Timberland Market Update Global Consulting Alliance Quarterly Edition - March 2020

Economic Developments

- Globally, interest rates remain very low and further monetary easing is widely expected, as central banks
 respond to the persistent downside risks to the global economy and subdued inflation. Long-term
 government bond yields are around record lows in many countries. Borrowing rates for both businesses
 and households are also at historically low levels.
- The U.S. economy is now in the longest period of expansion in its history. The outlook for consumer spending remains relatively bright, thanks to low energy prices, high consumer confidence, and pent-up demand in the residential-investment sector. The trade sector will continue to have a negative effect on growth, particularly due to trade tensions between China and the United States. However, there is recent movement in a positive direction as the Phase 1 trade deal is expected to mitigate some of this effect going forward.
- GDP Growth The fourth quarter 2019 "advance" estimate of real GDP showed that the U.S. economy increased at an annual rate of 2.1% for Q4 and 2.3% GDP growth for 2019. Growth in the fourth quarter was due to strong personal consumption expenditures, government spending at all levels, residential fixed investment and exports. Non-residential fixed investment and private inventory investment showed negative growth, decreasing overall GDP growth. Imports decreased in the fourth quarter, which had a positive effect on GDP. GDP growth in 2019 decreased from 2.9% in 2018 to 2.3% in 2019.
- The U.S. Federal Reserve cut interest rates in October 2019 for the 3rd time in that year, reversing nearly all of 2018's rate increases. Analysts point to uncertainty caused by the trade war and technology disputes between the US and China as a major contributor.
- U.S. housing starts are expected to tick upward in 2020 after finishing the year on a strong note. Starts averaged 1.44 million units (on a seasonally adjusted annualized basis) in Q4. For the full year, starts totalled 1.29 million units, up 3.3% over 2018.
- The European economy is growing modestly. According to preliminary figures, euro area GDP rose 0.9 percent in the fourth quarter of 2019, compared with the same period in 2018, which is in line with economists' consensus forecasts. The growth was 0.1% compared to the previous quarter. The preliminary figures for Germany, the biggest single economy in the union indicates a zero growth for the fourth quarter of 2019 compared to the third quarter.











- The EU budget negotiations are still on-going and EU countries are badly hit by the collision course of the Union's financial framework for 2021-2027. "Given the huge differences between the proposals of the Commission and the President of the European Council, and what those differences mean in the billions, it is clear that it is not easy to reach an agreement," was stated by the German Prime minister Angela Merkel in a recent press conference.
- The European Central Bank (ECB) decided in last December to keep key interest rates for the eurozone unchanged the base interest rate at 0.00%, and the marginal lending rate and deposit rate at 0.25% and minus 0.50%, respectively. The ECB Governing Council reiterated that it expects the rates to remain at their present or lower levels until it has seen the inflation outlook robustly converge to a level sufficiently close to, but below, two percent within its projection horizon.
- According to ECB's latest macroeconomic projections for the eurozone a 1.1% GDP growth is forecasted
 for 2020. The growth forecast has been revised slightly downwards compared with September 2019
 projections. Looking ahead, the main concerns relate to geopolitical factors, rising protectionism and
 vulnerabilities in emerging markets. The ECB projected inflation to be at 1.1% in 2020, also slightly revised
 from previous forecasts mainly driven by expected changes in energy prices.
- Many commentators expect China's economy to bounce back by the end of Q1 2020 from the impact of the COVID-19 virus; this viewpoint is largely predicated on observations around 2003 with the outbreak of the SARS epidemic. An alternative, less optimistic viewpoint is that China's economy is now growing much more slowly (recent GDP ~6%, compared with 10% in 2003) and its banking system is now more fragile and laden with debt. Further considerations weighing in include: (i) Chinese regulators had to bail out a bank, Baoshang Bank in May 2019, for the first time in decades; (ii) S&P research estimated that if this crisis is prolonged, bad debt in the banking system could increase from 2% at the end of last year to over 6%; private-sector companies, mostly small and medium-size enterprises (SMEs) struggled in 2019 to get getting adequate funding following the crack-down of Chinese authorities on the shadow banking system in 2017/18.
- India is the world's 5th largest economy and it experienced significant economic headwinds in 2019. After five consecutive quarters of lower economic growth and the very weak GDP for fiscal Q2 of 4.5%, it appears that India's economy is going through its most serious economic crisis since taper tantrum in 2013. This raises uncertainty as to what can be expected from India's economy in 2020.
- In Australia, the Reserve Bank (RBA) has kept interest rates steady at 0.75% after a reduction of 25bps from June to October 2019 in an attempt to stimulate the economy, support employment and wage growth, and to lift inflation to within the RBA's target range. The Australian dollar is at its lowest level in recent times.
- The Australian housing market weakened significantly in 2019, both in terms of house prices as well as new dwelling commencements. Housing construction slumped at its fastest rate in 19 years in Q4. Prices have rebounded strongly following the RBA's interest rate cuts, but dwelling commencements continue to lag. A positive sign is an uplift in housing finance for construction in the second half of 2019 and building approvals in the December quarter 2019, although the contribution of approvals for detached housing to











