

PAPER, PACKAGING AND FIBER MARKET NEWS AND PRICES FOR NORTH AMERICA

April US boxboard prices steady with recycled increases set for May; virus-related demand drives up shipments

US boxboard market contacts described an overall strong uptick in demand in April related to the Covid-19 pandemic, especially with consumers crowding supermarkets and other essential retailers for packaged food and pharmaceuticals.

Prices were unchanged in April from mid-March, when the uptick began, with greater chatter from sources over just announced \$50/ton price increases on recycled grades effective May 7-15.

"It's naked opportunism," one folding carton converter said about the timing of the increases, "acting as quickly as they "" continued on page 8

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US BSK pulp rises up to \$30 in case-by-case hike, spot NBSK surges due to tissue; downtime season choppy

North American pulp markets are seeing broadly mixed supply and demand fundamentals during a time when seasonal demand typically rises and mill stocks drop due to spring downtime season. Nothing is typical this year though, because the ongoing coronavirus (Covid-19) pandemic continues to roil global pulp markets, with a lack of contract workers forcing producers to readjust maintenance outages and end products such as tissue, diapers, and medical supplies leading some consumers to snap up pulp supply.

The cross currents resulted in an uneven month on pricing as bleached softwood kraft (BSK) producers moved to ... continued on page 19



'Panic' buying slows, as March US box volume jumps, April demand called good, and demand 'storm' hovers

US March actual box shipments increased to their highest level for the month in 20 years, based on figures released by the Fibre Box Association (FBA) on Apr. 16. The almost record performance last month was short-lived, at least in the eyes of market players. Contacts this week were already bracing for what they expect to be a box demand downturn, possibly as early as May or more likely in June and July.

They cited the anticipated reduction from the designation of "nonessential" business due to the Covid-10 coronavirus that has led to the closure of thousands businesses such as in ">>> continued on page 12

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Specialty paper

Digester explosion shuts down Pixelle's Androscoggin mill; paper machines not damaged

An explosion at Pixelle Specialty Solutions' Androscoggin pulp and paper mill in Jay, ME, at about mid-day on Apr. 15 will prevent the mill from producing pulp "for a significant period," Pixelle's human resources mgr Roxie Lassetter said on Apr. 16.

The explosion was believed to have been caused by a rupture in a pressure vessel of a digester. The three paper, and packaging board and paper machines at the mill were not damaged and "we are exploring options to resume paper machine operations as soon as possible to serve our customers," Lassetter said.

She added that "we are not in a position to estimate the exact timing of restorting any part of the mill."

The Androscoggin mill's total capacity is about 450,000 tons/yr.

The mill employs about 500 workers, and about 200 were on site when the digester exploded. There were no injuries due to the explosion, according to Pixelle.

Lassetter said the explosion caused a mixture of wood fiber, water, and pulping liquor to rain down over the mill site.

"At this point, we are evaluating potential environment impact," she said.

In mid-February, Pixelle acquired the Androscoggin mill from Verso along with a specialty paper mill in Stevens Point, WI, for \$400 million. Pixelle was formed in 2018 by investment company Lindsay Goldberg.

Androscoggin operations. The Androscoggin mill was making release liner label paper on Androscoggin's paper machine No. 4 and food contact papers on No. 5. The No. 3 paper machine was converted to unbleached kraft linerboard by Verso in 2018. It was making kraft linerboard and bag paper, and mostly market pulp, which may have led up the explosion, according to contacts.

When Pixelle acquired the Androscoggin mill from Verso earlier this year, it was unclear if the company would continue making linerboard.

In an interview with Fastmarkets RISI's PPI Pulp & Paper Week in February, Pixelle CEO Tim Hess said the company would make a decision on the future of the paper machine No. 3 – also known as A3 – during the first quarter. But after the explosion, the company may have to change its strategy for A3, according to Hess.

