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Spring 2020 Chief Editors: Abdullah Saif, Diga Ye

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Covid and its implications on the European Economy

By Samuel Benedict and Jaden Josefin, Market Research Analyst

COVID-19 has proven to be troublesome for all European countries including giants such as the UK, Germany, and France. The first large outbreak in Europe occurred in Italy and quickly spread across the European mainland. With over 600,000 positive cases and 80,000 deaths just from these 3 countries, this pandemic has caught worldwide attention with its rising number of positive cases each day. Not only has it consumed thousands of lives, but it has created a huge shock for these three European economic powerhouses. In anticipation of the upcoming economic rebound, let us look upon the economic and financial impacts, as well as the possible outlook for the European economy going forward.

GDP

Figure 1: First-Quarter GDP Growth in Europe

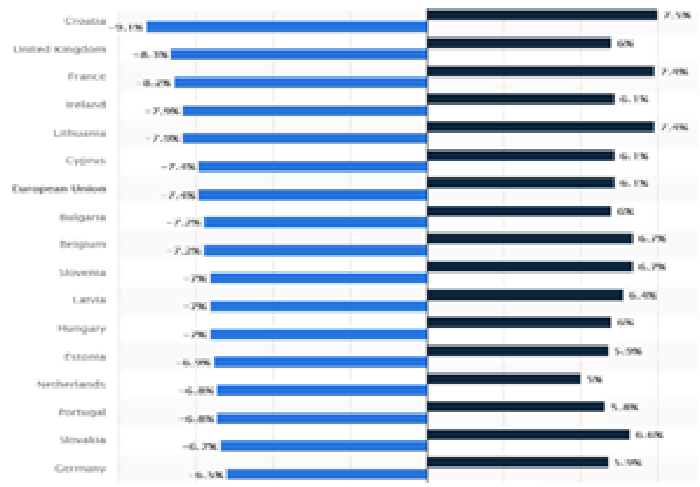

Figure 2: Real GDP Growth for 2020 and 2021

As predicted, the GDP of most European countries contracted during the first quarter of 2020 as the result of business closures and temporary halts for investment projects.

France suffered the biggest GDP contraction with -5.3%, the sharpest since 1949. The decline is largely caused by the sharp drop in construction (- 12%) and goods and services production (- 5.5%). France's exports are also largely hit by the pandemic, dropping as much as 6.5% from the previous period [1]. Germany's quarterly GDP growth is also experiencing its steepest decline since the 2008 financial crisis and 1990 unification, dropping 2.2% from the previous quarter. Although their household consumption and machinery investment fell drastically, extra government expenditure and additional construction investment hold off Germany's GDP from further decline [2]. Meanwhile, in the UK, the 2% quarterly GDP decline is better than analysts' estimate of 2.5%. However, the Bank of England projected UK's 2020 GDP to fall up to 14% year-on-year, which will be primarily driven by an estimated drop of 25% in the second quarter [3].

With the current lockdown measures, it forces corporations and companies to stop operating, and this provokes a question on whether businesses might sustain under this condition for an extended period. If the lockdown measures are not eased anytime soon, companies across Europe may have to lay off most of their workers to cut down its losses. This leads to less output being produced in an economy signifying unproductivity and failure to maximize the output given finite resources. This also worsens these three countries' recession status as they are facing two consecutive quarters of negative economic growth. However, if hopes of rebuilding the economy begin to rise in Europe, economists predicted a consistent hike in Real GDP 2021, as shown by the black bars in Figure 2. Afterall, history has proven that the economy always manages to recover from global crises such as The Great Depression, 2008 Financial Crisis, etc.

Unemployment rate

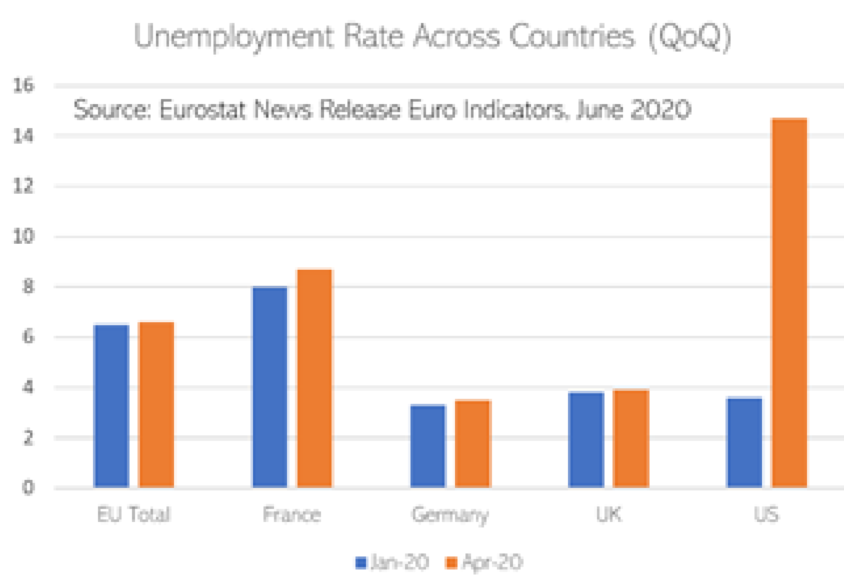

Figure 3: Unemployment Rate Changes across Europe

The figure above illustrates the unemployment rate for European countries and the US between January to April 2020.The current type of unemployment would be classified under cyclical unemployment where there is a decrease in the general level of aggregate demand. Looking at the demographics of European countries, there is no significant spike in the unemployment rate within four months for the three countries discussed in comparison to the US. The change in unemployment rate ranges from 0.25% to 1% in contrast to the US that accumulates roughly 12%. France has always had a historically high unemployment rate relative to other countries discussed, and they are currently facing an uphill battle. However, the unemployment rate data alone would be incompetent in explaining the full picture. Calculating the unemployment rate would be dependent on the number of labor force, and it can be quite challenging as well as subjective determining an individual's capability and willingness to work especially under this pandemic.

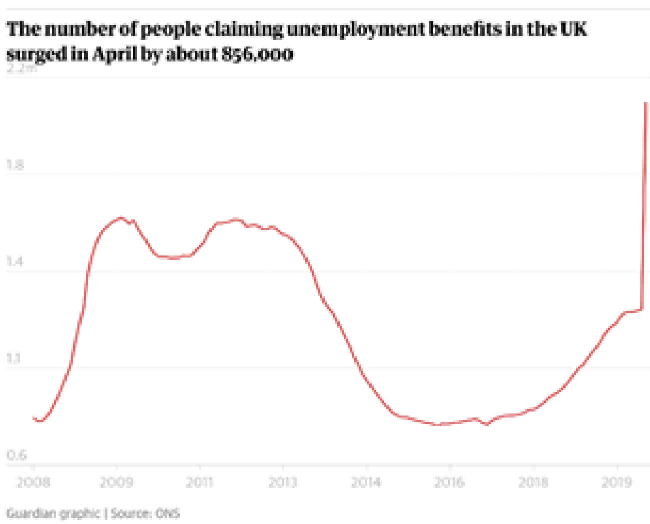

Figure 4: Jobless Claims in the UK

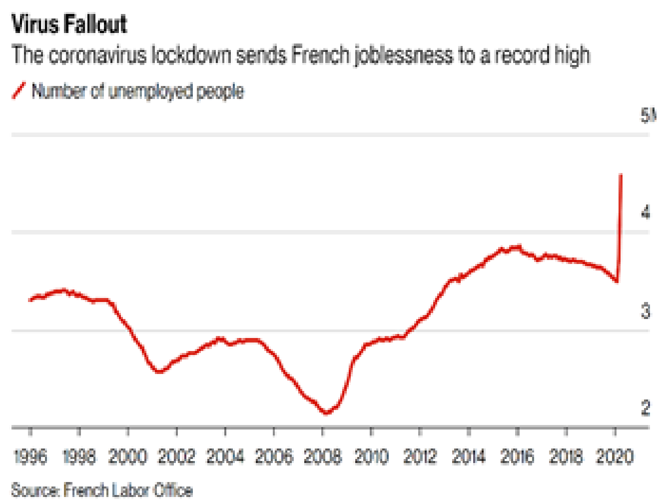

Figure 5: Jobless Claims in France

It is worth mentioning that the unemployment rate by itself is not a reliable way to judge how the economy is performing and how it will perform since it's considered a lagging indicator. This could be a reason why it drives the unemployment rate relatively low for these two countries. Rather, a more accurate indicator would be the jobless claims for unemployment benefits since it exposes the volume of people losing their jobs in the current timeframe. As seen from the two figures above, the number of jobless claims spiked in an unprecedented amount. The UK saw a 70% increase in jobless claims to 2.1 million, while France watched a 23% increase to 4.6 million in 2020. This, however, is considerably much lower than 38.6 million US jobless claims over the pandemic period [4].

Interest rate

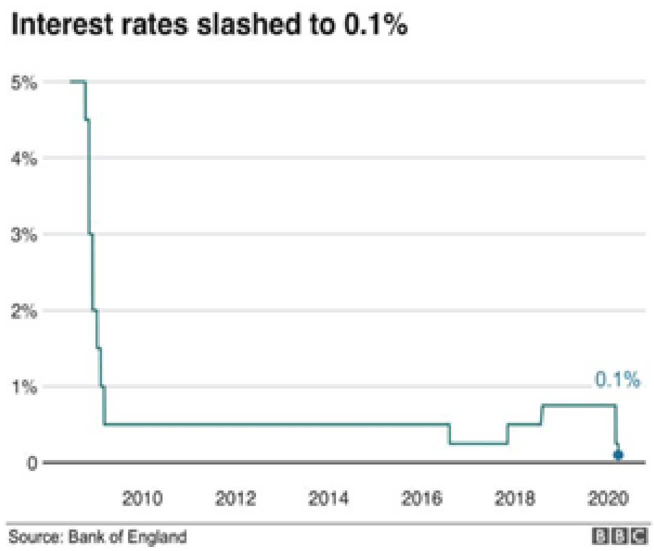

Figure 5: Bank of England cut interest rate to 0.1%

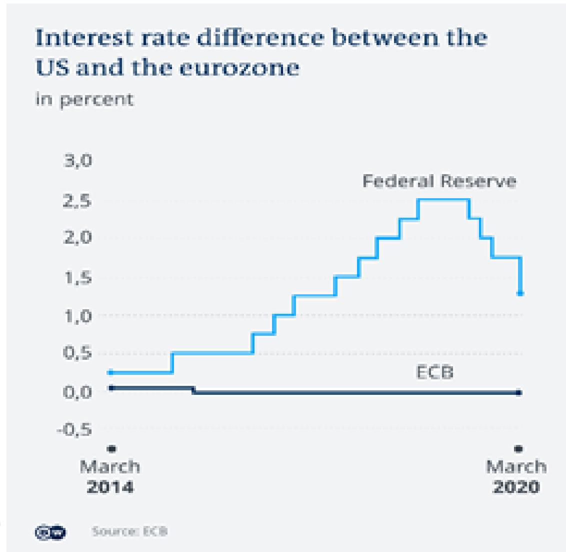

Figure 6: ECB maintains 0% interest rate

The Bank of England has cut down its base rate to 0.1% on 19 March 2020. This stimulus is aimed for small and medium-sized businesses to continue operating given the ease of borrowing with an extremely low-interest rate. This has also affected mortgage payments as people who are in variable-rate mortgages might find their next installment to be cheaper and encourage those who are in a fixed-rate mortgage contract to do remortgaging. Similarly, the European Central Bank has taken some extreme measures as well, or it can be said to be more drastic. Zero or even negative interest rate is implemented to stimulate spending and discourage saving. With the negative interest rate implemented in some countries such as Germany, this means that commercial banks will get paid if they lend money to borrowers. Furthermore, this policy is designed to weaken the euro to provide aid for exporters as well as discouraging imports despite making the euro lower down its value as a currency in the process. In response to profitability complaints from commercial banks, the government has also purchased more assets and bonds issued by corporations to increase the money supply

*base rate: the rate at which commercial banks lend to the public

Industries and Markets Update

An in-depth analysis of the European economy presented by McKinsey shows that 58.8 million jobs across Europe or 26% of employment share are at current risk. Most notably, employees that work in the areas of customer sales and food services are exposed to the highest risk of being furloughed [5]. Moreover, industries in the tertiary sector such as tourism and entertainment are also adversely affected by the pandemic. This poses a huge threat to European countries that heavily relies on tourism such as Italy and Spain, where tourism contributes 13% and 15% to their respective GDP. European airlines' revenue is projected to lose €70 billion this year, while global tourism activity is set to have a 20-30% decline this year [6]. On the other hand, the technology industry and STEM-related field are looking pretty robust or even advantageous to a certain degree, as discussed below.