the latter was negative. Australians have the world's 2nd largest level of household debt (120% of GDP), which implies limited opportunity for future credit growth.

- New Zealand's (NZ) reserve bank cut the official cash rate (OCR) by an unprecedented 50bps in August 2019 to an all-time low of 1%. Current guidance is that rates are unlikely to be cut further unless the impact of the COVID-19 virus soon to be pandemic causes major headwinds. Impacts are already being felt in the tourism industry with restrictions on entry from mainland China, one of NZ's major sources of tourists. Despite some commodity price headwinds, particularly in timber exports, GDP growth remains moderate at a 2.4% (YoY Sep Q 19).
- Although there have been some signs of easing of NZ's pent up housing demand, house price inflation is beginning to reignite with a major bank (Wespac) forecasting 10% growth for the year ahead. This is exacerbating already severe unaffordability, with Auckland house prices sitting at 9X average income and the national average at 6.5X. In a recent visit, Leilani Farhe, a UN Special rapporteur, described the situation as a human rights crisis. The housing crisis is acknowledged by all parliamentary parties and with an election looming in August 2020, the means of addressing it will be a major election issue. Annual building consents issued hit an all-time high of 37 538 in December 2019 with 15 154 of these in Auckland.
- In South America the Brazilian economy disappointed again in 2019. GDP growth is estimated to be 1% against an early-year expectation of 2.2 2.5%. The consumer price index was as expected, close to 4%/a. Inflation was recorded at 3.6%. The GDP outlook for 2020 remains skewed towards downside risk due to the current low performance of industry, political turmoil and the Corona virus (China is the most important export destination for Brazilian commodities).
- General elections took place in Uruguay last November. Lacalle Pou (National Party) won the elections, ending 15 year left party rule. Mr. Lacalle Pou suggested that he would pursue a change in the country's foreign policy. He won in the runoff election by drawing support from candidates who did not make it to the second round. He will assume as president next march, facing the challenge of keeping his party united despite their disparate ideologies, at a time when several countries in the region are mired in protests and economic malaise.
- The Uruguayan economy bounced back in the third quarter of 2019, after contracting in the first half of the year. Improved external sector metrics, coupled with a solid rebound in household spending, drove the recovery. However, the pace of expansion was modest overall, restrained by shrinking infrastructure spending and a marked shedding of agricultural stock. In Q4 activity remained subdued. On the external front, merchandise export growth slumped in Q4, likely dragged down by weakness in Argentina's economy. The industrial sector contracted in the first two months of Q4, boding ill for private sector activity, although it recovered some strength in December. Unemployment is still close to 9%.
- Growth in Uruguay looks set to gain some momentum in 2020, on the back of recovering domestic demand. An improved business environment, the construction of a new paper pulp plant and the government's plans to boost public-private infrastructure projects should buttress fixed investment. However Argentina's dire economic situation poses a significant downside risk. Analysts see growth accelerating to 1.5% in 2020. In 2021, growth is seen picking up to 2.1%.