Frustrating situation? When acquiring the Androscoggin and Stevens Point mills, Pixelle waited several months for Verso shareholders to approve the sale, as Verso and its main shareholder Atlas/Blue Wolf were in a dispute involving the two mills being sold to Pixelle. Atlas/Blue Wolf had claimed the two mills were being under-valued in terms of the amount to be paid for them.

After the acquisition was completed, Hess announced that Pixelle had become the largest specialty paper producer in

North America, with 12 machines at four mills and about 1.4 million tons/yr of capacity.

Besides the Androscoggin and Steven Point mills, Pixelle's other two paper mills are in Chillicothe, OH, and in Spring Grove, PA, as well as a converting facility in Fremont, OH, and wood sourcing operations.

With the four specialty paper mills, Pixelle produces various specialty paper grades including food contact paper, high-speed inkjet paper, release liner, carbonless and forms, envelope paper, greeting cards, trade book paper, and paper for playing cards.

--by rmercante@fastmarkets.com

Printers

LSC files for Ch 11 driven by high debt, demand drop

Major US commercial printer LSC Communications voluntarily filed for business reorganization under Ch. 11.

The company's decision this week follows attempts and ongoing efforts to reduce the company's debt and "better position LSC to compete and deliver exceptional products," LSC stated in a release.

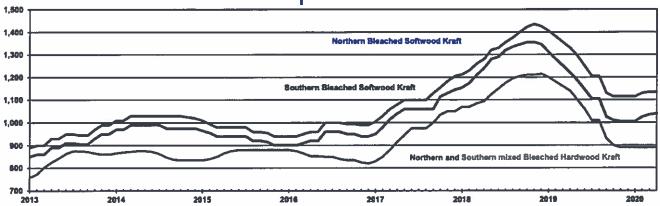
LSC continues operating in the USA, and its subsidiaries in Mexico and Canada are not included bankruptcy.

At the end of December, LSC's total debt was at \$910 million. LSC expects debtor-in-possession financing of \$100 million.

» continued on page 20



PRICE WATCH: Market Pulp



Effective list price before regular volume and customer discounts. US\$/metric tonne unless otherwise noted.

	C	urrent months	Year-to-year			
US (DELIVERED IN EAST)	Apr. 2020 Preliminary ¹	Mar. 2020	Feb. 2020	Q1 2020 A	or. 2020	% chg.
Bleached softwood kraft	Survey (Silver)					
Northern (Canadian)	1,135 - 1,165	1,135	1,130	1,127	1,135	1.3
Southern (US)	1,050 - 1,070	1,040	1,025	1,023	1,040	1.9
Bleached hardwood kraft						
Northern and southern mixed (Canadian/US) ²	890	890	890	890	890	0.0
Eucalyptus	890	890	890	890	890	0.0
Specialty grades	The second second					
Unbleached softwood kraft (Canadian/US)	1,070 - 1,100	1,070	1,065	1,060	1,070	1.4
Fluff (US southern kraft, untreated softwood rolls)	1,150 - 1,170	1,140	1,120	1,122	1,140	1.8
Deinked (US air-dried and wet-lap,	770 - 780	765	760	762	765	1.3
100% post-consumer for printing/writing)						
Spot Markets ³					4 100 40	
Northern Bleached Softwood Kraft	630 - 670	615 - 655	610 - 650	630	635	2.4
outhern Bleached Softwood Kraft	540 - 580	540 - 580	535 - 575	552	560	0.0
Northern and Southern Bleached Hardwood Kraft	480 - 520	480 - 520	480 - 520	500	500	0.0
EUROPE (CIF)	Pending ¹					
leached softwood kraft						
Northern (Canadian/Nordic)	840	840	840	833	840	0.0
Southern (US)	800	800	800	793	800	0.0
Bleached hardwood kraft						
Northern mixed (Canadian/US)	640	640	640	640	640	0.0
Southern mixed (US)	630	630	630	630	630	0.0
pecialty Grades						
Fluff (US southern kraft, untreated softwood rolls)	1,150 - 1,170	1,140	1,120	1,122	1,140	1.8
ASIA (CIF)	Pending ¹	•	•			
APAN						
Bleached softwood kraft						
Northern (Canadian)	680	680	660	667	680	0.0
Southern (US)	600 - 630	600 - 630	570 - 600	595	615	0.0
Bleached hardwood kraft	000 - 000	300 - 030	370-000	373	0,5	0,0
Jorthern and southern mixed (Canadian/US)	500 - 510	500 - 510	500 - 510	505	505	0.0
OREA	300 - 310	300 - 310	200 - 210	505	303	0.0
Northern bleached softwood kraft	710	710	710	703	710	0.0
CHINA	710	/10	710	,03	, 10	0.0
Northern bleached softwood kraft - net 4	585	580	575	573	580	0.9
Marchen Meddled 201 (Magaria) F. 1161.	303	200	3/3	3/3	200	0.7