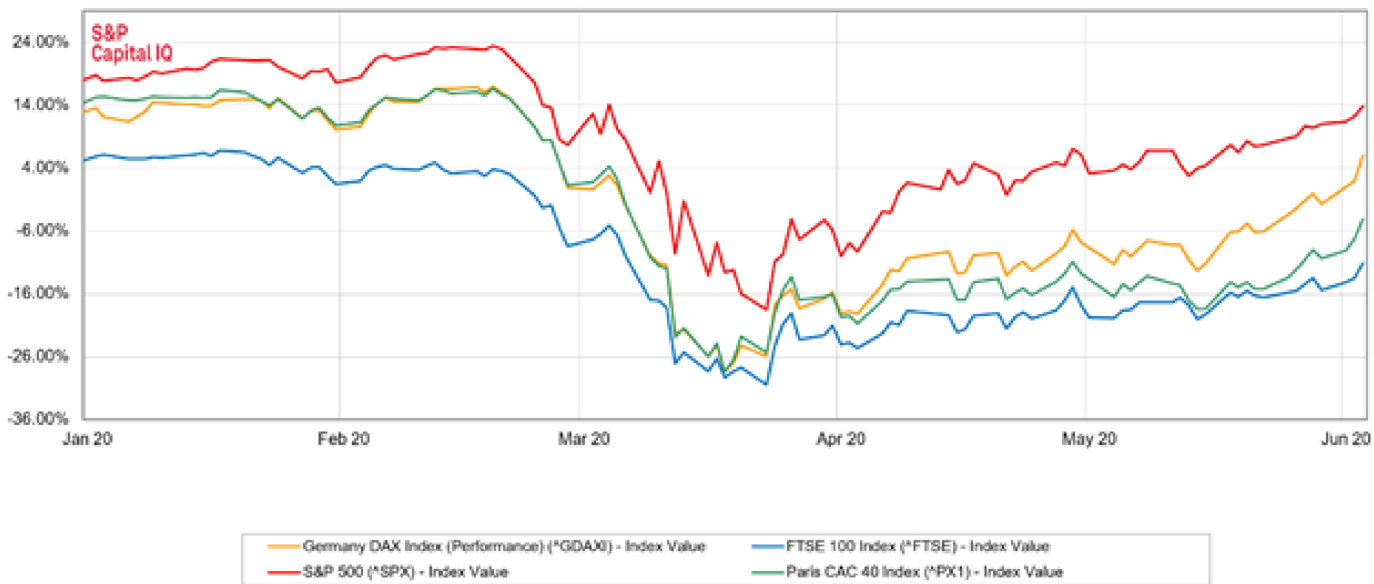

Figure 7: Price Changes Movement of DAX, CAC,, FTSE, and S&P 500 (compared to June '19)

European market indices such as FTSE 100 (London), DAX 30 (Frankfurt), and CAC 40 (Paris) have followed a similar price movement pattern to S&P 500. There has been larger-than-usual volatility throughout the past four months due to uncertainty in the future, and these indices also followed the worldwide crash from late March to mid-April. As seen above, the European indices are more negatively impacted compared to the S&P 500. Dependency on major banks and financial institutions becomes one of the biggest contributors to the index drop. As an example, FTSE 100 fell 3.2% on April 1 after English banks declared to delay their dividend payments. This led to FTSE recording its worst quarter since the 1987 crash [8]. As the European market indices are doing worse than their US counterparts, it is also reflected by the Euro and GBP exchange rates. The Euro and GBP both became weaker against USD during the crash in late March before starting to go back to its pre-pandemic levels [9].

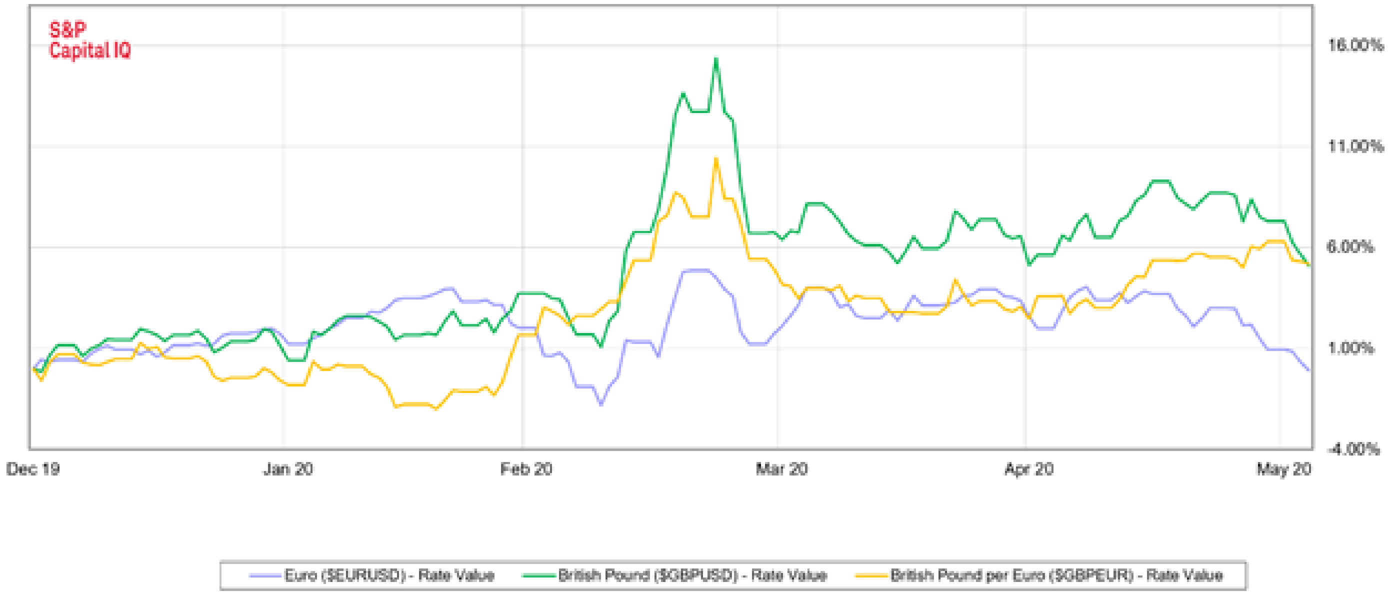

Figure 8: Price Change Movement of FX Prices (EUR, GBP, USD)

Recently, these three market indices have been showing positive trends driven by the improvement of large-cap financial and technology sectors. In general, technology, biotechnology, and pharmaceutical companies have rebounded faster compared to the market during this pandemic. Biotech companies such as GlaxoSmithKline (GSK), AstraZeneca (AZN) and Sanofi (SAN) had their stock price increased by more than 20% since late March. Their race towards developing the COVID-19 vaccine and the support by the additional government fires optimism that propels their stock prices up. Meanwhile, software companies such as Dassault Systemes (DSY) and telecommunication companies such as Vodafone (VOD) had also flourished by more than 25% since late March. On the flip side, airline companies such as Airbus (AIR), Air France - KLM (AF), and had their share price down 50% since January. This might be caused by the prohibition in international and domestic flights, causing the lack of cash inflow and posing possible scenarios of job cuts shortly. As a result, this undermines the usage of natural gas and oil which led to a surplus. Furthermore, the oil futures crash in late April pressed down the revenues and stock prices of energy companies. Royal Dutch Shell (RDSA), they have suffered a 46% decline in net income, forcing them to cut off dividends. British Petroleum (BP) is also expected to cut their dividends after they suffer a £1.29 billion loss in net revenue and a £3 billion loss in their inventories account. However, for some heavy oil importers like Germany, this sounds like good news since they are now able to take advantage of the price drop.

Government Policies

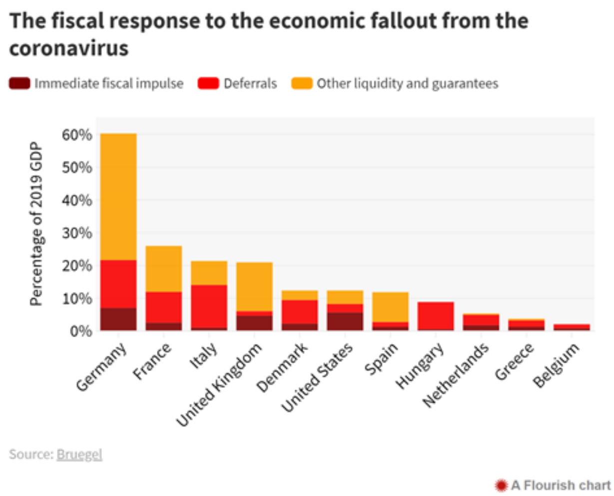

Figure 9: Additional Fiscal Responses Based on GDP Percentage Across European Countries

Germany is reported to undergo a major fiscal impulse where the government needs to change its budget balance as a result of changes in tax policies or expenditures. The major fiscal impulse amounts to $256 billion, 150 billion euros on grants for small businesses affected by the virus, 500 billion euros on tax deferrals, and 1.32 trillion euros in liquidity measures outspending other countries in making expansionary fiscal policies. Besides, new policies such as the reduced value-added tax for restaurants from 19% to 7% have been implemented, and tax deferral for affected households will be granted. Looking from the monetary side, the ECB has also created PELTROs which stands for pandemic emergency longer-term refinancing options to support lending activities. Besides PELTROs, the ECB also announced PEPP, a program that encourages massive purchase of bonds and commercial papers with the value up to $1.5 trillion. This policy is created specifically to encourage borrowing and increase money supply. Thanks to Germany's long growth cycle in the past, there would be no incurring debts that might hinder the government from providing financial stimulus to the economy [10].

Similarly, the UK government has spent over £100 million in providing aid for small businesses and tax cuts on the retail industry, providing additional benefit for self-employed and unemployed with $1200 per individual for a year, as well as issuing £250 billion worth of bonds. In terms of monetary policy, besides cutting interest to 0.1%, the government also launched a program called TFSME where the Bank of England encourages commercial banks to loan money to small and medium-sized firms with an additional incentive. Also, the government launched CCFF that allows them to purchase commercial papers for 12 months with no stated limit. Furthermore, the Bank of England also made a statement that they would lend directly to the government if they failed to meet the fiscal requirements. Consequently, this will push the UK budget deficit up to 260 billion pounds, an abnormal figure unlike anything before.

On the other hand, France follows the ECB policy which is similar to Germany's approach. From the fiscal side, the French government also made some adjustments such as postponing business tax filing until June 30, providing $323 billion for business loan guarantees, unemployment benefits, $8.7 billion increased expenditure on the healthcare system, and bailouts for businesses [11].

Conclusion

Analysts and economists are estimating an economic recession that lasts until the end of 2020 while trying to devise the best plans to hedge the risks. However, much of it will depend on the length of the pandemic, the efficiency of government responses, and the true impact of the socio-economic landscape in Europe. As businesses begin to re-open and the financial markets are back on track, many predict that the economy should start transitioning uphill. Nevertheless, with the heightened uncertainty and rapid changes every day, the short-term economic outlook will likely be shaky and unpredictable.

[1] http://www.xinhuanet.com/english/2020-04/30/c_139021637.htm#:~:text=France%20GDP%20down%20by%205.8%20pct,2020%2C%20sharpest%20fall%20since%201949&text=%22GDP's%20negative%20evolution%20in%20Q1,national%20statistics%20institute%20Insee%20said.
[2] http://www.xinhuanet.com/english/2020-05/15/c_139059975.htm#:~:text=However%2C%20government%20consumption%20expenditure%20and,GDP%20decrease%2C%22%20Destatis%20noted.
[3] https://www.cnbc.com/2020/05/13/uk-economy-shrinks-by-2percent-in-the-first-quarter-as-coronavirus-lockdowns-begin-to-take-toll.html
[4] https://www.theguardian.com/business/2020/may/19/uk-jobless-april-coronavirus-crisis-unemployment-benefits
[5] https://www.mckinsey.com/industries/public-sector/our-insights/covid-19-in-the-united-kingdom-assessing-jobs-at-risk-and-the-impact-on-people-and-places
[6] https://www.euronews.com/2020/04/16/coronavirus-in-europe-tourism-sector-hardest-hit-by-covid-19
[7] https://www.marketwatch.com/story/european-stocks-slide-as-fears-over-lasting-coronavirus-hit-to-economies-rise-2020-05-13
[8] https://www.reuters.com/article/britain-stocks/ftse-100-slumps-as-banks-hit-by-dividend-halt-idUSL4N2BP1UZ
[9] https://www.chroniclelive.co.uk/special-features/pound-euro-exchange-war-impact-18217292
[10] https://www.cnbc.com/2020/04/20/coronavirus-germany-vastly-outspends-others-in-stimulus.html
[11] https://www.dw.com/en/ecb-shifts-into-crisis-mode-as-coronavirus-bites-eurozone-economy/a-52736953

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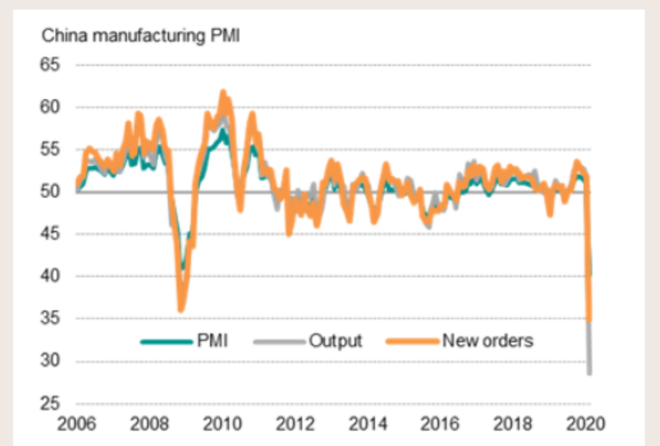
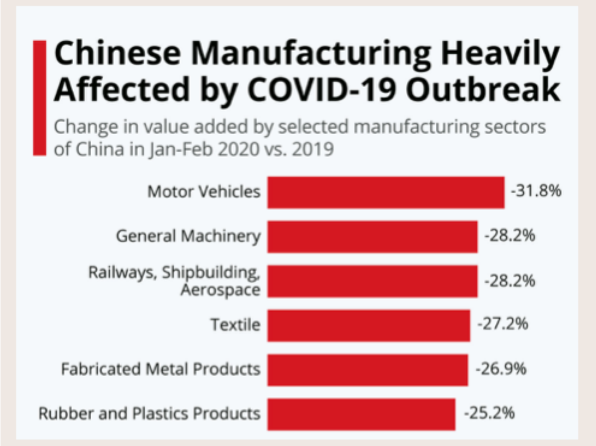
The severity of the impact of Covid-19 on the Chinese economy

By Johnson Shih, Market Research Analyst

The COVID-19 outbreak started in Wuhan has become a global pandemic, and it has severely weakened China's first quarter economic performance. This newsletter introduces and analyzes how the pandemic has impacted the Chinese's economy in retail, manufacturing, and the housing markets. It will also analyze the effectiveness of the stimulus policies imposed by the Chinese government.