- According to the African Development Bank's African Economic Outlook 2020 report, real GDP growth
 from Africa is projected to accelerate to 3.9% in 2020 and 4.1% in 2021. Rwanda, Ethiopia, Côte d'Ivoire,
 Ghana, Tanzania, and Benin are amongst the 10 fastest growing economies in the world. Growth
 fundamentals are gradually shifting from private consumption towards investment and exports.
 Investment accounts currently for more than half the continent's growth, with private consumption
 accounting for less than one third.
- While the economic growth outlook for Africa seems promising, the IMF has revised South Africa's GDP growth for 2020 downwards to a meagre 0.8%. This adjustment reflects the structural constraints and deteriorating public finance that Africa's most industrialised country has to grapple with.

Asia-Pacific

- China imported a total of 12.376 million BDMt of hardwood chip in calendar year 2019, being a 1.4% decline on 2018. Japan imported 10.685 million BDMt, 0.6% down on 2018 imports.
- Despite the modest decline in the Chinese and Japanese markets, Vietnam continued to grow market share for three years in a row, lifting total export volumes from 8.286 million BDMt in 2017 to 10.415 million BDMt in 2018 and 11.067 million BDMt in 2019. This represents a CAGR of 10.1% over the past three years. Malaysia has also lifted its exports by a CAGR of 12.2% over the past 3 years, albeit on relatively small volumes, reaching 0.503 million BDMt in calendar year 2019.
- Vietnam's success came at the expense of declining exports for Thailand (-1.3%) Australia (-3.0%), Chile (-4.1%), Brazil (-3.6%), South Africa (-5.2%), and Indonesia (-20.5%).
- India's hardwood chip imports continued to decline for a third year, achieving only 0.048 million BDMt in 2019.
- Chile and Australia achieved the highest average hardwood chip CFR prices in 2019, being USD224/BDMt and USD223/BDMt respectively. Vietnam's average CFR price over the same period was USD166/BDMt while Brazil achieved USD203/BDMt and South Africa USD210/BDMt.
- Australian exporters of hardwood chip continued to report deteriorating trade conditions and high inventory levels.
- Bleached hardwood kraft pulp (BHKP) prices dropped from highs around USD750 per air dried tonne
 (ADt) to ~USD460/ADt CIF China. Most Chinese pulp mills rely on imported chip, and at current price
 levels, many mills are likely operating at breakeven or below. There is a risk of Vietnam increasing export
 chip duties that will further exacerbate the situation.
- NZ pine exports to China increased 2.1% to 17 736 million m³ in 2019, compared to 17 379 million in 2018. China imported an aggregate of 59.571 million m³ of log in 2019, down 0.8% from 60 033 million











in 2018. Russian softwood log exports to China declined 30.1% to 7 551 million m³ in 2019 while Australian exports increased 11.8% to 5 224 million m³, US exports declined 41.8% to 3 634 million m³ and Canadian exports increased 6.7% to 2 665 million m³. The biggest change was the large increase (465.7%) in German softwood logs exports from sanitary felling of dead and dying spruce forest to an annual total of 4 237 million m³. Reports suggest around 100 million m³ of wood has been affected in European forests.

- By mid-February 2020 oversupply combined with the lockdown in China from COVID-19 caused a massive jump in port log stocks to 5.7 million m³ (52% up from the end of December 2019). This precipitated a collapse in prices to below that seen in the mid 2019 price crash. This will again push many high cost producers out of the market.
- The next few months will be a critical period for log exporters as China gradually unwinds the lockdown and attempts to restart its economy.

