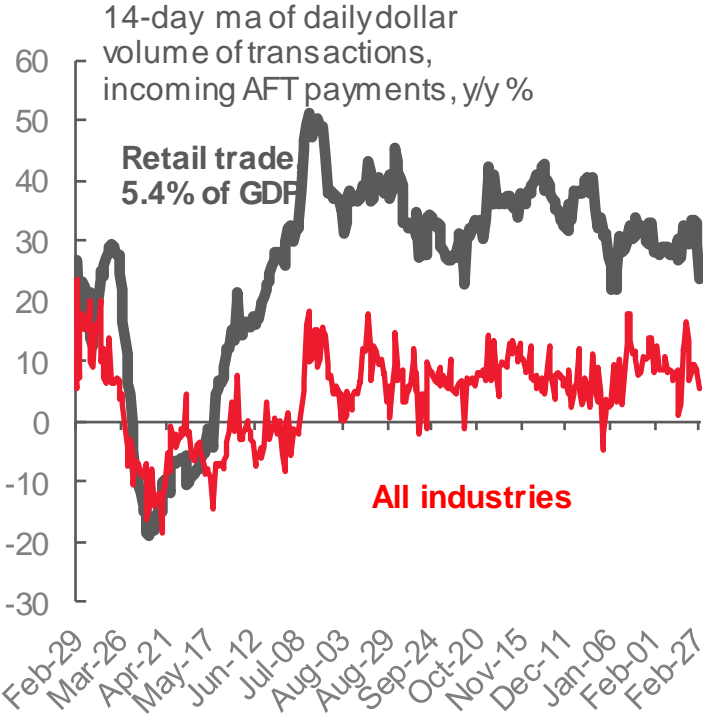
3. Business Transactions Data: Wholesale Transactions Rise Further

Chart 2



Sources: Scotiabank Economics, Data Science and Analytics.

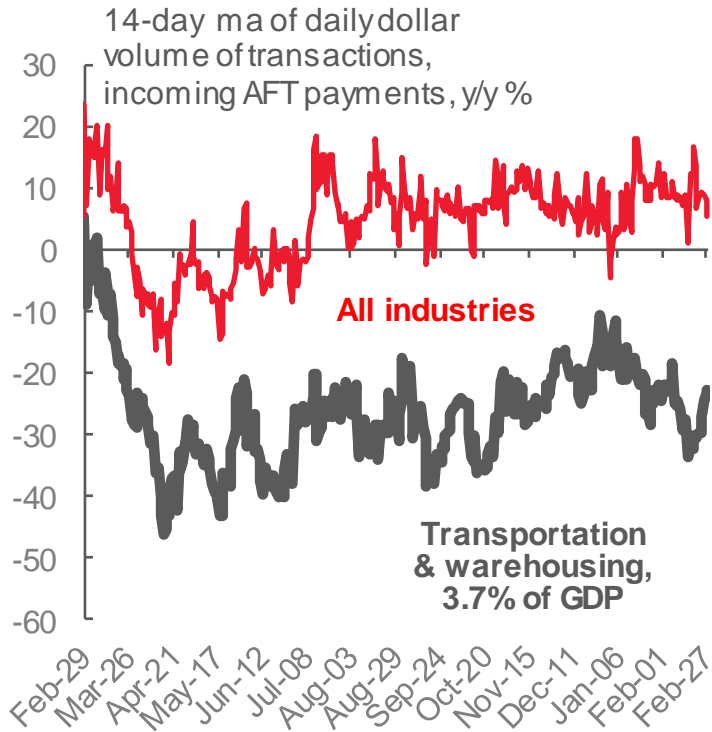
Chart 3



Sources: Scotiabank Economics, Data Science and Analytics.

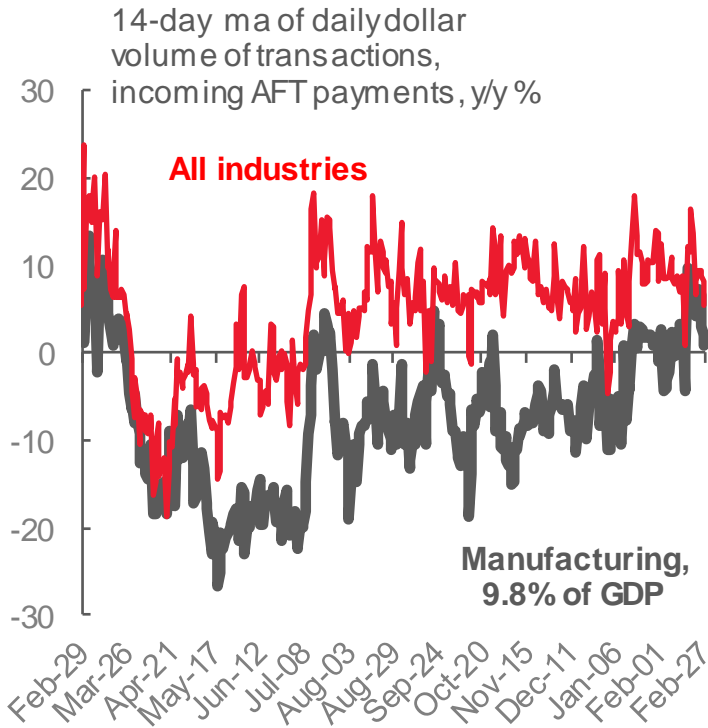
3. Business Transactions Data: Manufacturing Picks Up