SPECIFICATIONS

All prices are best estimates of list prices before regular volume and commot discounts and are composite prices as apposed to median or average prices. Actual transaction prices may vary.

US prices include normal freight allowance for delivery to consuming paper mills, Export prices are CIF main European parts, Normal terms include a 1.5% discount for cash payment or 60 days, Prices may not reflect some existing contract discounts off list prices still in effect; in North America, typically 36-44%; in Europe, 22-30%; in Japan, 3-9%; in Korea, 13-16%; in China, 0% (The Canadian and European producers), BHK pricing varies according to species used for the pulp.

DISCLAIMER

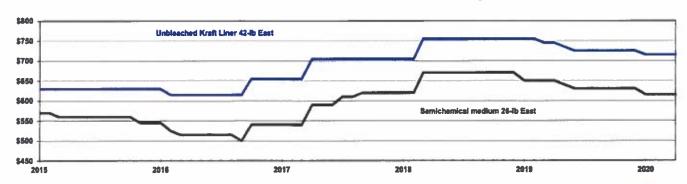
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NOTES

I. Preliminary and final prices: US = Mid-month PPW effective list prices shown are preliminary prices. End-of-month final prices published in PPW and World Pulp Monthly supersede these preliminary prices. Full details at: www.risl.com/PulpPriceChanges, Europe = Originally published in PPI Europe. Pending indicates prices are not available at the time of publication. Final prices are published in the next Price Watch issue. The exception is European fluff price assessments, which follow the same publishing schedule as US pulp price assessments and are formally sted to the US fluff price assessment. Asia = Final prices are reported at the end of the month. 2: Effective January 2016, NBHK and SBHK were merged into a single assessment. See www.risl.com/PulpPriceChanges for details, 3. Spot prices are mid-point weighted averages for biweeldy orders up to the publication date. Prices are net delivered with 0% discounts. 4. As at January 2020, NBSK net China reflects the last price assessment for NBSK from North America/Scandinavia CIF China (imports) as published in PPI Asia. As of mid-Apr 2020, Canadian NBSK was trading at \$570-580/tonne, r = revised