Manufacturing:





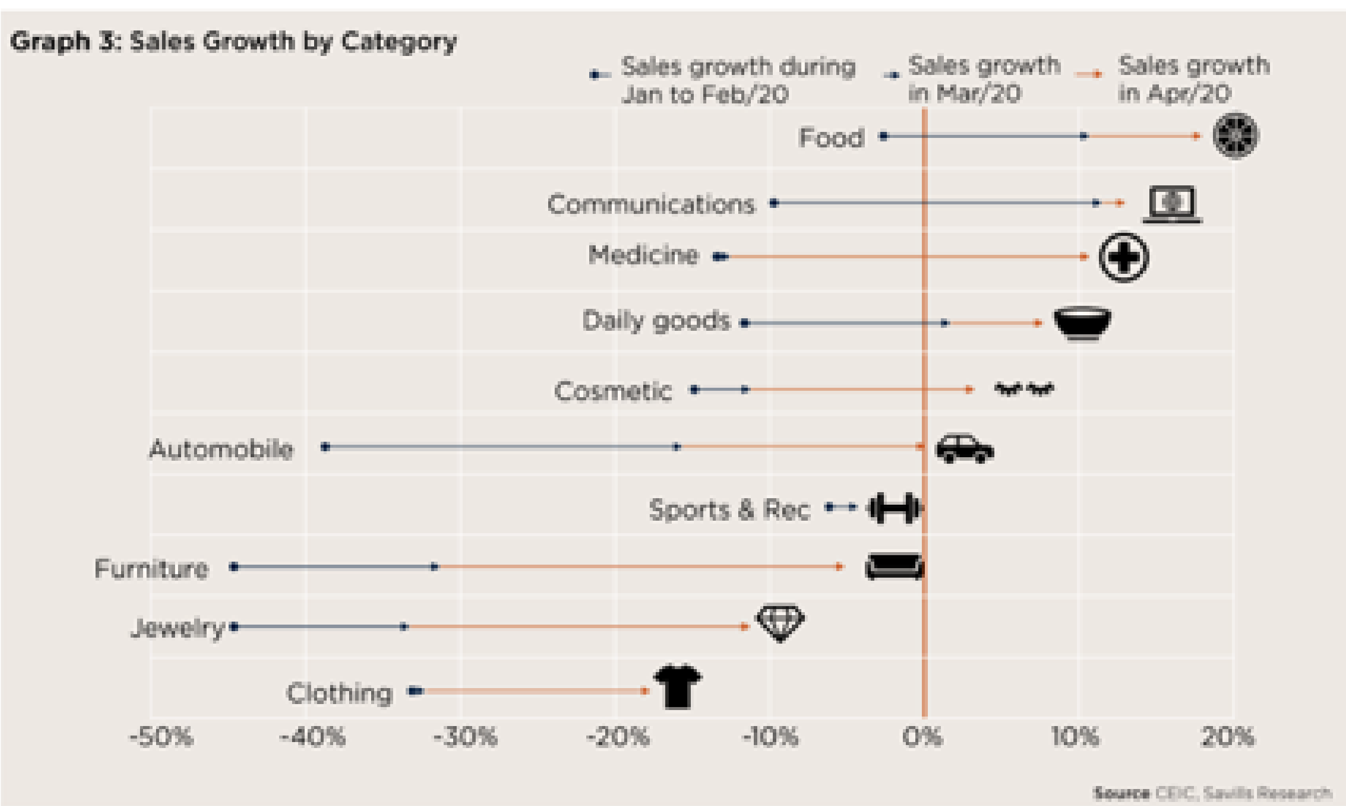
The outbreak of the epidemic has caused Chinese manufacturing companies to face pressures such as tight cash flow, interrupted supply chains, and a general decline in market supply and demand.

Most companies expect revenue will decline significantly in the first half of the year 2020. One-third of the corporates' cash flow tolerance period is less than one month. Employee salaries, loan repayments, and rental expenditures are the main cost pressures for the operation of the enterprise. For small and medium-sized companies, wages become the biggest cost burden, while large corporations are more resilient. However, if the impact of the epidemic continues to spread in the second half of the year in 2020, measures such as staff reductions and salary cuts will be taken to ease the cost pressure.

In particular, the manufacturing industry is an industry with a high degree of globalization and subdivision of the supply chain, such as automobile manufacturing and the textile industry, they are severely affected by the interruption of the supply chain. For example, China is an important source of raw materials for the Southeast Asian textile industry, and the epidemic has a huge impact on raw material procurement in the Southeast Asian textile industry. Foreign investment in Chinese enterprises is also significantly affected due to the high degree of globalization of their business models. According to the analysis of the American Chamber of Commerce in China, 47% of its enterprise members are facing the disruption of China's local supply chain or global supply chain. But this situation will be relieved as we expect a partial resumption of global supply production in the second half of the year.

On the other hand, Low market demand is the most critical problem during production resumption. Manufacturing companies generally faced with the problem of decreasing sales in the market, the original orders have been delayed or canceled, and new orders cannot be obtained in the short term. With the advancement of resumption of production, production problems can be solved, but market sales and order problems will become more prominent.

Retail

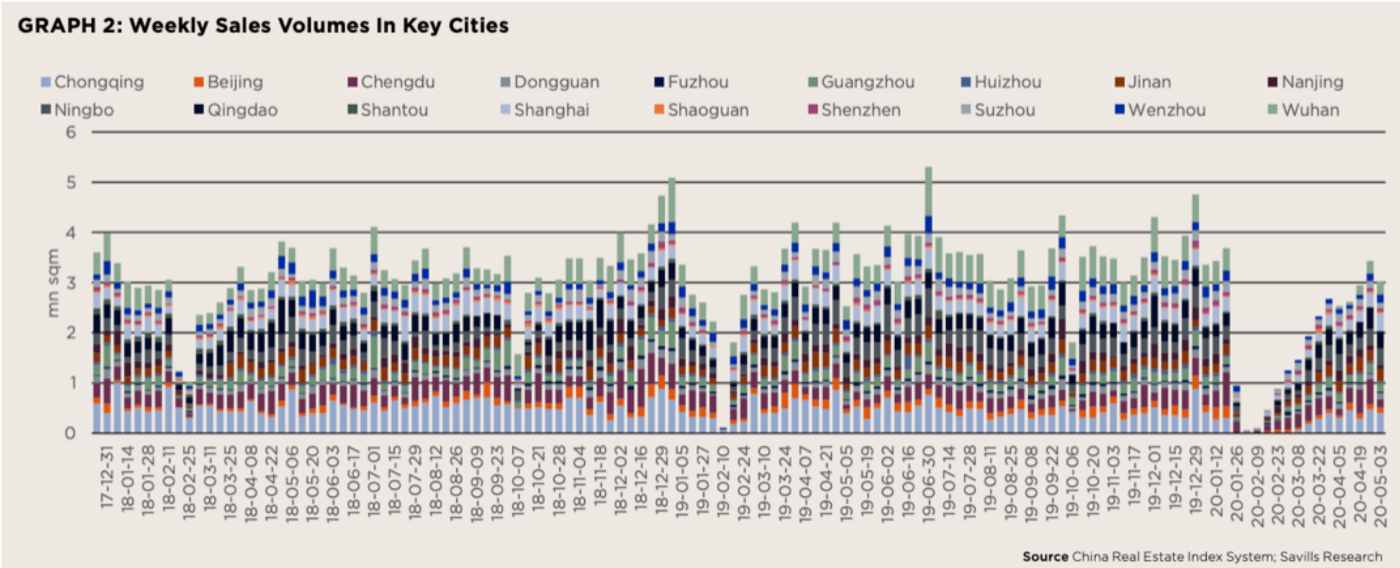


In Q1 2020:

Among the tertiary industries, tourism and catering are the most severely affected. According to estimates by the China Tourism Research Institute, it is expected that in the first quarter of 2020 and the whole year, domestic tourist arrivals will be declined by 56% and 15.5% respectively, a year-on-year decrease of 932 million visits; The income was reduced by 1.18 trillion yuan; the number of outbound tourist visits in the first quarter and the whole year decline by 42.6% and 17.6%, respectively, and the year-on-year decrease was 27.63 million visits. Meituan, one of the largest enterprises in China, its industry research report showed that 72.5% of catering chains said the losses were significant. 90% of catering merchants face a shortage of funds.

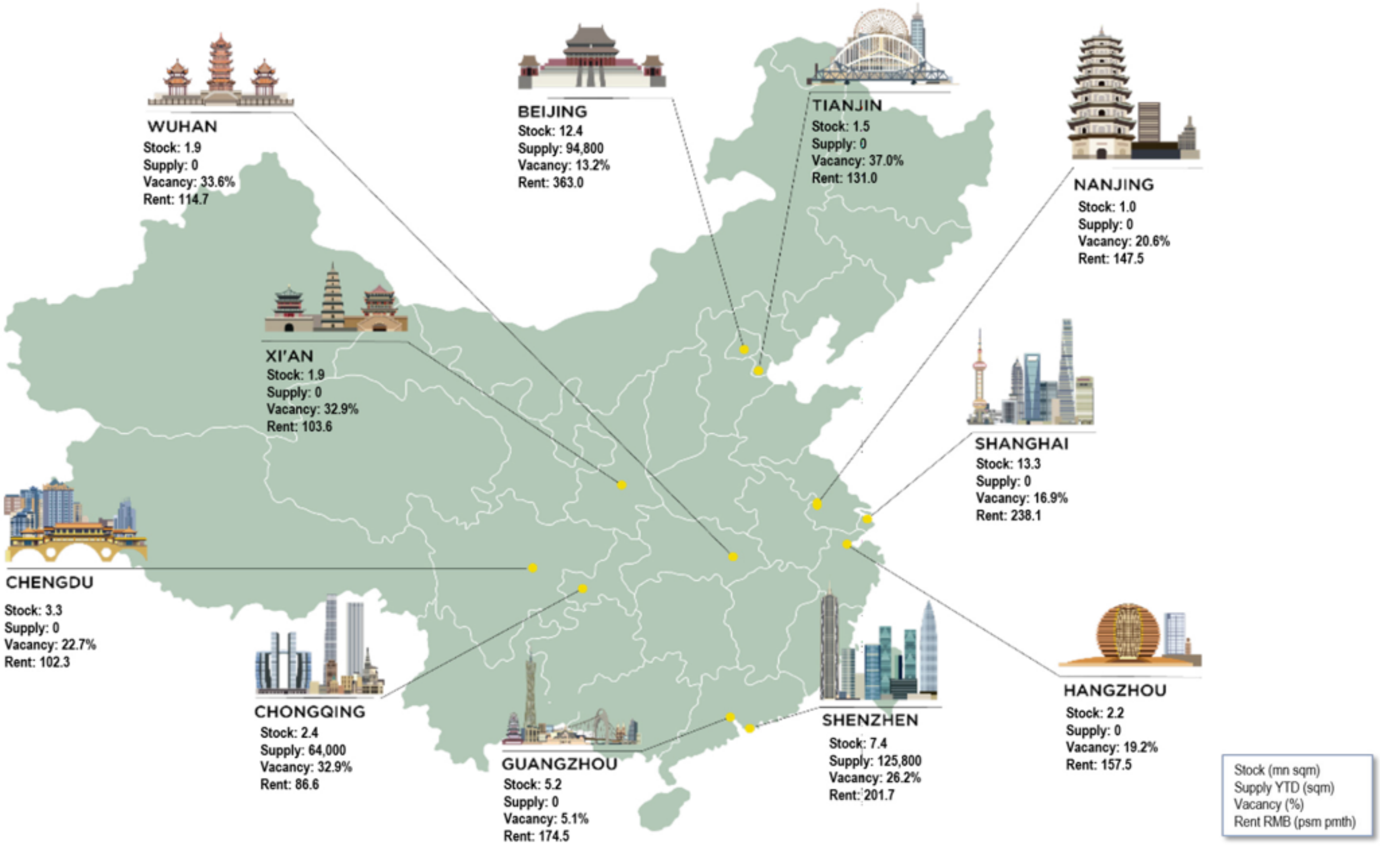
During this period, the digital economy accelerated during the epidemic. Weizhong Bank produced the public opinion indexes for online applications and industries, reflecting the industry's prosperity and development trend. Through calculation, it is found that online office, online education and online games have increased significantly, reaching 537%, 169% and 124% respectively in growth. Clearly COVID-19 has accelerated the online process of the retail industry in China, and there will be more retailers using digital platforms for promotion and sales. Although digitalization will eliminate retailers who cannot be transformed in time, digital transformation also brings many job opportunities, such as live sales, online stores, digital publicity and so on. Most companies have taken measures to actively respond to the impact of COVID-19 to the offline markets, such as reposition marketing strategies, promote online transformation, expand sales channels, use the Internet, artificial intelligence and other new technologies, upgrade product services; the promotion of the online industry unleashed tremendous development potential.