Chart 4



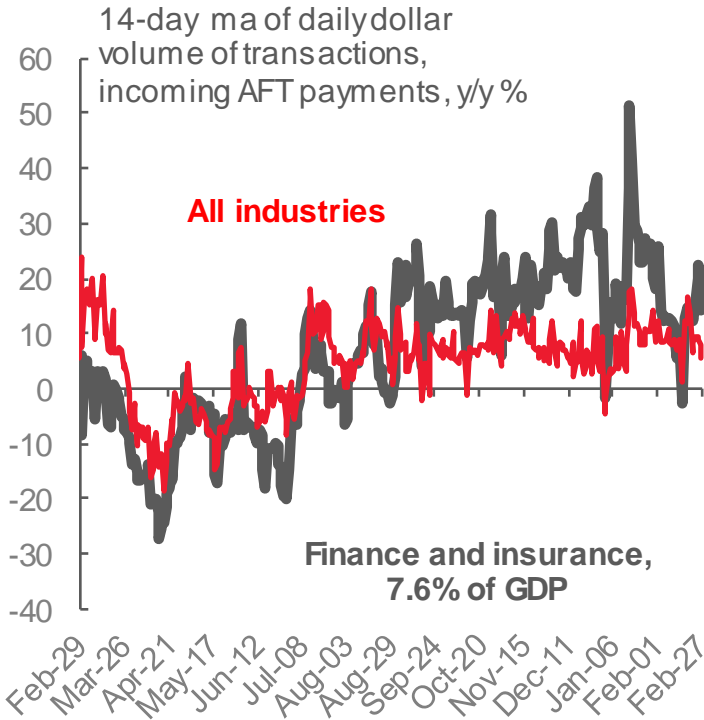
Sources: Scotiabank Economics, Data Science and Analytics.

Chart 5



Sources: Scotiabank Economics, Data Science and Analytics.

Chart 6

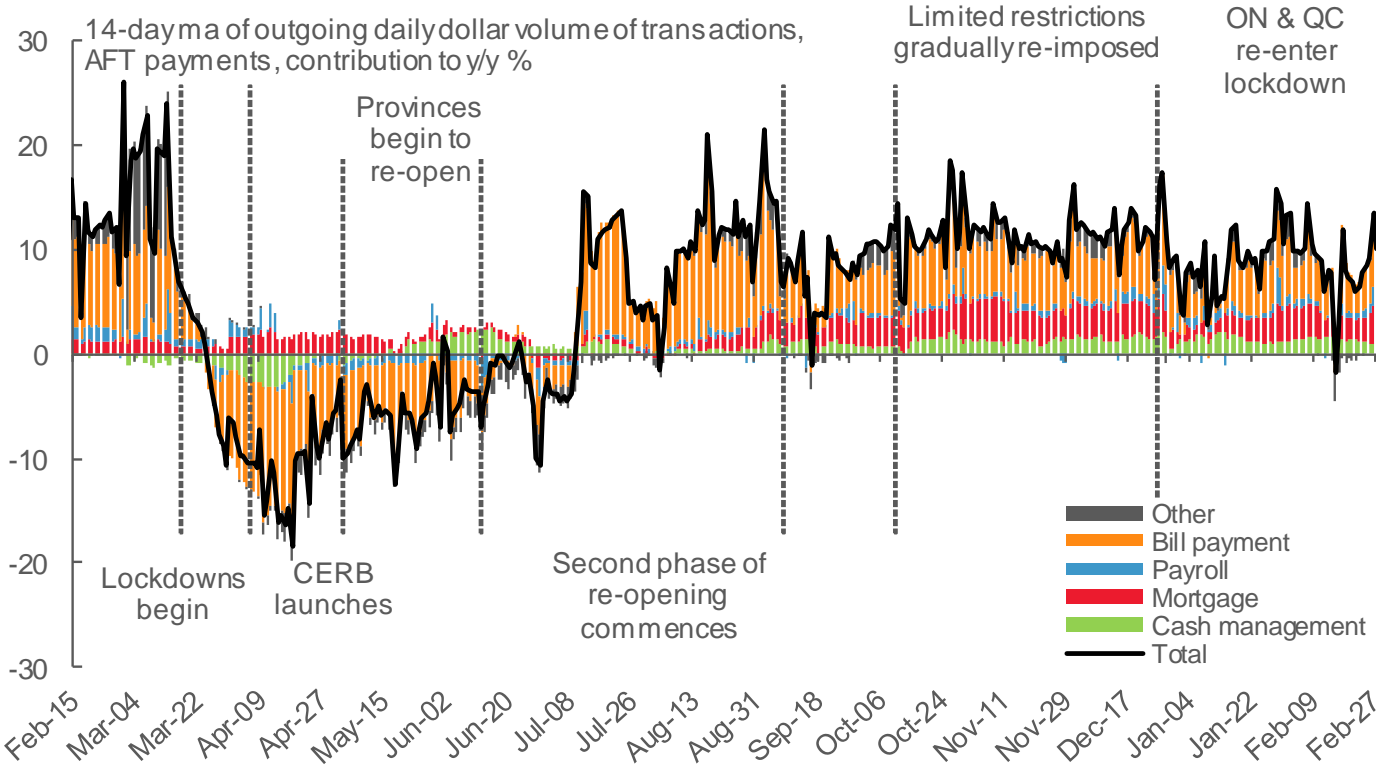


Sources: Scotiabank Economics, Data Science and Analytics.