PRICE WATCH: Containerboard/Kraft Papers Domestic



Delivered, US\$ (unless otherwise noted)			Year-to-	Year-to-year			
CONTAINERBOARD	Unit	Apr. 2020	Mar. 2020		Feb. 2020	Apr. 2019	% chg
DOMESTIC OPEN MARKET PRICE							
Unbleached kraft linerboard (42-lb)							
East	sh. ton	\$710-720 *	\$710 - 720	*	\$710 - 720 *	\$740 - 750	-4.0%
West	sh. ton	710 - 720 *	710 - 720	*	710 - 720 *	740 - 750	-4.0
High performance linerboard (35-/36-lb)					3-1-1		
East	sh. ton	720-730 *	720 - 730	*	720 - 730 *	750 - 760	-4.0
Recycled linerboard (30-/31-lb) ¹					THE REAL PROPERTY AND ADDRESS OF THE PARTY AND		-
East	sh. ton	630-640 *	630 - 640	×	630-640 *	650 - 660	-3.1%
West	sh. ton	630-640 *	630 - 640	*	630-640 *	650 - 660	-3.1%
White top linerboard (42-lb)							
East	sh. ton	950-960 *	950 - 960	*	950 - 960 *	960 - 970	-1.0
West	sh. ton	950-960 *	950 - 960	*	950 - 960 *	970 - 980	-2.1
Corrugating Medium (26-lb semichemical)							
East	sh. ton	610-620 *	610 - 620	*	610 - 620 *	645 - 655	-5.4
West	sh. ton	610-620 *	610 - 620	*	610-620 *	645 - 655	-5.4
EXPORT LINERBOARD - Unbleached kraft							
175-g+ Southern Europe (CIF)	tonne	€ 445-465 *3	€ 420 - 440	*	€ 405-425 *	€ 510 - 520	-11.7
175-g+ China (C&F)2	tonne	550-570 *1	520 - 550	*	520-550 *	640 - 660	-13.8
42-lb Laredo border/Mexico (FOB)	tonne	600-610 *3	600 - 610	*	600-610 *	650 - 660	-7.6
42-lb Central/South America (FAS)	sh. ton	510 - 520 *3	510 - 520	*	500 - 510 *	570 - 580	-10.4
KRAFT PAPERS							
Unbleached							8
Extensible multiwall sack, 50-lb	sh. ton	1,280 - 1,300 *	1,280 - 1,300	*	1,280 - 1,300 *	1,320 - 1,340	-3.0
Natural multiwall sack, 50-lb	sh. ton	1,125 - 1,135 *	1,125 - 1,135	*	1,125 - 1,135 *	1,165 - 1,175	-3.4
Grocery bag, 30-lb	sh. ton	1,310 - 1,330 *	1,310 - 1,330	*	1,310 - 1,330 *	1,350 - 1,370	-2.9
Bleached							
Grocery bag, 30-lb	sh. ton	1,640 - 1,650 *	1,640 - 1,650	*	1,640 - 1,650 *	1,640 - 1,650	0.0

NOTES

With the launch of new assessments for recycled linerboard, and lower basis weight assessments, l'astmarkets RISI has removed the footnate to this table containing indicative differentials for other containerboard basis weights and grades. As we add new assessments to our partfolio, we believe this footnate is no longer relevant.

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^{*}Discounting has been reported below price shown.

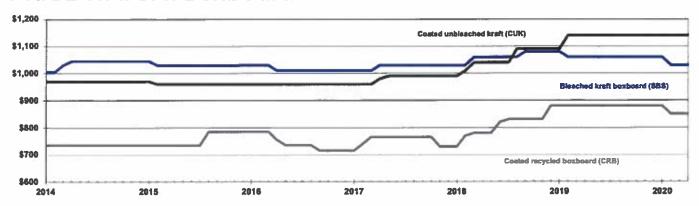
^{1.} Fastmarkets RISI launched assessments of 30-/31-th recycled linerboard in September 2019. A two year synthetic history was compiled by Fastmarkets RISI economists to coincide with the launch. These historical prices are meant as Indicative levels only and should not be considered formal Fastmarkets RISI assessments.

^{2.} From January 2018 the reference to Hong Kong was removed. This is a change in location name, not in methodology. Price includes all China parts.

^{3.} Future price increase announced by major producer (s) but not reflected in current data.