Housing Market



The retail property market was most significantly affected by the epidemic, and shopping malls have shortened their business hours during the Spring Festival. Some merchants have also taken measures to close stores. For example, In China, Starbucks has temporarily closed more than half of the stores in the country in response to the epidemic. IKEA announced that all its stores in the country will be suspended. Apple also announced to close all stores during the period. The impact of the epidemic on the flow of people and turnover in physical shopping malls in the short term is disrupted. The impact of family outings and the reduction of non-essential items expenditure on merchants in the entertainment, catering and apparel formats will be more obvious. After the outbreak, many shopping center owners have implemented measures to reduce the rents of merchants in stages. CBRE, an American real estate service and investment firm, believes that this move expects to reduce the pressure on retailers for a period of time thereafter. CBRE believes that the epidemic will not have a serious impact on the occupancy rate of existing malls, but the new malls may delay the opening and provide more flexible investment promotion terms. Therefore, the impact of the epidemic on the retail property market in major cities outside Wuhan is relatively insignificant.

GRAPH 1: State Of The Office Market, Q1/2020



Source Savills Research

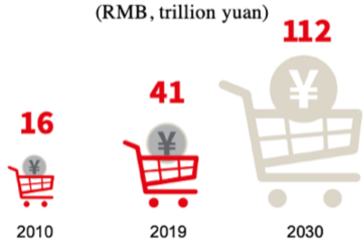
The threat of the epidemic is also expected to hinder business activities and lead to a slowdown in the office leasing market in the first quarter of this year. Corporate capital expenditure plans may be postponed, especially for tenants in more affected industries such as catering, retail and transportation. In the long run, this new coronavirus outbreak may prompt more tenants and owners to pay more attention to flexible office, property management, office environment and employee well-being.

Figure 21: Logistics vacancy rates

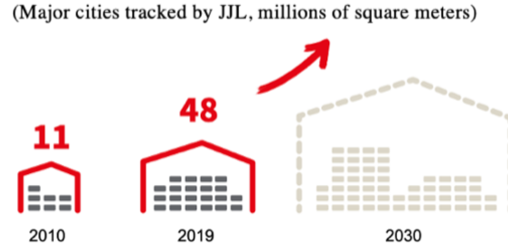
City Tier	2018	2019	2020F
Tier I Cities	6.8%	5.7%	7.1%
Tier II Cities	10.3%	15.7%	19.4%
China Overall	9.0%	12.6%	15.8%

Source: CBRE Research, February 2020

Total annual retail sales of consumer goods in China's (RMB, trillion yuan)



Actual leased area of China's high-tier warehouse (Major cities tracked by JJL, millions of square meters)



On the other hand, CBRE believes that, given that e-commerce is the main driver of demand for warehousing properties, COVID-19 has limited impact on the market as.
In the short term, the reduction of unnecessary business activities such as meetings and travel will slow down real estate investment activities. However, the probability of further monetary easing and lower interest rates has increased, which will provide some support for asset prices. In view of the impact of real estate sales, developers and owners with excessive leverage may face cash flow challenges, and 2020 will still be a good time for real estate debt investment. Given the current macroeconomic and market uncertainties, investors are suggested to only invest in high-quality assets that provide stable income cash flow.

Fiscal Support

Since the outbreak, the Chinese government has quickly issued a number of policies to support enterprises to deal with the impact, mainly including the following five categories

#	Stimulus Type	COVID-19 Stimulus Policies
1.	Financial support	Encourage relevant departments to provide preferential loans to small and micro enterprises, loan extension, lower loan interest rates, etc.
2.	Tax discount	Exemption, reduction of VAT, etc.
3.	Support for resumption of production	Flexible arrangement of working hours, exemption, reduction of social insurance fees, etc.
4.	Service optimization	Carry out free skills training, simplify various procedures, extend the tax declaration deadline, etc.
5.	Costs reduction	Preferential electricity prices, natural gas prices, a temporary withdrawal of travel service warranty, etc.

Enterprises generally report that social insurance, housing provident funds, electricity fee, rent, and other relief policies are the most helpful. According to the information released by the Ministry of Human Resources and Social Security and the National Medical Security Bureau, the current pension, unemployment, industrial injury insurance, and medical insurance reduction policies combined can reduce the burden of enterprises by more than 650 billion yuan. The policies of resuming production and optimizing services issued by various provinces and cities have also greatly helped enterprises. During the epidemic situation, stricter anti-epidemic policies such as 14-day quarantine and other places were superimposed on the suspension of train flights, and manufacturing enterprises faced difficulties in employment. Local governments have successively issued supporting policies to help enterprises solve problems by coordinating the resumption of special trains, providing travel expenses subsidies, and simplifying employee resumption procedures.

For example, the voluntary city government came forward to help local enterprises to recruit workers, resumed specifically arranged trains to transport workers to their posts, fully subsidized companies to charter employees, and granted self-return employees with subsidies.

With the support of relevant policies, some SMEs still face financing difficulties. The current fiscal policy is more of an advocate. The government encourages relevant institutions to help small and medium-sized enterprises overcome difficulties through deferred repayment of interest and preferential loans. However, the actual implementation did not achieve the expected results. Out of consideration for their own risk control, commercial banks tend to choose companies with better fundamentals to provide preferential loans. Therefore, small and medium-sized enterprises that are truly faced with difficulties in capital flow still have difficulty in obtaining loans. The implementation of fiscal policies is subject to adjustment for the Chinese government.

The special support policies for severely hit industries have a significant effect. Take the tourism industry as an example. At present, the tourism business is stagnant, and refunds have caused huge liquidity pressure on these enterprises. In response to these wars, the tourism industry has issued key support policies such as temporarily refunding 80% of the current payment of tourism service quality deposits 27 to travel agencies and extending the maximum loss carry-over period. Among them, the amount of refunded travel service quality deposit can reach 8 billion yuan, and each travel agency can get about 200,000 yuan on average, which has a significant effect on alleviating the pressure on the cash flow of travel agencies

In summary, Chinese enterprises, industries, and China’s economic development confidence index are relatively high, and the prospects for global economic development are facing greater uncertainty due to the pandemic. On the whole, China ’s economic development trend remains unchanged, and the risk of global economic recession is increasing. However, the spread of the epidemic in other countries and trading partners may have a complex impact on the Chinese economy. The downward pressure is mainly due to shrinking global demand, slowing or stagnation of global value chain production, and multinational companies moving production out of China (not necessarily based solely on the impact of the epidemic).

[1] https://pdf.savills.asia/selected-international-research/2020-covid-19-office-en.pdf
[2] https://pdf.savills.asia/selected-international-research/2020-covid-19-residential-en.pdf
[3] https://pdf.savills.asia/selected-international-research/2020-covid-19-retail-en.pdf
[4] https://www.joneslanglasalle.com.cn/content/dam/jll-com/documents/pdf/research/apac/china/jll-order-delivered-china-logistics-property-decade-ahead-cn.pdf
[5]https://www.statista.com/chart/21171/coronavirus-impact-on-chinese-manufacturing-output/

MAY 2020

Canada and Covid-19: what it means going forward

By Simon Wei, Market Research Analyst

The Coronavirus has impacted not only the Canadian economy but the entire world. Our current situation is unprecedented and world leaders are doing their best to support their citizens, businesses and investments in harsh times like this.

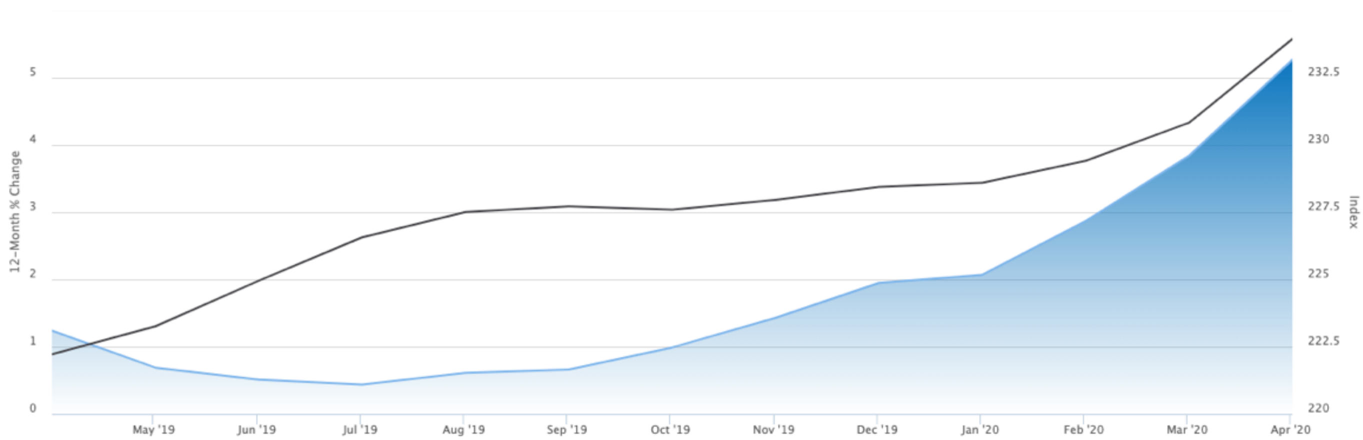
There are currently more than 6 million confirmed cases of Covid in the world with roughly 380 thousand deaths. Canada has contributed approximately 94 thousand cases and 7 thousand deaths to the total numbers. These numbers may seem small at first but in fact Canada has surpassed China's official numbers – the originating country of the virus.

Through this article we will show you the impacts that the Coronavirus has presented in Canada. Specifically, we will dive deeper in Real Estate, Retail and the Fiscal Stimulus Package. On January 27th, 2020, Canada had its first confirmed case of the Coronavirus. Since then we have snowballed to a large sample of confirmed cases; finally brought us to practise social distancing, self-isolation and many more safety guidelines. We hope the information on how Covid has impacted Canada is informative and the statistics we provide will help you gauge the severity of the Covid induced depression.

Real Estate:

Canada is home to some of the world's most expensive cities to live. We have Montreal ranked 25th, Toronto ranked 12th and Vancouver ranked 4th [1]. The housing market in these major cities have skyrocketed in recent years with new injected investments and a strong foreign interest.

As commonly known, Covid-19 has caused a massive halt in our global economy and we would assume that it has leaked into Canada's housing markets with decreased demands. From simple microeconomics, with decreased quantity demand we should expect a decrease in price if quantity supplied stayed the same. However, that is not necessarily the case here in Canada. Home prices are in fact holding up during the coronavirus pandemic despite lockdowns [2]. From the first confirmed case back in January to the end of April, the Teranent-National Composite House Price Index has increased by 2.3% (seen on the graph below) [3]. The Teranet-National Bank House Price Index is an index comprising of 11 metropolitan markets spanning from the west coast to the east coast covering most major cities. It is truly astonishing that home prices have not decreased due to Covid, but analysts acknowledge prices could fall in months ahead when the economy reopens into a recession [2].