3. Business Transactions Data: Growth in Bill Payments Positive

- Growth in outgoing payments remained stable, supported by steady payroll deposits and improving rent payments. Growth in rental payments turned positive in late January, possibly in response to the rising reach of pickup in the emergency rent subsidy program (CERS) (Charts 7-9).
- The Canada Emergency Rent Subsidy program continued to ramp up through February, with the most recent data showing over 1.4 billion dollars approved so far (data to February 21, 2021).
- Stable rises in payroll deposits highlight the muted impact of the latest round of restrictions seen so far in the labour markets outside of retail and hospitality sectors.

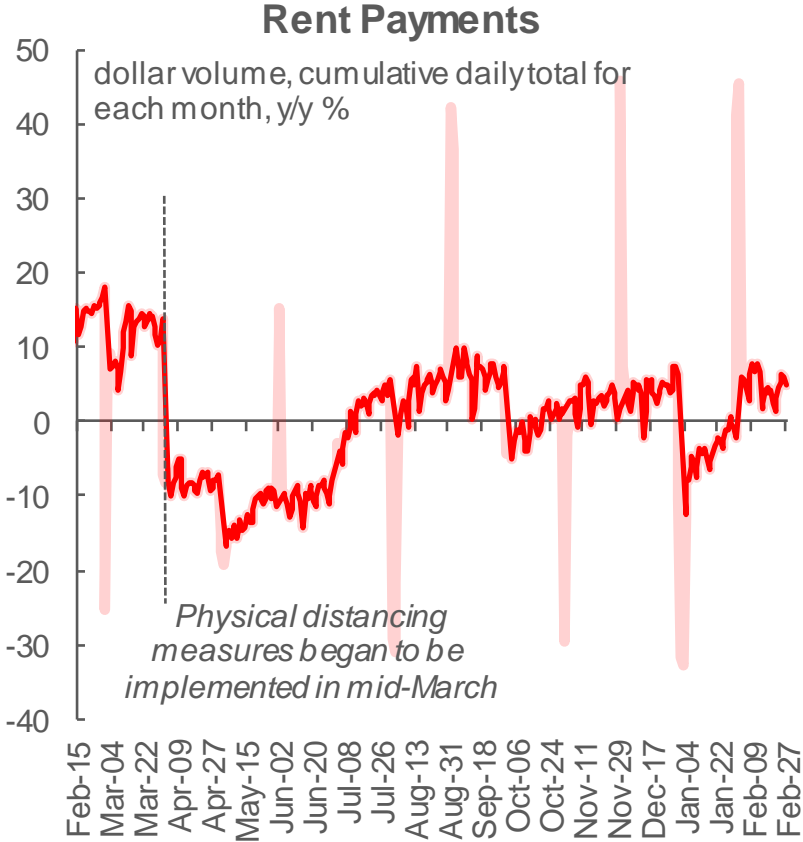
Chart 7



Sources: Scotiabank Economics, Data Science and Analytics.

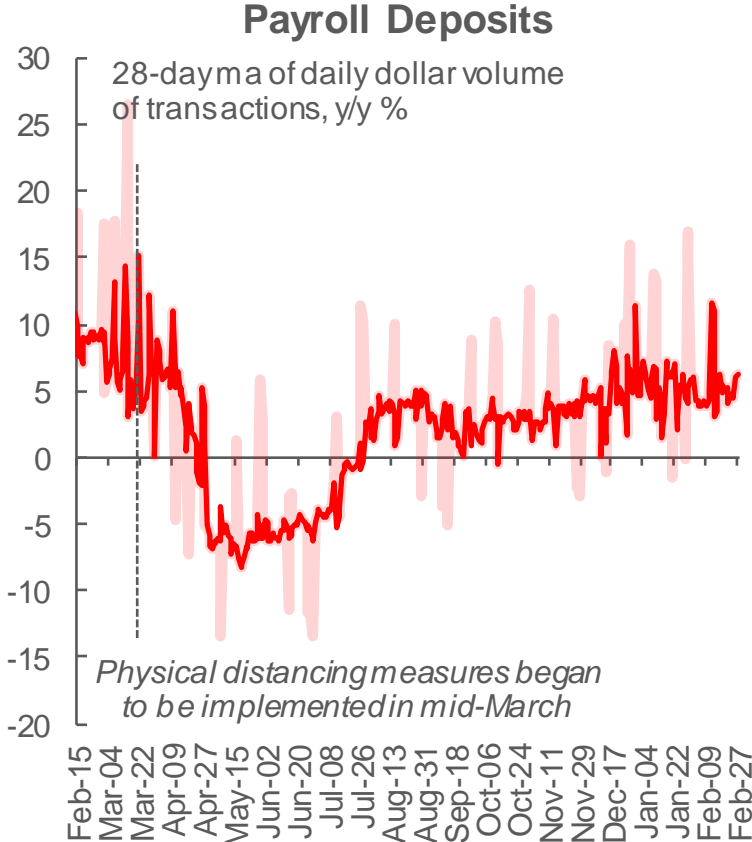
3. Business Transactions Data: Rent Payments Finally Show Positive Growth Y/Y

Chart 8



Sources: Scotiabank Economics, Data Science and Analytics.