Europe

- As a whole, 2019 was a reasonable year for the European forest industry, but not as favorable as 2018.
 A relatively strong first half was replaced by a weaker second half when the forest industry fell into the general economic slowdown.
- The weak development of demand in Europe impacted the forest industry, with falling trade volumes as a result. European prices for most important pulp and paper grades decreased slightly during the last quarter of 2019. Worldwide pulp shipments from the top producing countries increased and were higher than in the last quarter of 2018.
- The pulp industry sector was affected less by the weakening demand. Especially in Sweden, where the
 production and exports increased in volume by some 10-15% due to previous years' investments in new
 pulp capacity. The Finnish pulp exports also increased in volume terms but slightly decreased in value
 due to the price decline.
- The fast spread of the spruce bark beetle in combination with windstorms in Europe has had a significant effect over the last few years, putting large volumes of damaged logs in the market which has had consequences for the global timber market. Areas affected by the infestation include the Bavarian region of Germany, the Czech Republic, northern Austria, Slovakia and Poland. While Germany has the most damaged timber so far in Europe, the Czech Republic's spruce forests are highly stressed and up to 80% of its spruce trees are at risk. All the excess log volume in the European market caused a notable increase in log exports to China: more than 1 million m³ of saw logs were exported to China in October alone. As a result, export prices of spruce saw logs to China were 20% lower in Q4 vs. Q2.
- The oversupply of sawn timber in Europe lead to a sharp decline in prices of sawn timber and reduced production.
- In Finland prices for sawlogs and pulpwood continued their decline in the last quarter of 2019. Prices had already been declining since reaching highs at the end of the year 2018. At the same time export prices for sawn wood decreased further. Due to lower sawn wood prices independent Finnish sawmills were under pressure: multiple sawmill companies announced temporary shutdowns.











 In Sweden, similarly, saw log prices continued to decline although pine saw log prices showed a slight rebound in the last quarter of 2019. Swedish sawmills reported lower margins during 2019, driven by the slump in sawn wood prices.

North America

- Oil & Diesel The forest products sector is energy intensive and sensitive to cost fluctuations in diesel fuel. Retail diesel prices relate closely to price of crude oil. The U.S. Energy Information Administration forecast of energy prices in 2020 is as follows: \$55.71/barrel WTI Spot Average. \$61.25 Brent Spot Average. Retail diesel including taxes, \$2.94 On-Highway Diesel. Prices are lower than originally forecast, and lower than the forecast for 2021, due to unexpected low demand. A warmer than typical January and the effects of the 2019 novel coronavirus on China's fuel consumption contributed the most to the decline.
- U.S. South Stumpage Prices TimberMart South's most recent stumpage price data shows South-wide average stumpage prices for pine sawtimber were up slightly to \$24.00 and \$8.75 for pine pulpwood, while pine chip-n-saw was down slightly at \$16.25 per ton in the 4th quarter of 2019. Hardwood pulpwood continued to decline a further 10% since the 3rd quarter to settle at \$10.00 per ton. Oak sawtimber prices were down 2.5% in the 4th quarter and down less than a point year-over-year. Prices remained about 4% higher than 2018 year-over-year for mixed hardwood pulpwood. Pine pulpwood was down more than 3% year-over-year compared to 2018. Other products were relatively flat year-over-year.
- Hardwood Markets The trade war and slowing economic growth in China have depressed prices and demand for U.S. grown hardwoods, especially Red Oak and Cherry. Improving domestic markets and other expanding export markets have helped but there is still a significant shortfall. News that single-family housing starts for December 2019 were up 11% over November has created some optimism, along with low mortgage rates and wage-growth. Trade with China had been slowly improving, with inquiries and some new orders coming in. However, the Corvid-19 outbreak has interrupted this progress, with downward price leverage occurring. Trade recovery is expected to resume in the Spring when coronavirus conditions are expected to improve. In the meantime, further price declines for Cherry and most oaks are expected. In a late-breaking development, China announced a one-year suspension of tariffs on certain U.S. and Canadian lumber starting February 28. Included on the list are cherry, ash, oak, and other lumber and logs.
- Douglas-fir domestic delivered log prices in the Pacific Northwest stabilized through the first half of 2019 but fell off over the summer. Prices did not experience the bounce-back that many expected because of an uneventful fire season and continued weakness in lumber and plywood markets. Prices were down 15-20% in 2019 compared to the strong levels of 2018 but are still favorable. For example, #2Saw prices in the Columbia River market averaged \$685/Mbf (Scribner long log scale) for the year. Whitewood prices have been more impacted by the reduction in log exports to China and were off 20-25% for the year. For example, Columbia River domestic #2Saw prices averaged \$540/Mbf in 2019 versus \$675 in 2018.
- In Canada, an 8-month long labor strike at Western Forest Products mills, which devastated local
 communities in northern Vancouver Island, has finally been resolved. The strike, new forestry
 regulations, the softwood lumber dispute with the U.S., and depressed lumber prices have had major
 repercussions throughout British Columbia. Logging was sharply curtailed on Crown as well as private
 lands on Vancouver Island. Although the strike has been resolved, it doesn't mean the B.C. forestry