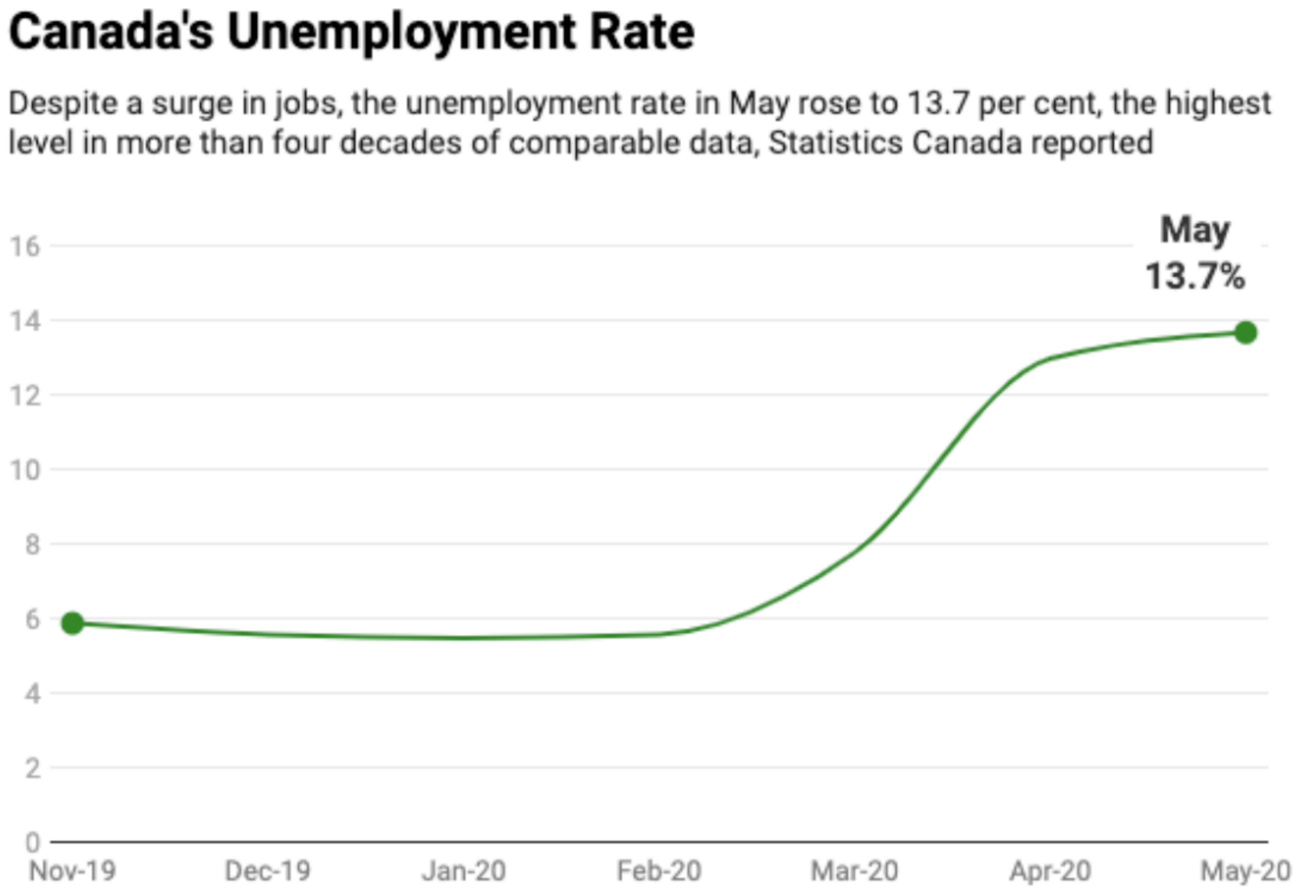
As for the month of March where Covid-19 became a global outbreak – a pandemic – the Greater Toronto Area saw a fall in home prices by 11% from earlier that year. In addition, the price for GTA renters were also down for the month, falling 2.7% for a one-bedroom unit and 4.1% for a two-bedroom. In the contrary, Vancouver reported that their composite price benchmark index was up 0.2% from March. However, the number of sales was at an all-time low of 62.7% below their 10-year average [4]. As you can see, housing markets vary from city to city and the severity of Covid impacting the targeted population. Nonetheless, we will soon see housing prices "sag" in cohesion with a decrease in income as the economy will be in a recession [4].

As of late, housing markets has picked up leverage, we can observe what is happening in the month of May in Toronto's and Vancouver's real estate market and their statistics on sales. In Toronto, 4,606 properties have exchanged hands, which is 53.7% lower when compared to May 2019 [5]. In comparison to last month (April), there has been a 55.2% increase in sales which a good sign showing potential hope and rebound of Toronto's housing market [5].

In addition, housing prices have gained by 3% when comparing to May 2019 – making the average price of a home to be $863,599. Providing we see a gradual re-opening of the economy; we will be able to slowly see an increase in home sales. There is a similar story in Vancouver where for the month of May 1,485 homes were sold, when compared to last year, that is a 43.7% decline [5]. Just like Toronto, sales have also risen in comparison to April, Vancouver home sales were up 33.9% month-over-month. Lastly, the average price of a home was up 2.9% compared to May 2019, making the average price of a home in Vancouver to be $1,029,400 [5]. As you can see, the overall market condition of real estate in Canada has not been too largely affected by the Coronavirus and has since picked up a bit of traction to recover and soar greater.

Retail:

The Canadian retail sector was striving from all angles in 2019. Forecasting 2020 was easy, expectations of a 5% rise in retail sales was even considered conservative. Employment was reaching highs of 62%, unemployment was at a 45-year low of 5.7% and labour market tightness was fuelling wage gains of above 4% – twice the rate of inflation [6]. The main hurdle for the coming year was predicted to be the rise in household debt levels, Canadian's debt-to-income ratio was above 170% [6]. The booming retail sector would come to a dead stop when the Coronavirus spread from China to Europe, North America and the rest of the world. As a result, a majority of retailers reduced their hours or closed down, self-isolations decreased consumer demand for all but essential goods. Unemployment rate nearly tripled, it has hit record highs of 13.7% across Canada [7]. The reality is that Canada's economy will contract by around 20% annualized in the second quarter. The National unemployment rate has more than doubled and a majority of the population facing mass layoffs will be on non-essential retailers.



It is not surprising that consumer confidence posted its largest decline on record in March. This will clearly result in a contraction of the Canadian retail space drastically in the second quarter of 2020 [6]. We have not yet experienced this level of economic turmoil since the great depression. The major issue in the retail space is consumer confidence, it will depend on the severity of flattening the curve and observing the duration of self-isolation. With the Bank of Canada implementing expansionary monetary policies such as decreasing interest rates should result in Canadians borrowing more, thus spending more. However, this will most likely not be the case due to the lack of consumer confidence. Currently, many purchases and orders are put on hold, once containment is lifted there should be a surge in demand and a strong rebound will occur.

With Covid-19 being an unforeseen black swan event, the retail sector in Canada will be hit hard; however, consumers and the economy will eventually emerge positively. The duration of the virus driven recession is unknown, it is difficult to gauge the timeline and how smoothly the economy will re-open. Nonetheless, the retail sector will not go under and absorb the hit, rising from the recession.

Fiscal Stimulus:

To combat the negative effects of Covid on the Canadian economy, the federal government has responded with a. large-scale economic stimulus package equal to 4% of GDP. This package will hopefully address the negative shock to personal income and to business cash flows & balance sheets. In addition, there was also a 10% wage subsidy announced for small businesses [6]. As for numbers, the package includes 27 billion in direct support for consumers and businesses. It also provides 55 billion to enable the deferral of tax payments from firms and individuals as well as liquidity support for business [8]. The total fiscal stimulus package is approximately 82 billion – roughly 4% GDP as mentioned earlier.
The stimulus package has been more than expected; however, they will not be able to offset the extent of the economic weakness that is expected in the second fiscal quarter. Nonetheless, it will still be extremely beneficial in supporting the economic contraction and helping it stabilize. The fiscal measures are accurately impacting the right areas of the economy. Our major area of concern is specifically personal income and business liquidity (cash flows and balance sheets). In a period of social distancing, lower business revenues, and weak global demand; disposable income is becoming scarcer, consumer confidence has weakened, and sales have dropped for non-essential goods. With the stimulus focusing on improving and dampening the impacts in the areas mentioned, we believe the government has effectively targeted the key focal points and is working on supporting it.

Lastly, the government has launched the Canadian Emergency Response Benefit (CERB) which gives financial support to employed and self-employed Canadians who are directly affected by Covid-19. If an individual is eligible, they can receive $2,000 for a 4-week period (the same as $500 a week) [9]. The entire benefit is roughly estimated to be 10 billion dollars given to Canadians in need. Although the government has not yet targeted specific sectors, they are in talks with industry leaders and stakeholders from all sectors – working together to potentially bring another stimulus package targeting key sectors in coming weeks.

The overall Canadian economy is expected to have a 4-5 percent contraction in 2020[10]. The policy and reopening of business cannot stop the economic pain that was endured in the first 2 quarters of the year.

There is still enormous uncertainty on the future since the world is still heavily affected by the coronavirus. Given the magnitude of the initial contraction in the economy, it is highly likely that any ease in containment will cause a rebound in growth [10]. However, after that initial surge, the pace of growth is likely to be slow and the climb out of the economic recession seems to be hard – especially with the oil industry taking such a large hit [10]. The forecast for the future will certainly be volatile in both economic and financial conditions.

[1] https://www.thestar.com/news/gta/2019/04/17/toronto-has-the-worlds-12th-most-expensive-housing-market-report-says.html#:~:text=Toronto%20came%2012th%20in%20a,the%20three%20most%20expensive%20cities.
[2] https://ca.finance.yahoo.com/news/real-estate-resilient-during-covid-19-but-cmhc-warns-about-debts-effect-191940957.html
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[6] https://www2.deloitte.com/content/dam/Deloitte/ca/Documents/finance/ca-en-covid-19-voice-of-canadians-and-impact-to-retailers-aoda.pdf
[7] https://www.ctvnews.ca/business/canada-s-jobless-rate-hits-record-high-13-7-per-cent-1.4970589#:~:text=Employment%20in%20Canada&text=A%20quick%20look%20at%20Canada's,%3A%2052.9%20per%20cent%20(52.1)
[8] https://www2.deloitte.com/ca/en/blog/economic-insights/2020/e-insight-snapshot-canada-deploys-large-fiscal-stimulus.html
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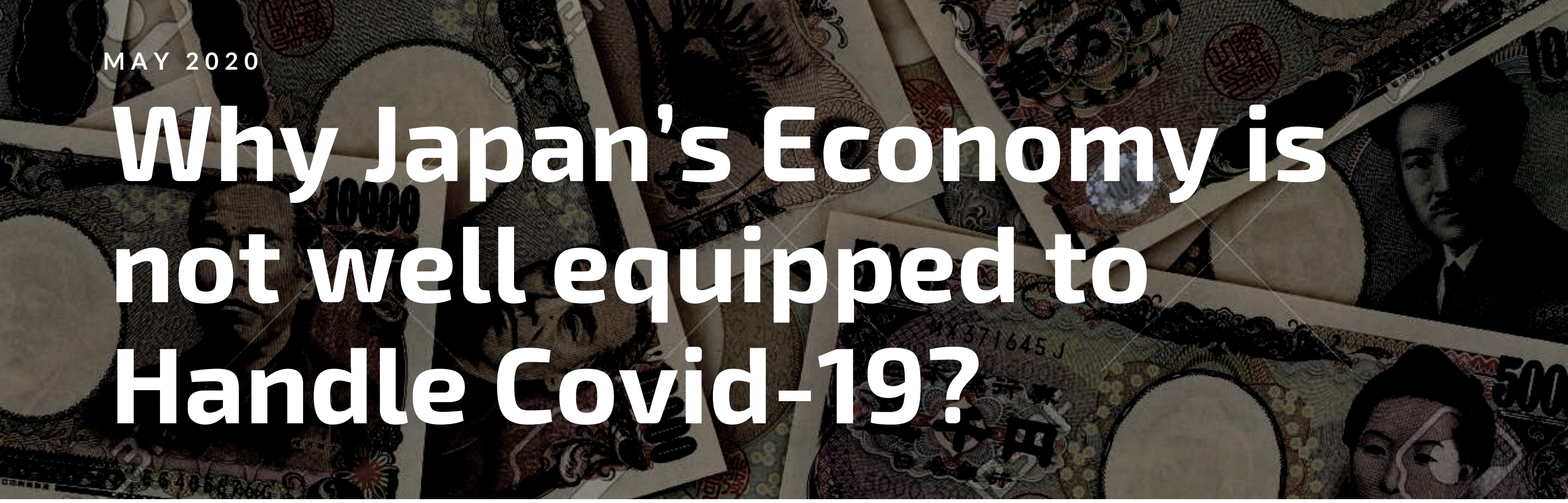
[10] https://www2.deloitte.com/us/en/insights/economy/americas/canada-economic-outlook.html



MAY 2020

Why Japan's Economy is not well equipped to Handle Covid-19?