Chart 9

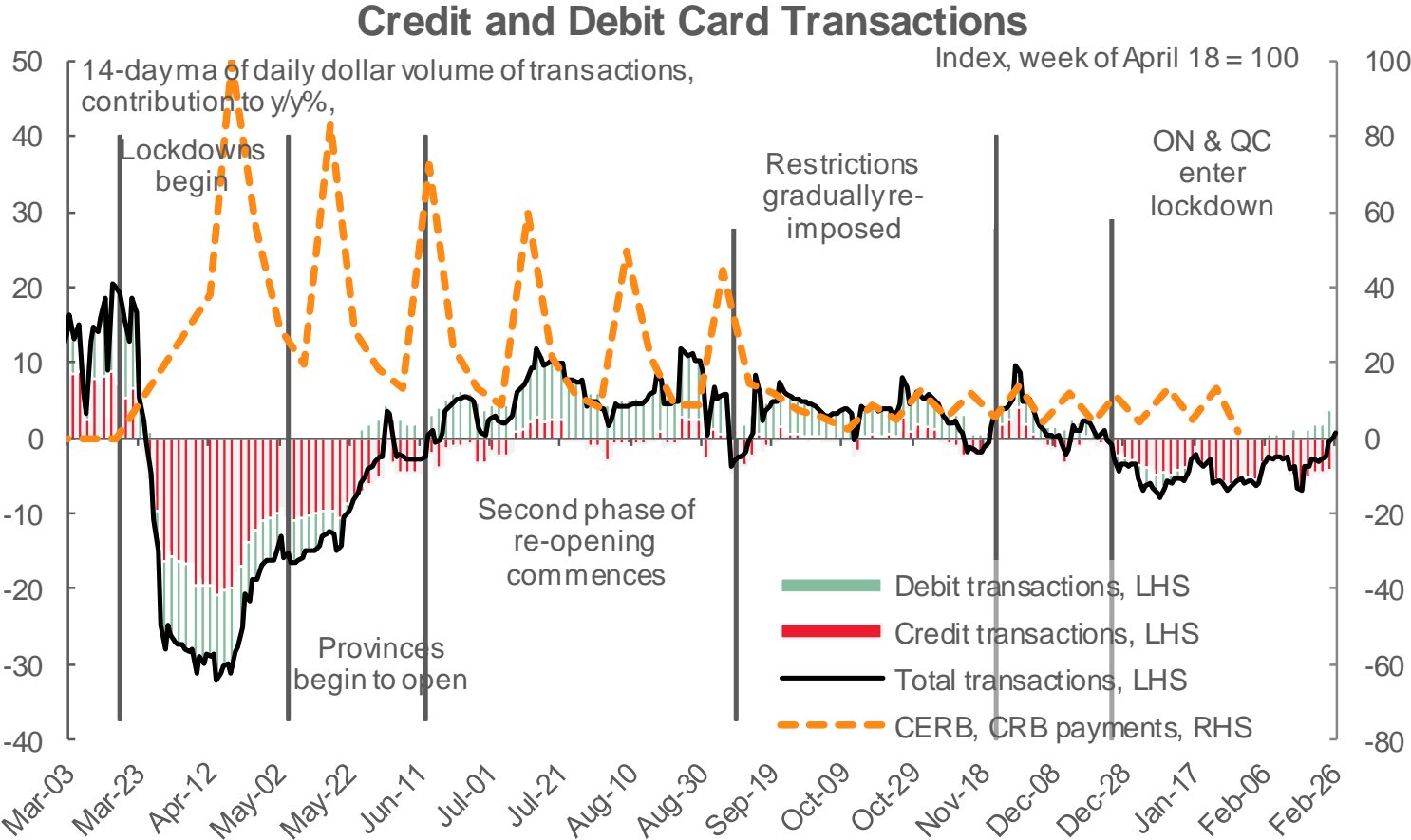


Sources: Scotiabank Economics, Data Science and Analytics.

4. Retail Transactions Data: Total Spending Improved Over the Last Few Weeks

- Growth in consumer card spending improved further in the second half of February (data to February 26th), as public health measures started to be relaxed in some regions (Chart 10).
- Debit card spending has picked up in the last few weeks, explaining most of the improvement, while credit cards remain underutilized.

Chart 10

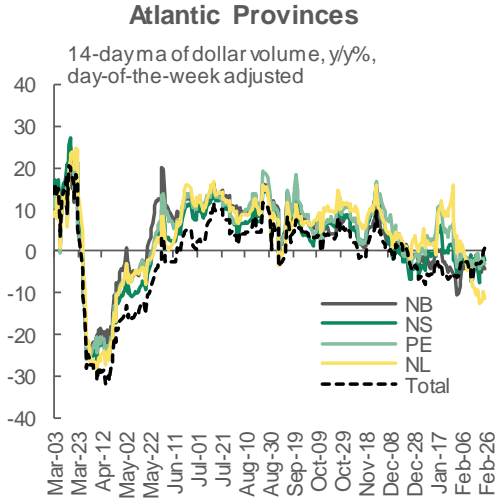


Sources: Scotiabank Economics, Customer Insights, Data & Analytics.