sector will return to normal. The New Democratic Party-government appears committed to their regulatory goals despite the economic consequences to the sector.

• Timberland market activity has been slow across the U.S. over the last two years with many analysts citing a lack of capital and few A-grade properties on the market. Recent deals in the Northwest have mostly been privately negotiated, rather than public auctions, and have been for smaller, B-grade properties. Weyerhaeuser has been the dominant seller. In the eastern U.S., 2019 ended with at least 5 properties no-sold. There continues to be discrepancies between buyer and seller expectations that lead to no-sales or extended purchase periods with extensive negotiations. Only the best properties tend to sell sealed bid. Expectations for 2020 are for another slow year.

South America

BRAZIL

- 2019 saw significant activity in timberland asset acquisitions, mainly in southern Brazil, directly by local industry players or through association with timberland funds. Probably the consolidation movement will continue in 2020. The impact on the wood market will likely be substantial.
- Pulp Industry: Volume exports increased by 0.4% on 2018 volumes. However, revenue was 9,6% lower
 in USD terms. Despite the optimism of the pulp producers, the scenario for the first semester of 2020
 do not appear to be favourable because of pulp inventory levels and the impact of the coronavirus on
 China's economy.
- Charcoal Industry: Experienced a disappointing year mainly as a result of the reduction of Suzano's
 wood purchase from MG. The short-term prospects are also not encouraging, according to a recent
 Delphi Panel with the main stakeholders of the charcoal industry in Mina Gerais. The charcoal market
 will re-balance in the long-term due to a reduction of the planted area and the low current forest
 productivity given that most of the plantations are being managed through coppicing.
- Composite Panel Industry: Year 2019 was without significant positive news as a result of the general
 poor performance of the Brazilian economy. Companies were able to get some actual price increase,
 but production levels and prices were down 10% to 20% below the 2014 crisis level prices. As the
 housing industry is facing better prospects currently, the middle-term prospects are positive.
- Sawmills and Plywood Industry: Compared to 2018, softwood lumber exports in 2019 were practically the same in volume terms. However, USD revenues were 9% lower. The domestic market helped to soften this weak performance partially. Prospects for 2020 continue to remain negative regarding the export market but favourable for the domestic market. The 2019 results for softwood plywood exports were not good (-5% volume and -29% revenue). Both lumber and plywood benefitted from a significant appreciation of the American dollar against the Brazilian currency.
- The 2019 average pine wood prices in southern Brazil (BRL/t loaded on truck) for pulpwood was stable compared to 2018; small sawlog price decreased by 1.5%, while medium sawlog and large sawlog prices increased by 5.5% mainly because of the moulding segment. Eucalyptus pulplog prices remained stable.