By Matthew Unrau, Market Research Analyst

The Covid-19 pandemic has quickly cut international and domestic trade, manufacturing, and services provided to consumers. As of June 5, 2020, the virus has infected a confirmed 6.42 million people worldwide and has resulted in around 239 thousand deaths. However, the small island nation of Japan has been seemingly untouched by this global pandemic health-wise. Despite having a population of 126 million people, good enough for 11th in the world, Japan has only contracted 17, 064 cases resulting in only 907 deaths, according to the latest data. However, Japan's economy has been taking the punishment so far, as the government struggles to provide enough stimulus for the already weakening economy.

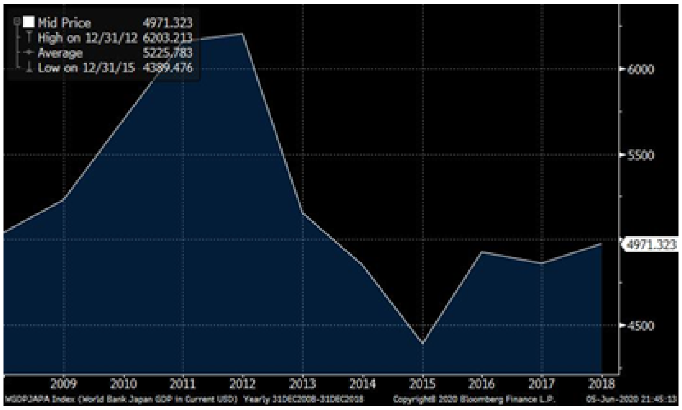


Figure 1: Japan's Total GDP from 2008-2018
Source: Bloomberg Terminal

To begin let's look at some of the underlying factors behind Japan's economy. First, Japan has both an aging and shrinking population. They will need living assistance and able bodies to replace them in the workforce in the coming years. In terms of imports and exports, the country imports food and natural resources because of the geographical features of the country. Japan's main export is vehicles, which produced 5.18 million units in 2019 [1].

In recent years, Japan's Gross Domestic Product (GDP) has flattened and contracted as shown in the graph above including a 7.1% contraction in the last quarter of 2019 [2]. The GDP of a country is the total value of the goods and services produced by that country in a specific period. It is calculated quarterly, but the government reports estimates quarterly [3]. Japan's GDP has shrunk due to a rising Debt-to-GDP which now sits at 236%. The Debt-to-GDP ratio measures the country's public debt to its GDP, basically what it owes to what it produces. A high Debt-to-GDP ratio increases the default risk and lenders may seek higher interest rates or not lend at all. A study by the World Bank found that if Debt-to-GDP ratio of 77% for an extended period, it slows economic growth, as the country needs to focus on lowering it so it doesn't default on the debt and send its market plummeting [4]. Japan's Debt-to-GDP ratio has been above 77% since it started being recorded in 2003, according to Bloomberg Terminal. Japan's GDP has also decreased due to a sales tax rise in October 2019, which triggered the last GDP fall in 2014, Typhoon Hagibis, and now the Coronavirus leading analysts to predict another fall in 2019 [5]. If we can predict what will happen to the GDP in future quarters, we may be able to predict the direction the markets will swing.

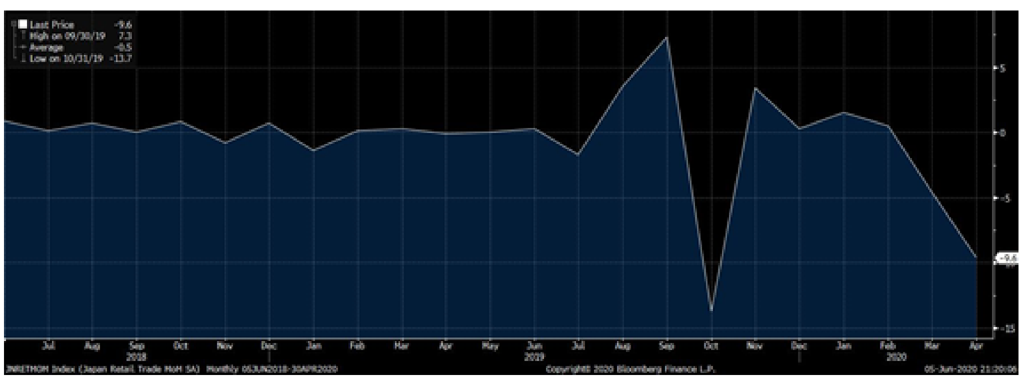


Figure 2: Japan's Retail Sales M/M from June 2018 to April 2020
Source: Bloomberg Terminal

A key component of a country's GDP is consumer spending. If the country's citizens spend more money, the country's GDP will increase. Consumer spending can be expressed in retail sales. The graph above shows Japan's retail sales MoM from June 2018 to April 2020. Month over Month (MoM) just means that a month's data point is the percentage change from the previous month. An entry above zero implies an increase in retail sales, and one below zero implies a decrease. An entry at zero indicates no change. Japan's retail sales had been staying consistent up until it rose by 4% in August 2019 and 7% in September. However, due to the sales tax increase in October, sales fell by almost 15%. After stabilizing at that level retail sales sank 5% in March and 9.6% in April, notably when the consensus estimate was an increase of 1.1%.

This clearly shows that consumers are still not optimistic about the economy and not spending as much money on retail transactions shrinking the GDP. The graph below shows Consumer Confidence in Japan from 2008 to 2020. The consumer confidence index is a survey that measures consumer's views on prevailing market conditions based on their expected financial situation [6]. The graph demonstrates that consumer confidence is lower now than that of the Financial Crisis in 2009. This is a clear indication that consumers do not feel good about the current market and are not expected to spend and stimulate the economy.

Figure 3: Japan Consumer Confidence from 2008 to 2020
Source: Bloomberg Terminal

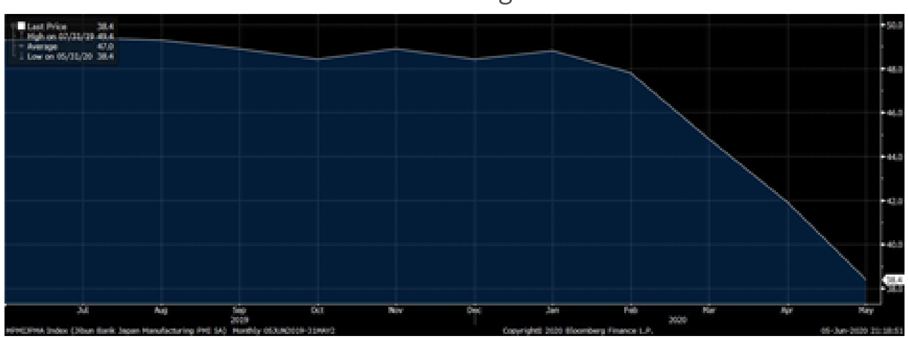


Figure 4: Japan's Housing Starts from 2014 to 2020
Source: Bloomberg Terminal

Another sector that affects GDP is construction. The housing market has a large impact on this sector. The graph above shows the new housing start-ups each month. This measures the number of new residential construction projects that begin in the month. In a strong economy, people have more money to spend and are more likely to buy real estate. The opposite is true for a weak economy [7]. In the graph above we see that housing starts had dipped before coronavirus, but surprisingly recovered for February and March, before plummeting in April. This shows that consumers were still purchasing homes during the pandemic, but recently have stopped and may continue to do so. This will also shrink the GDP and cause the markets to fall.

Figure 5: Japan's Services PMI from May 2019 to May 2020
Source: Bloomberg Terminal

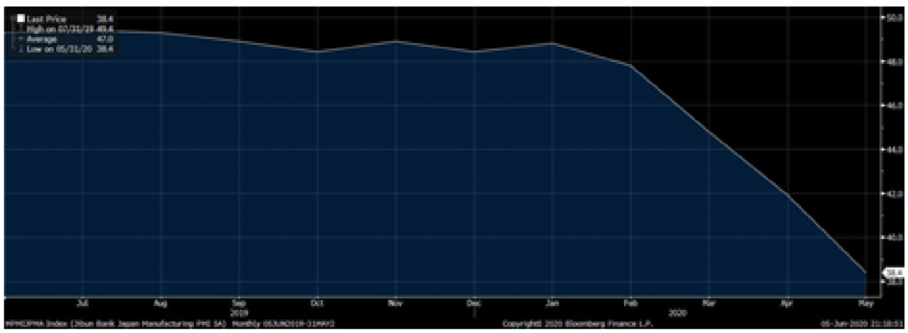


Figure 6: Japan's Manufacturing PMI from May 2019 to May 2020
Source Bloomberg Terminal

The two graphs above exhibit the Purchasing Manager's Index (PMI) for both the Manufacturing and Services sectors of Japan. It is based on a monthly survey sent to senior executives of companies to summarizes whether they believe that the market conditions are expanding, contracting or staying the same. It is based on five major eras; new orders, inventory levels, production, supplier deliveries, and employment. An entry of over 50 points indicates expansion, while one lower indicates contraction. Looking at the Manufacturing PMI graph above, senior executives viewed Japan's market conditions as contracting for the past year indicated by the sub-50 PMI. Since Covid-19, the Manufacturing PMI has dropped significantly month by month setting a low of 38.4 points in May. Similarly, the Services PMI had dropped significantly to 21.5 points in April, only to rebound to 26.5 in May. Evidently, Japan's companies feel that the coming market conditions will negatively affect the economy and could shrink the GDP.

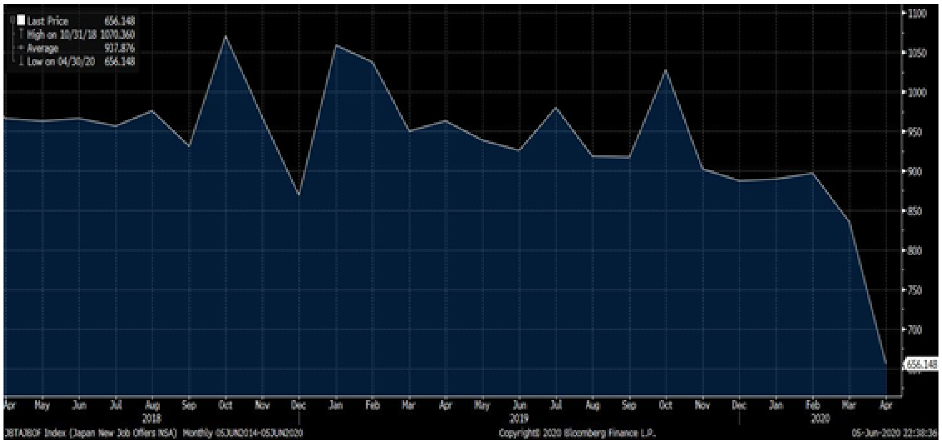


Figure 7: Japan's New Job Offers from April 2018 to April 2020
Source: Bloomberg Terminal

Lastly, the graph above tracks the number of New Job Offers from the last month. The graph clearly shows that the general trend of new jobs started per month has shrunk over the past 2 years and took a big dip in April this year. New job offers are inversely proportional to the unemployment rate of Japan. This can be shown by the steady rise in unemployment since November 2019, when New Job Offers started to decline monthly. From November 2019 to April 2020, the unemployment rate rose from 2.2% to 2.6% mirroring the fall in New Job Offers in the same time period. Unemployment is what analysts call a lagging indicator. A lagging indicator can confirm or validate market trends that are occurring, and, in this case, a rising unemployment rate confirms that the effects of Covid-19 are real. The effects on the economy won't just be a blimp in the market but will be felt for a long time.

From key leading indicators such as Retail Sales, Consumer Confidence, Housing Starts, and PMI, we have seen that they suggest that the economy was already weakened and is now facing a shrink in GDP due to Covid-19. From a lagging indicator, unemployment, we see that this market trend is validated and is more likely to happen. However, the Japanese government has provided plenty of stimuli to try and soften the blow to its economy. On May 27, 2020, the Bank of Japan announced another USD 1.1 trillion relief package into its economy. This doubles the amount committed in April bringing the total to USD 2.2 trillion, almost 40% of their annual GDP. The country will issue government bonds to fund the stimulus package increasing the already very high level of public debt in Japan. The International Monetary Fund forecasts that Japan's GDP will shrink 5% this year, the worst since the 2009 Financial Crisis [8].

However, Japan's main stock exchange the Nikkei 225 has soared 38% since March 19, after an initial selloff at the beginning of the month. It appears that the USD 2.2 trillion Japan has put out in April and May combined with the global effort to restart international trade has helped the Nikkei to almost recover back to its level before the pandemic. With limited earnings to back up the stock market's bull run, it is expected that the stock market with retract from its yearly highs. The shrinking of the GDP and leading indicators above should be reasons for the stock market to pull back, but it is being propped up by the fiscal stimulus of the Bank of Japan. This could hurt Japan's economy in the long run as that capital could be used to increase the GDP in future years, rather than tie it up in current debt. As aforementioned, Japan has an extremely high Debt-to-GDP and this will only slow its economic growth even more. With all the risks involved with implementing such a large amount fiscal stimulus, will Japan continue to provide stimuli to prop up the weakened economy with debt levels that high and consumer confidence so low or will they stop and allow the market to correct itself?