4. Retail Transactions Data: Hard-hit Provinces Starting to Recover

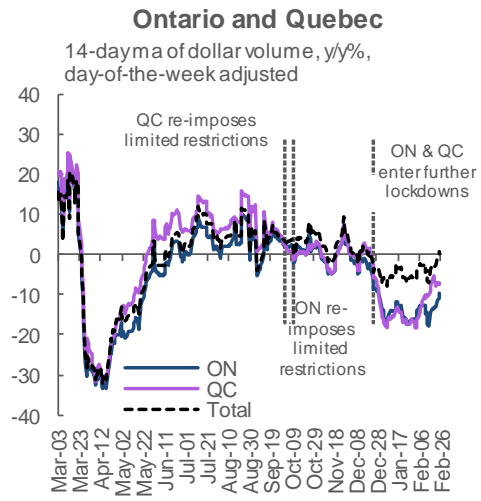
- The improvement in card spending seen in the last few weeks is mainly explained by rising growth in hardest-hit provinces such as Ontario, Quebec, Manitoba and Saskatchewan (Charts 11-14).

Chart 11



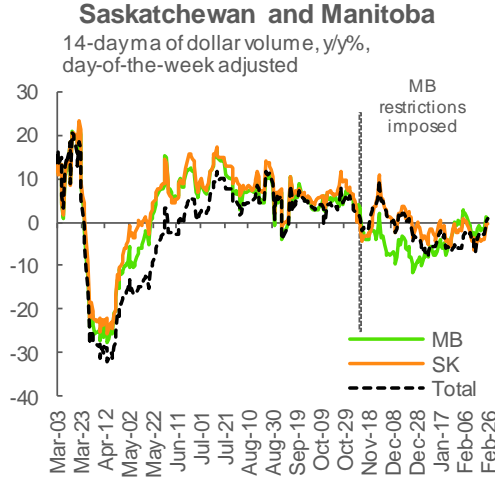
Sources: Scotiabank Economics, Data Analytics.

Chart 12



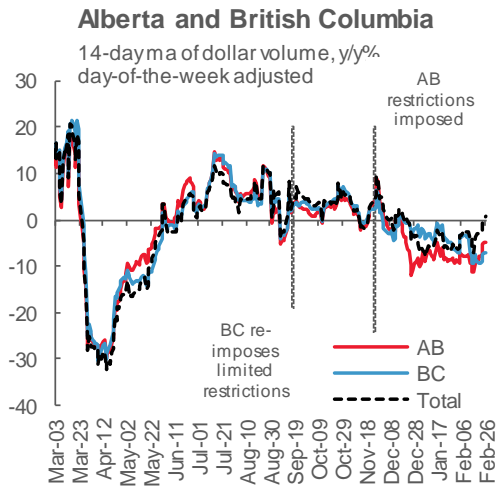
Sources: Scotiabank Economics, Data Analytics.

Chart 13



Sources: Scotiabank Economics, Data Analytics.