URUGUAY

- Pulp Industry: Last August, UPM announced its investment decision to construct a 2.1 million ADt/a
 greenfield eucalypt pulp mill near Paso de los Toros in central Uruguay. The mill is scheduled to start
 up in the second half of 2022. Work on the port of Montevideo to build the docks and infrastructure to
 facilitate the export of pulp through this port and the new railroad system are also moving forward.
- Both UPM 1 and Montes del Plata (MdP) pulp mills continue to operate at full capacity despite the downward international pulp price cycle. Both pulpmills continue to drive demand for eucalypt pulplogs from all Uruguayan regions. 2019 pulpwood consumption from both pulpmills was close to 10.7 million cubic meters, 15% higher than 2018.
- For the first time since the pulpmill starts operations in 2007, UPM imported pulp logs from Argentina during 2019.
- Woodchip Exports: First vessels exported during 2020, showed a decreased in FOB price close to 10 USD per BDMT. It is not clear if demand from Portugal will remain strong during 2020.
- Plywood Industry: During 2019, Uruguay's plywood exports were close to 215 000 m³, 9% less volume compared to 2018 exports. The FOB price also decreased by 20% during 2019 compared to 2018.
- Sawmills: Pine saw wood volumes dropped ~15% between 2018 and 2019 even though the average FOB prices remained similar. Eucalyptus saw wood volume dropped 14% and the price dropped 4%.
- Saw logs Exports: Pine logs exports to China dropped ~40% between 2018 and 2019 to a total of 1.2 million cubic meters during 2019. Most of this volume was exported during the first semester of 2019. Subsequently pine logs exports practically stopped, although a first vessel to India with pine logs departed in December 2019, followed by 4 more vessels in January-February 2020. Eucalyptus sawlogs exports to SE Asia dropped ~50% even though prices remained stable.

Africa

- The state-owned Zambia Forestry and Forest Industries Corporation (ZAFFICO) was listed on 12 February 2020 on the Lusaka Securities Exchange (LuSE). The company raised almost K300 million (USD 20.5 million) from the initial public offer (IPO), the first IPO in five years on this exchange.
- According to Forestry South Africa pulpwood production in SA is expected to increase during 2020 due to increased dissolving pulp capacity installed at Sappi Saaicor (eventually by 400 000 tons by 2022).
- The South African Government has announced measures to deregulate the renewable energy sector which could pave the way for more bio-energy plants associated with local saw- and pulp mills.











Global Consulting Alliance Locations

BM2C

Address: Av. Cândido de Abreu, 70 - Centro Cívico, Curitiba - PR, 80530-000, Brazil

Tel: +55 41 3319 5967 |

bm2c@bm2consulting.com | http://bm2consulting.com/

Häggblom & Partners Ltd

Address: Oy Aleksanterinkatu 21 A, 5.floor, 00100, Helsinki

Tel: +358 40 555 9567

rainer.haggblom@haggblompartners.com | http://haggblompartners.com/

Helsinki | London | New York | São Paulo | Singapore

Margules Groome Consulting Pty

Address: Level 4, 90 William St, Scottish House, Melbourne VIC, 3000, Australia

Tel: +61 3 8199 7937

info@margulesgroome.com | http://www.margulesgroome.com/

Australia | New Zealand | Europe | South Africa | China

Mason, Bruce & Girard, INC | Natural Resource Consultants

Address: 707 SW Washington Street, Suite 1300, Portland, Oregon, USA

Tel: + 1 503-224-3445 info@masonbruce.com

PIKE & CO Consultora Forestal

Address: Costa Rica 1566, 11500 Montevideo, Uruguay

Tel: + 598 2605 6234 +598 2605 6235

info@pike.com.uy