[1[1] https://www.focus2move.com/japan-auto-market/ [
2] https://www.nytimes.com/2020/03/30/business/japan-economy-coronavirus.html
[3] https://www.investopedia.com/terms/g/gdp.asp
[4] https://www.investopedia.com/terms/d/debtgdpratio.asp
[5] https://www.bbc.com/news/business-51499774#:~:text=Japan's%20economy%20shrank%20at%20the,6.3%25%20in%20
[6] https://www.investopedia.com/terms/c/cci.asp
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[8] https://www.cnn.com/2020/05/27/economy/japan-economic-stimulus-coronavirus/index.html

MAY 2020

Impact of Covid-19 Pandemic to the U.S. and Signs of Recovery

By Madeline Pollock and Claudia Santillana, Market Research Analyst

Fiscal Stimulus

The Covid-19 pandemic has had major ramifications on the global economy. According to a new report from consultancy McKinsey & Company, it could take until 2023 for the US and Eurozone economies to recover from this [1]. With businesses forced to close, travel restricted, and many left unemployed as a result, economic downturn a hit to the economy is unavoidable. Providing fiscal stimulus can help to contain the downturn, to an extent.

Why this is vital

Fiscal Stimulus policy is essential to help the U.S. economy weather the devastating impact of the Covid-19 pandemic and keep financial markets functioning, Many industries are directly affected by Covid-19 (ex. Restaurants, airlines, etc.) resulting in many lay-offs and loss of income within these industries. These individuals directly impacted will have much less money to spend (especially low-income workers with little to no savings to rely on) this will indirectly impact other industries. This will lead to further lay-offs and cuts throughout industries. Given that many of the industries directly impacted disproportionately employ low-wage workers, with less savings, leading them not to spend, the reduction in spending is much steeper than in typical recessions. This will create a vicious cycle. As Covid-19's direct impact fades, the detriment to these industries will make it more difficult to build back up. The workers left unemployed or with less income in both directly and indirectly impacted industries will not be spent on things like restaurants and travel. After being hit by Covid, these non-essential industries will be directly hit by the state of the economy and the cycle will continue. The reduced revenues and personal income will cause tax revenues and the government to fall.

Actions

In response to the Covid-19 pandemic, Congressional lawmakers have put forth a $2 trillion stimulus bill [2]. This stimulus will support the American people, hard hit businesses, manufacturers, airlines, etc. The Treasury Department can provide up to $500 billions in loans, loan guarantees and investments [2]. This bill will provide additional loans to businesses with additional incentives to those who maintain high levels of employment. The bill provides protection against foreclosures and evictions, while also giving those in need a federally backed mortgage loan of up to 60 days [2]. Student loan payments will also be suspended without penalty until September [2].The bill doesn't allow fees or additional interest to be charged to delayed payments for loans, as well [2]. In addition to state benefits, jobless workers will receive an extra $600/week for four months and independent contractors may also be eligible [2]. The package includes $32 billion in grants to the airline industry, about $117 billion for hospitals, and $450 million for the Emergency Food Assistance Program [2]. The bill also includes $324 million to assist Americans seeking assistance abroad [2]. This bill puts in place actions to assist many industries, workers, students, homeowners, and Americans abroad.

Programs are also being put in place to inject funding into businesses, markets, and lending. Many of these programs involve purchasing asset backed securities, corporate debt, and municipal debt. These programs include, but are not limited to: Primary Dealer Credit Facility (PDCF), Money Market Fund Liquidity Facility (MMFLF), and Term Asset-Backed Securities Loan Facility (TALF) [2]. More direct forms of lending have also been put in place through the Main Street Lending Program and the Paycheck Protection Program Liquidity Facility (PPLF) [2]. Although the PPLF finances lending to qualifying small businesses, these loans can become grants for businesses re-hiring or retaining workers. These programs provide further aid through injecting liquidity into the markets as well as reducing unemployment.

These measures come at a significant cost; the downturn of economic activity combined with these additional government expenditures could lead to the largest US Federal Debt to GDP ratio since the 1940s [5].

Figure 1: US Federal Debt as a % of GDP, Source: US Congressional Budget Office, Retrieved from Manulife Investment Management [5]

In spite of this, the Fiscal Stimulus measures taken are essential to both the economy and the American people. As many industries are impacted, providing assistance can help further their operations and contributions. The combination of packages and programs ensures that those in need, as a result of the pandemic, can get the support they need.

Economic Outlook

It does not look like the US economy will bounce back from this in the near future or return to normal until 2021 [3].

The National Bureau of Economic Research (NBER) officially declared a recession on June 8th, making this the first recession since the 2008 financial crisis [4]. It is unclear how this recession will look or what the recovery will be like. The best-case scenario is that we will see a v-shaped recession, ie. we will see the economy rebound as quickly as it fell [4]. This is a sharp downturn in economic activity (displayed by GDP, employment, ect.) followed by a steep recovery. A v-shaped recession is a possibility, especially with the stimulus package maintaining some form of activity.

With many businesses closing and ensuing lay-offs, significant economic downturn was inevitable. To mitigate this impact, it was necessary for the US government to put forth some form of stimulus package. Congressional lawmakers developed a $2 trillion stimulus bill, while implementing additional programs to inject funding into businesses, markets, and lending. As lockdown measures ease and businesses re-open, the devastating economic impact of the covid-19 pandemic can still be felt. Hopefully, the influence of this stimulus will aid the economy in recovering in this post-covid world we are entering.

Housing

The US housing market was on the upswing at the start of this year, with housing prices up overall at the end of 2019. The great impact of Covid-19 has resulted in the housing market taking a downturn.

Heading into March, the markets were as expected for spring and new listings even saw a 5% increase [6]. Concerns due to Covide-19 resulted in prices plummeting. By the end of March, new listings were down 36.9% from a year prior [6]. By April, they were down 44.1% [6]. Sales hit a record low in April, they fell 21.8% to a level of 69 [6]. This is the largest decline since 2001, when the National Association of Realtors began collecting data[6].

Housing Market Recovery

The US housing market took a big hit due to Covid-19 and slowed to a halt in mid-March. The end of May indicated early signs the housing market is recovering [6]. Mortgage Bankers Association (MBA) reports that applications for a home rose 6% in mid-May [6]. A survey conducted by the University of Michigan found an uptick pin people who think now is a good time to buy. As of the end of May, there is only a 20% year-over-year decline, compared with 40% in earlier weeks [6]. Homebuyers are realizing that working remotely spends more time at home leads them to search for better spaces. Bidding wars are following from homebuyers. Mortgage bailout total shrinks for the first time since the start of the pandemic. Borrowers in mortgage forbearance programs dropped by 34000 last week [7]. Many potential homebuyers are taking advantage of the low interest rates and applying for mortgages. Mortgages applications have been rising for the past 8 weeks and have closed at the highest in 11 years [8].

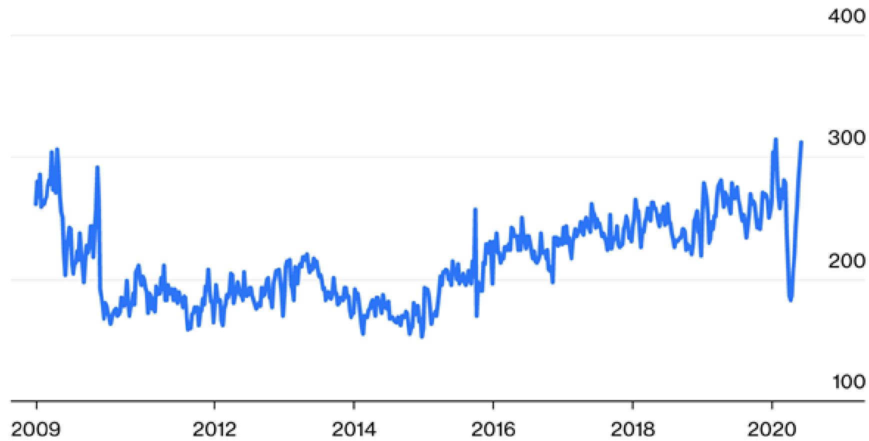

Figure 2: MBA US Purchase Index - Source: Mortgage Bankers Association, Retrieved from Bloomberg [8]

The previously rising US housing market took a downturn amid the Covid-19 pandemic. It seems that the impact on the demand side is lightning faster than the impact to supply, helping housing prices to rebound. The rise in mortgage applications and the reduction of mortgage bailouts point towards a recovery in the housing market.

Employment

The Covid-19 pandemic and social distancing measures have forced many businesses to close, downsize, or operate remotely. With the direct impacts and the detriment caused to the economy generating massive losses of revenue. Many have been furloughed or laid off, as a result. More than 21 million jobs were cut by US employers in March and April, as businesses closed [9].

Almost 26 million have applied for unemployment, as of mid-April, although twice as many are in a vulnerable position [9]. In April, the unemployment rate reached 14.7%, the highest it's been since the Great Depression. This is after the lowest rates of 3.5% in 50 years back in February [9].

Improvement

The US labour market unexpectedly improved in May. This surprised economists who had anticipated the unemployment rate rising past 20% [10]. In the Employment Summary presented by the US Bureau of Labor Statistics, improvements in the labor market can be seen. In May, total non-farm payroll employment rose by 2.5 million and the unemployment rate dropped by 13.3% [12], down from 14.7% in April [10]. This is following the start of businesses hiring again and opening. These 2.5 million jobs were added in sectors including education and retail [11]. “ It appears that the worst of the coronavirus’s impact on the nation’s job markets is behind us”, said Eugene Scalia, Labor Secretary. He suggests that the economic re-opening has been more robust than anticipated. This news alleviated some investor concerns, sending the Dow Jones Industrial Average and S&P 500 up more than 2% [11]. Restaurants and bars accounted for around half the jobs and Dentist offices accounted for another 10% [11]. Many also came from temporary layoffs. The US Labor Department warns that the figures reported may underestimate the true jobless rate, due to how people describe their out-of-work status.

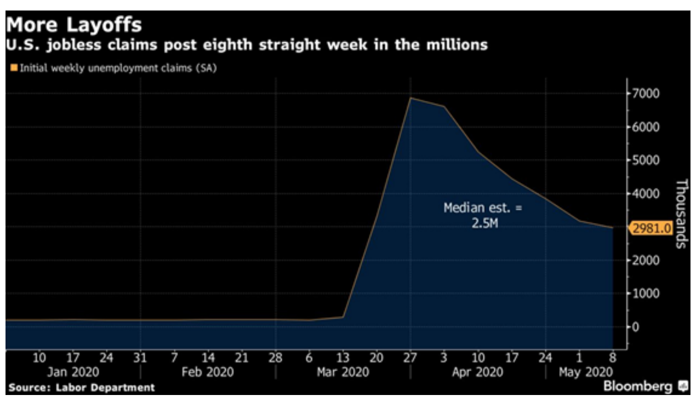

Figure 3: US unemployment claims through January 2020 to mid-May 2020. Source: Bloomberg [11]

Although there was expected to be a significant drop in the jobs report, US payrolls increased by 2.5 million in May [11]. A full recovery is still a long way away, with 21 million Americans still unemployed [11]. The surge in employment is likely linked to the lifting or lightening of many of the lockdown measures in May. Retail and the Restaurants, being particularly hard-hit due to the virus and directly affected, found employment surging in May. Sectors hit hardest by the virus are rebounding the most in employment, according to Nick Bunker, an economic research director at Indeed [11]. The government stimulus has enabled businesses to rehire, as well influences these decisions with contingencies on their loans that workers must be rehired.

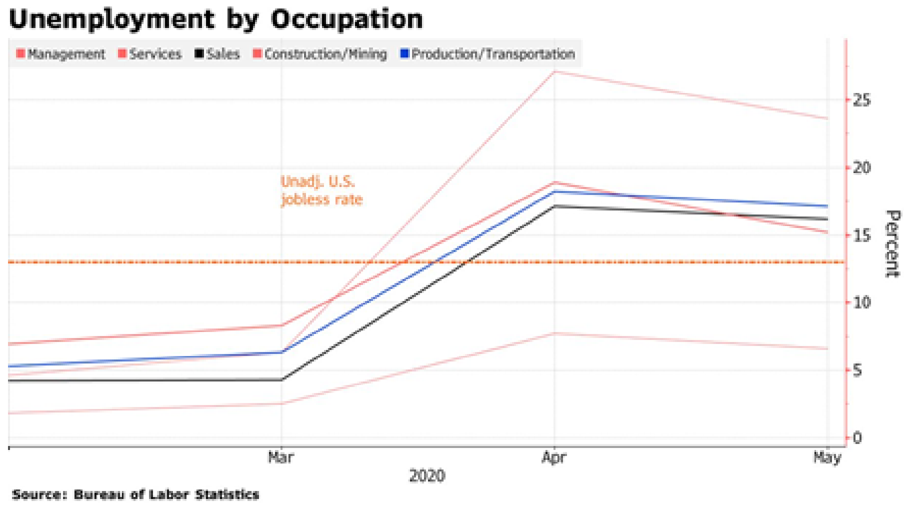

Figure 4: Unemployment by occupation. Source: Bloomberg

As a whole, the US labour market has been recovering from the pandemic relatively rapidly, with almost half of the rise in unemployment being back in April [11]. The re-opening of businesses along with fiscal stimulus packages has enabled businesses to rehire and end furloughs. The easing of lockdown measures and overall economic recovery may be slow, but the improvement in employment can still be felt. Unemployment is still had one of its highest levels since the Great Depression, but there is hope recovery won't be too far away.