Chart 14

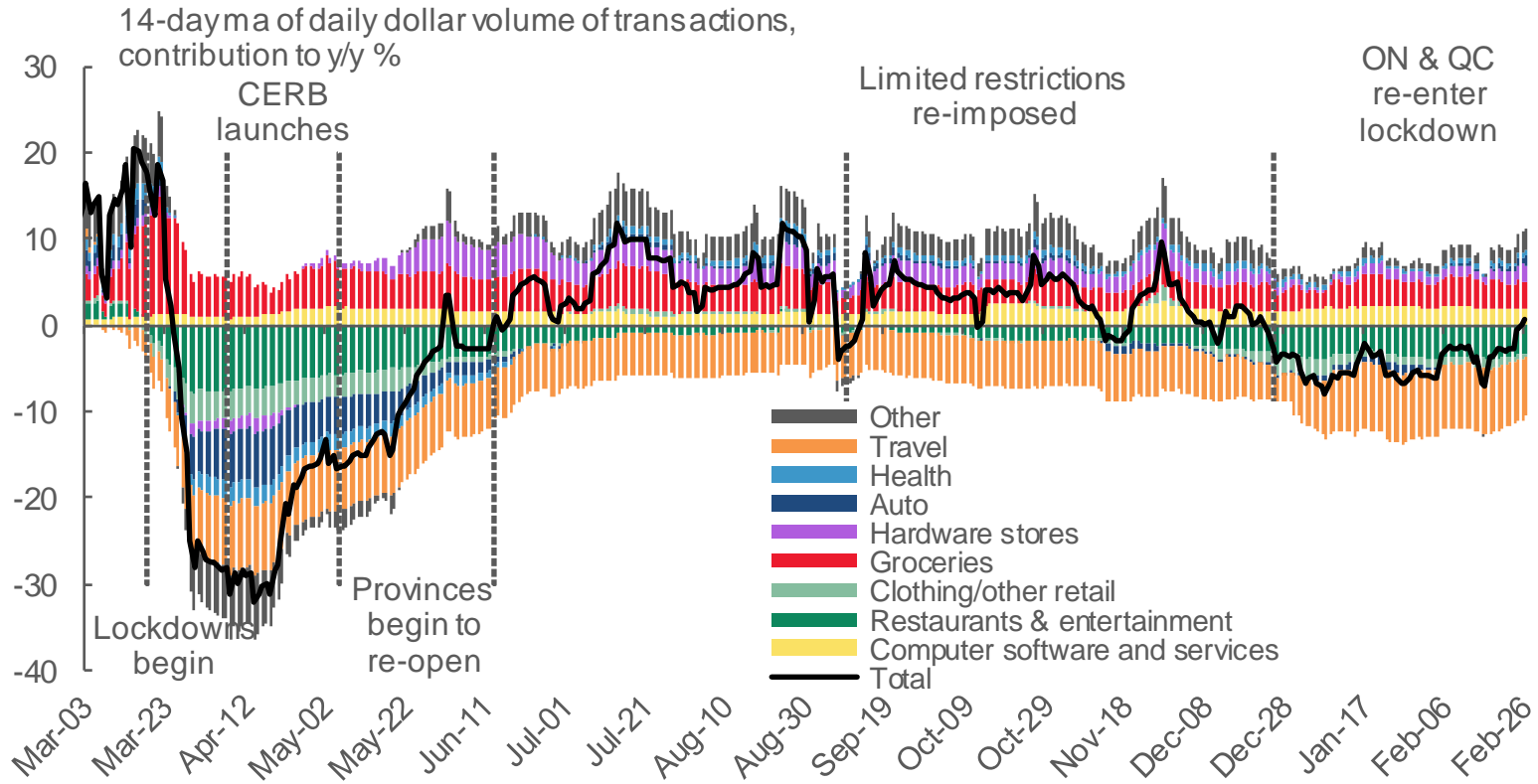


Sources: Scotiabank Economics, Data Analytics.

4. Retail Transactions Data: Overall Growth Slightly Positive, Despite Travel-Related Drag

- While travel spending remains the largest source of drag on growth, shopping in other sectors improved enough to push overall growth into a slightly positive territory (Chart 15).

Chart 15

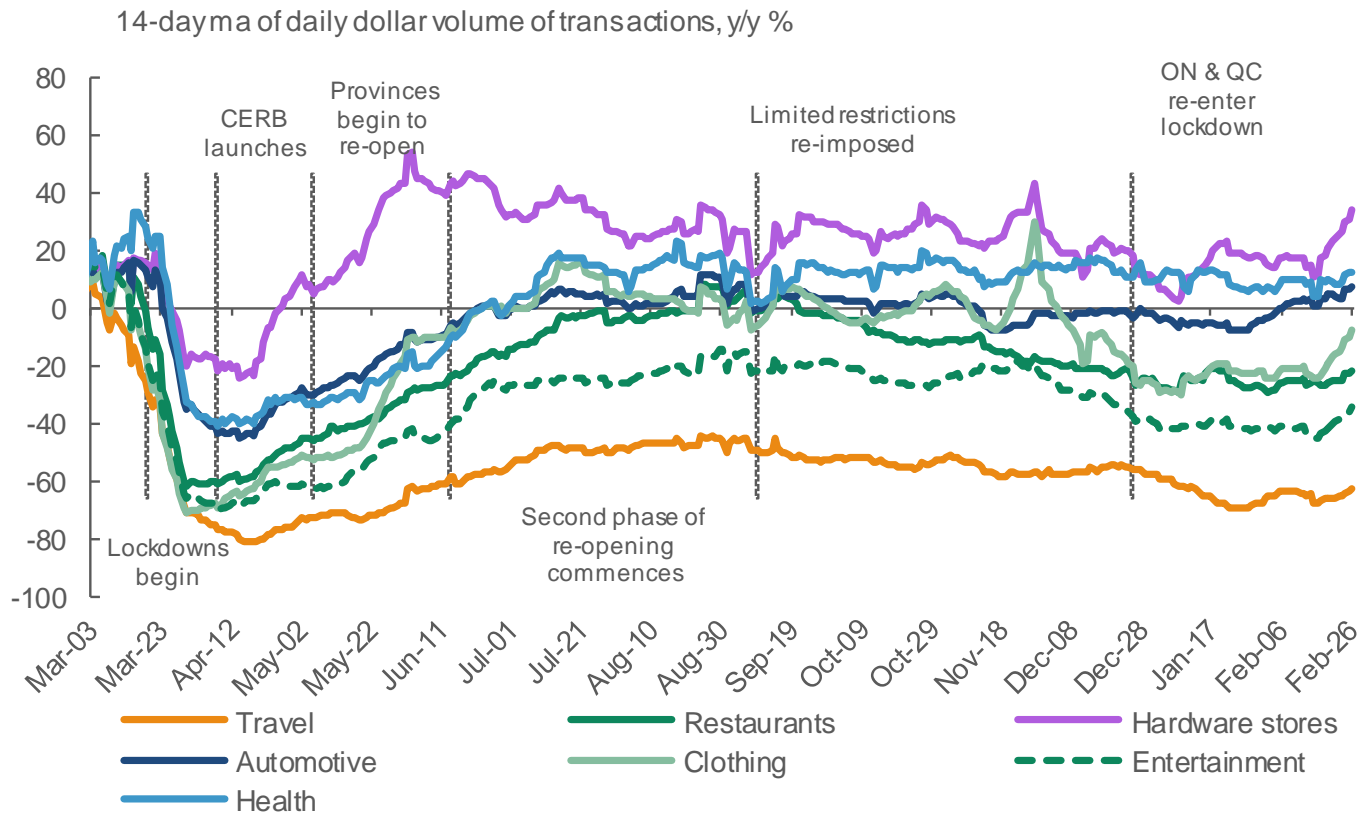


Sources: Scotiabank Economics, Customer Insights, Data & Analytics.

4. Retail Transactions Data: Hard-hit Sectors Show Better Spending Trends

- Purchases of clothing, hardware and automotive products rose significantly following the relaxed restrictions in some regions (Chart 16).
- Strong housing markets so far in 2021 no doubt boosted demand for home renovation products as households prepare homes for sale and/or make living arrangements more comfortable as they spend more time at home.

Chart 16

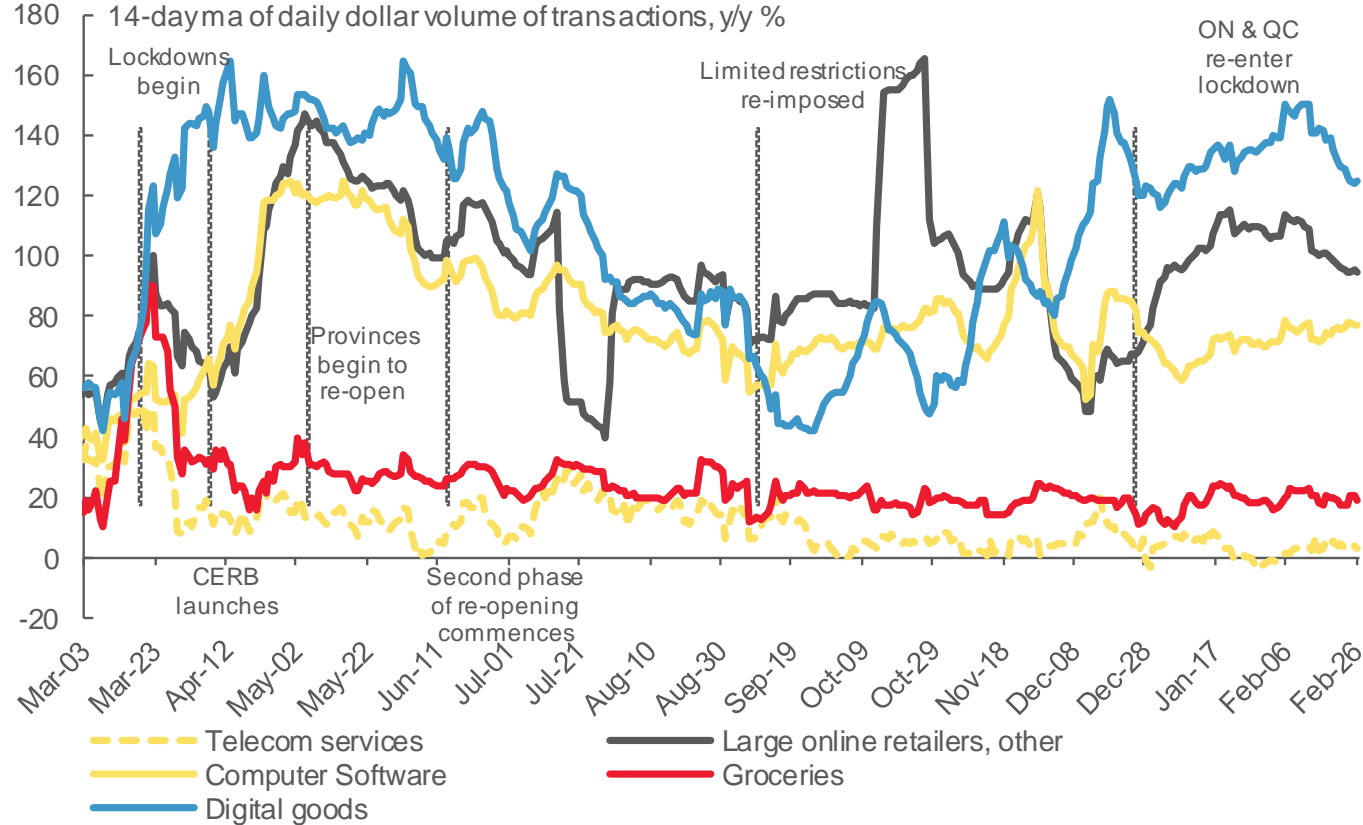


Sources: Scotiabank Economics, Customer Insights, Data & Analytics.

4. Retail Transactions Data: Purchases of Digital Media Subside Recently

- Purchases of digital products and spending at large online retailers took a breather in late February after capitalizing on a significant pick-up in demand around holidays (Chart 17).