Manufacturing

The U.S. manufacturing sector took a hit as COVID-19 disrupted supply chains across industries and amplified the negative financial impact on existing trade tensions. As the pandemic started developing in China in early 2020, worries about the disruption of the sourcing of raw materials, finished goods, and other manufacturing needs were already present. Even though we saw many companies opting out of sourcing from China in 2019 due to tariffs imposed by President Trump, China remained the United States' biggest importer.

As the virus spread and Chinese workers became sick or quarantined, the closure of factories led to American demand for Chinese products to plummet, and imports to drop by almost 50%, from 2019's monthly average of 37,638 millions of USD to the low of 19,805.4 millions of USD in March 2020 [13]. Chinese suppliers were not able to fulfill American orders, and small customers seemed to be affected the most. Electronic manufacturers that rely heavily on Chinese factories to fulfill orders, reported disruptions in their supply chains as shipments got delayed for three weeks or longer [14].

2020 : U.S. trade in goods with China

NOTE: All figures are in millions of U.S. dollars on a nominal basis, not seasonally adjusted unless otherwise specified. Details may not equal totals due to rounding. Table reflects only those months for which there was trade.

Month	Exports	Imports	Balance
January 2020	7,215.3	33,280.6	-26,065.3
February 2020	6,815.0	22,813.1	-15,998.1
March 2020	7,971.9	19,805.4	-11,833.5
April 2020	8,604.7	31,070.8	-22,466.1
TOTAL 2020	**30,606.9**	**106,969.9**	**-76,363.0**

Figure 5: U.S. Trade in Goods With China for 2020. Sources: U.S. Census Bureau

American companies such as Apple, Microsoft, and P&G warned investors about supply-chain disruptions and reported that they are looking into moving production out of China. However, as COVID-19 seemed to be deaccelerating in Asia, the U.S. seemed to become the new epicenter of the pandemic, with factories closing facilities both temporarily and permanently. Layoffs were seen across the industrial sector due to company shutdowns, difficulties for factories to operate at full capacity amid new safety regulations, cancellation of orders, and the weakening of client demand from domestic and foreign customers. A survey carried out by the National Association of Manufacturers in early March showed that 78.3% of its members anticipate a financial impact due to COVID-19, and 53.1% anticipate a change in operations [15].

The ISM Report on Business

The Institute for Supply Management's (ISM) Purchasing Manager's Index (PMI), a measure of manufacturing activity based on a monthly survey of purchasing managers at over 300 manufacturing firms, revealed the grim outlook of the US manufacturing in the month of April. The PMI hit an 11-year low of 41.5 in April, falling at record pace after posting levels of 49.1 in March. Readings below 50 indicate a shrinking activity [16].

Figure 6: New orders, Production/Business Activity and Employment in manufacturing all dropped to their lowest levels in April since 2009. Sources: Bloomberg, ISM

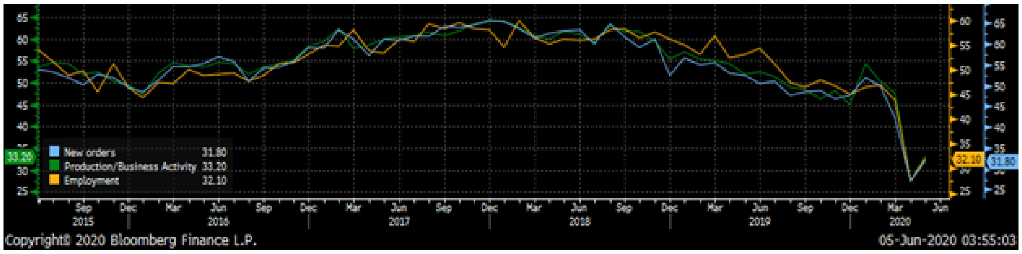

Figure 7: New orders, Production/Business Activity, and Employment in the manufacturing sector. Sources: Bloomberg

Additionally, the ISM reported the number of manufacturing industries that observed overall growth contracted to only 11% in April, from 78% and 56% in February and March, respectively. The increase in new orders and increase in production took a hit as well, decreasing by the double digits. April also saw a significant increase in inventories due to the closure of stores and lack of demand.

However, the US manufacturing industry ended a four-month decline, posting a PMI of 43.1 for the month of May, showing improvement in the sector after hitting its lowest levels in over a decade. As of May 2020, 33% of manufacturing industries in the ISM reported overall growth, a significant increase since April. There was also an increase in production, new orders, and employment. However, all industries reported slower supplier deliveries as the pandemic still threatens supply chains across the sector.

Percent of Industries Reporting	May 2020	April 2020	March 2020	Feb. 2020	Jan. 2020	Dec. 2019	Nov. 2019	Oct. 2019
Overall growth	33%	11%	56%	78%	44%	17%	28%	28%
Increase in new orders	22%	11%	50%	89%	56%	17%	28%	28%
Increase in production	22%	11%	39%	67%	39%	17%	39%	33%
Growth in employment	11%	6%	17%	17%	22%	11%	28%	28%
Slower supplier deliveries	100%	94%	89%	72%	50%	33%	39%	33%
Higher inventories	39%	56%	28%	28%	39%	22%	17%	39%
Excessive customer inventory	28%	17%	6%	6%	17%	6%	0%	28%
Paying higher prices	17%	17%	11%	28%	56%	22%	11%	22%
Increase in order backlogs	11%	17%	33%	61%	28%	17%	22%	28%
Growth in new export orders	11%	6%	22%	44%	33%	11%	28%	28%
Growth in import activity	17%	28%	22%	28%	44%	33%	33%	0%

Figure 8: Metrics of the Manufacturing ISM Report on Business. Sources: Bloomberg, ISM

Of the 18 manufacturing industries tracked by the ISM, the six that reported growth in May — in the following order — are: Non-metallic Mineral Products; Furniture & Related Products; Apparel, Leather & Allied Products; Food, Beverage & Tobacco Products; Paper Products; and Wood Products. The 11 industries reporting contraction in May, in order, are: Printing & Related Support Activities; Primary Metals; Transportation Equipment; Petroleum & Coal Products; Fabricated Metal Products; Machinery; Miscellaneous Manufacturing; Electrical Equipment, Appliances & Components; Chemical Products; Computer & Electronic Products; and Plastics & Rubber Products.

The future of Manufacturing and Supply Chain Operations

Nonetheless, the manufacturing sector remains optimistic as economists indicate that the rate of economic collapse seems to have peaked in April. “Returning to full production for automotive [...], we have built up inventory to stock. Ready to ship” commented the ISM in regard to fabricated metal products. Additionally, “Despite the COVID-19 issues, we are seeing an increase of quoting activity. This has not turned into orders yet, but it is a positive sign” was said about computer and electronic products [17]. As American manufacturers seem to slowly recover, the industry must become adaptive and resilient to possible future disruptions, including the possibility of a second wave of COVID-19. Historically a conservative industry, the manufacturing sector must now focus on sustainable manufacturing operations and supply chains that can be diversified and digitally integrated in order to overcome these unprecedented challenges.

Retail

Perhaps one of the worst-hit industries by the global pandemic was the U.S. retail sector. With COVID-19 causing great damage to the overall American economy, the U.S. government mandated non-essential businesses to shut down across the country in order to contain the spread of the virus.

Decline in Sales

The Retail Sales Report released by the U.S. Department of Commerce showed a monthly decline in retail sales of 16.4% in April, compared to a decline of 8.7% in March, and 0.5% in February. This was the largest monthly decline in recorded history since 1992. Over the prior 12 months, retail sales fell by an overall 21.6% [18]. The Retail Sales Report conveys the monthly trend in consumer spending, which accounts for more than two-thirds of the U.S.’ economic growth.

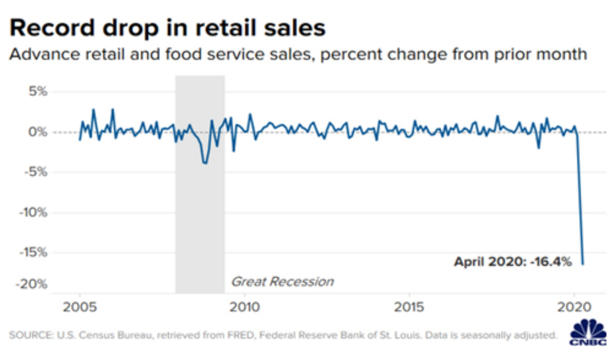

Figure 9: Retail store sales, percentage change from prior month

Out of the 13 retail industry sectors tracked by the Retail Sales Report, clothing stores took the biggest hit with a 78.8% monthly decrease in April. Other sectors taking big losses were electronics and appliances down 60.6%, furniture and home furnishing down 58.7%, sporting goods down 38%, and bars and restaurants down 29.5% from March to April. As all categories of retail fell, the non-store retailers' group was the exception, rising 8.4%.

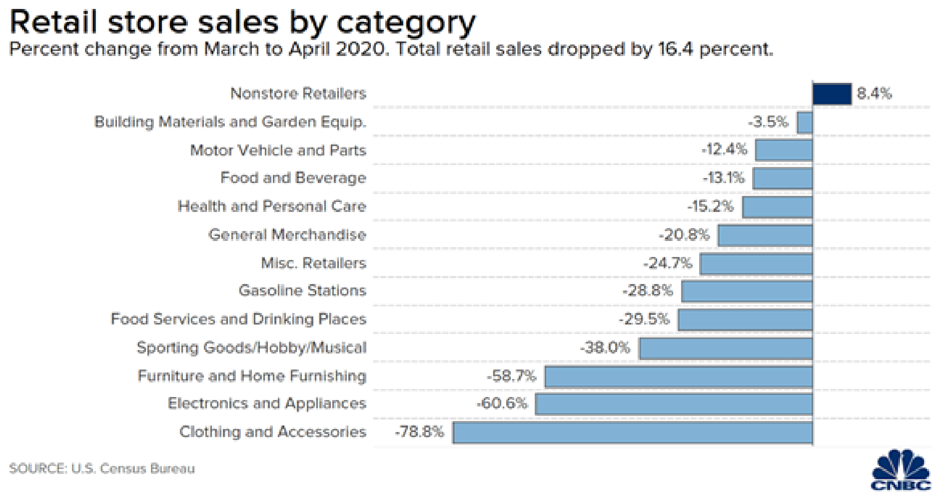

Figure 10: Retail Store Sales by Sector

The New Reality of Retailers

The COVID-19 pandemic is rapidly accelerating the shift to digital commerce, while brick-and-mortar stores face new challenges to implement social distancing and consider health concerns. Additionally, as social distancing seems to be a long-term problem, most companies will have to become accustomed with the new reality of digital commerce. The digital shopping experience limits impulse buys, immediate consumption purchases, and new product trials, which will cut into profits.

Other retailers have faced a harder decision and decided to close some of their stores across states. At least 3900 retailers have confirmed store closings in the U.S. for 2020, including major retailers such as Nordstrom, Victoria's Secret, Gap, J.C. Penney, Bath & Body Works, among others [19] Other companies such as Neiman Marcus Group and J. Crew have filed for bankruptcy protection as they struggle to remain profitable. Moody's, the major credit rating company, stated that six retail companies, namely JCPenney, Neiman Marcus, Rite Aid, J. Crew, Ascena and Academy, make up for 77% (24 billion USD) of the outstanding distressed debt in the retail and apparel debt sector [20].

On the other hand, retailers selling high-demand pandemic necessities, such as Amazon, Walmart, and Costco, did not seem to be impacted by the effects of the pandemic, as their nature of large-scale operations and high leverage with suppliers and manufacturers gave them an edge to maintain inventory on-hand, compared to their smaller counterparts. Meanwhile, staples retailers benefited from high volume of food buying as Americans opted for eating at home during the outbreak [21].

As states across the U.S. begin to reopen, the recovery of retail sales is expected to be slow and not fully go back to normal patterns until 2021 due to high unemployment numbers and frail consumer confidence. The negative impact of COVID-19 on retail sales has widened the gap between industry leaders and companies with weak cash reserves, especially small businesses that survive on day-to-day operations, and has potentially led many retailers to permanently close for business. Additionally, the huge amounts of debt these firms have taken to be able to survive the closure of physical stores, will only contribute to the solvency crisis many retailers will have to face in the upcoming future.

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