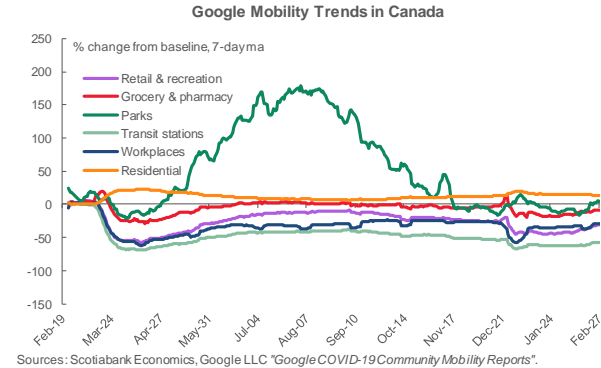
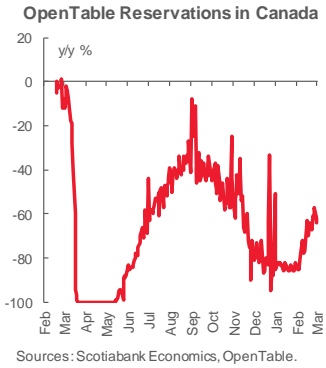
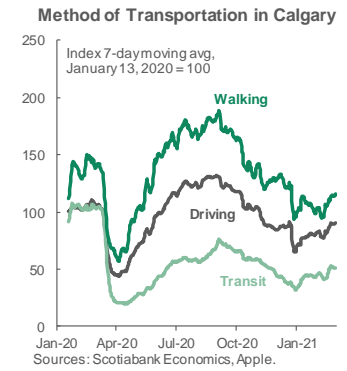
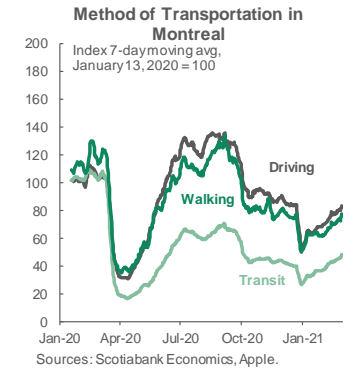
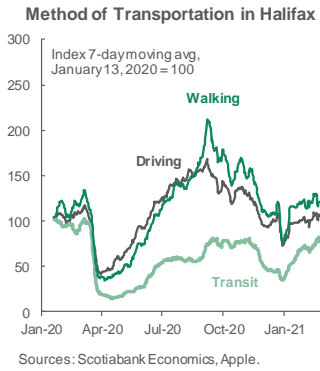
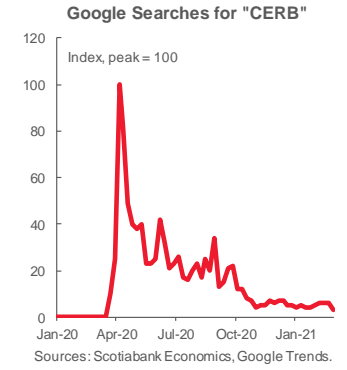
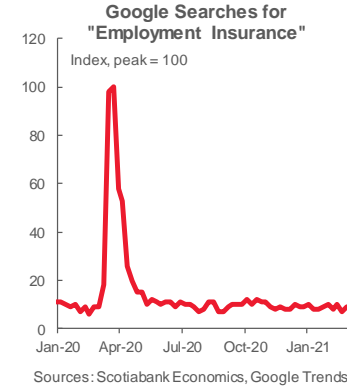
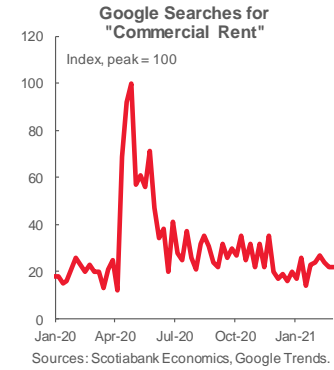
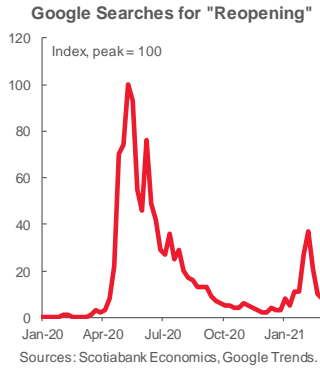
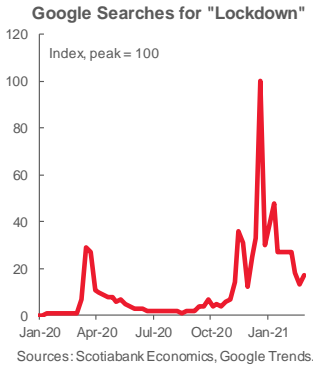
Chart 17



Sources: Scotiabank Economics, Customer Insights, Data & Analytics.

5. Other High-Frequency Indicators Of Activity

Charts 18-31 Google Searches, Various Keywords, Dining and Transportation Data



6. Caveats

- Note that the mapping from the volume of transactions to measures of economic activity (e.g. GDP) is imperfect, and so care must be taken when drawing the implications.
- The data is observed at daily frequency and embeds different types of seasonal patterns.
 - For retail payments, the volume and types of payments are different depending on the day of the week and the season.
 - For non-retail payments, both the day of the week and the season are important. In addition, some payments are tied to the calendar date (e.g. rent payments are made on the first day of each month), some payments have a bi-weekly schedule, etc.
 - To smooth out most of the day-to-day seasonality we use a 14-day moving average of the dollar volume of transactions, taking a $y/y\%$ change to remove any remaining seasonal patterns related to the calendar date.
- In addition to seasonality, there is normal payment volatility related to the random nature of the transactions process and the impact of regional and economy-wide events (weather, labour strikes, etc.).
 - The volatility of this nature may or may not be related to economic activity as measured by GDP and so, as mentioned above, care must be taken in drawing inference.
- For business transactions, which are inherently more lumpy compared to retail spending, data towards the end of the sample can be revised as some AFT payments are recorded with a lag. As a result we exclude the last few days of data of business transactions only.

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We analyzed anonymized automated funds transfers (ATFs) by businesses through the Automated Clearing Settlement System where Scotiabank is one of the parties. The analysis was based on 22 Transaction Codes (see [Payments Canada](#) for more information on transaction types) across 20 industries. We also analyzed anonymized retail transactions (debit and credit card payments) through Scotiabank, with 18 broad spending categories based on 264 merchant types. Finally, we used aggregated totals for deposits related to the Canada Emergency Response Benefit made into customer accounts in chart 12, indexing the series to 100 at the maximum weekly total.

For each type of transaction (retail and ATF), we calculated a 14-day moving average daily in 2020 through early May and compared to a corresponding average for the same month and day in 2019.