PRICE WATCH: Boxboard



Delivered, US\$/sh.ton (unless otherwise noted)

Current months

Year-to-year

BOXBOARD	Apr. 2020	Mar. 2020	Feb. 2020	Apr. 2019	% chg.
SERIES B PRICES¹					
Solid bleached sulfate board (SBS)	1.010 1.050	1010 1050	1.010 1.050	1040 1000	2.0
16-pt folding carton, C1S	1,010 - 1,050	1,010 - 1,050	1,010 - 1,050	1,040 - 1,080	-2.8
14-pt cup stock, PE2S	1,330 - 1,370	1,330 - 1,370	1,330 - 1,370	1,330-1,370	0.0
Coated unbleached kraft board (CUK)					
20-pt folding carton, C1S	1,120 - 1,160	1,120 - 1,160	1,120 - 1,160	1,120 - 1,160	0.0
Recycled folding boxboard (CRB, URB)					
20-pt clay coated news	840 - 860	840 - 860	840 - 860	870 - 890	-3.4
20-pt bending chip	690 - 710	690 - 710	690 - 710	720 - 740	-4.1

NOTE:

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Investment

Sonoco to invest \$83 million in URB system: convert medium PM, shut URB mill in Canada

Sonoco this week revealed an \$83 million investment in its uncoated recycled paperboard (URB) mill system in North America, including a conversion of a corrugating medium machine to URB and shutting a machine in South Carolina, increasing capacity in Wisconsin, and shutting a mill in Ontario.

"We are calling this investment Project Horizon, as we will be creating a much brighter future for our domestic URB mill system while resolving the volatility we have experienced as an independent producer of corrugated medium from our No. 10 machine," said Sonoco pres/CEO Howard Coker, "These investments will drive significant operating cost savings, ensure the long-term viability of our Hartsville (SC) paper mill complex and place our US and Canada URB mill system into the top quartile of performance from a cost perspective."

The majority of the investment involves "transforming" the No. 10 medium machine at its flagship Hartsville mill complex to a stateof-the-art URB unit with annual production capacity of about 180,000 tons/yr. The existing No. 10 machine has capacity for 193,137 tons/yr and dates to 1957. The project also includes shutting Hartsville's 26,775 tons/yr No. 3 URB coreboard machine that was built in 1950. The company said it will work with affected employees to transition them into other roles in the complex or provide retirement or other benefits.

^{*} Discounting has been reported below price shown

[#] Future price increase announced by major producer (s) but not reflected in current data

^{1.} Boxboard prices above and below these levels have been reported.

Fastmarkets RISI

PPI Pulp & Paper Week

Focus for large, low-cost
PM. The new URB machine will
be designed to be the largest
and lowest cost in the world,
producing a wide range of highvalue paper grades for industrial
and consumer converted products
businesses and external trade
customers, the company said.

The conversion will start with the development of a new recycled fiber stock prep system, which will allow the Hartsville paper mill complex to use a wide range of low-cost mixed paper and old corrugated containers (OCC). The No. 10 is a high-speed fourdinier machine that will be upgraded with new forming, pressing, and roll finishing/handling capabilities as well as new electronics and controls technology. Design work and stock prep development will begin in the second half of 2020, and the machine conversion should be completed and on-line by early 2022.

As part of the mill system optimization program, the company said it will increase capacity of its Wisconsin Rapids, WI, URB coreboard machine from capacity today of 93,891 tons/yr. A 7% increase will lift capacity to 115,000 tons/yr, a Sonoco official told Fastmarkets RISI's PPI Pulp & Paper Week.

Canada mill closure. Along with the URB No. 3 machine shut in Hartsville, Sonoco said it is permanently closing its 125,000 tons/yr Trent Valley, ON, mill due to market conditions. The mill produces 35,700 tons/yr of coreboard and 89,250 tons/yr of linerboard. The machine started in 1977, and the mill employs 100 workers.

A Sonoco official told local press in Ontario that the mill was also producing brown recycled pulp for export to China, but that had slowed due to Covid-19. Attempts to sell the mill last year were unsuccessful.

The company said it will work with Unifor Local 1489 to develop a closure agreement. Closure is expected by mid-June.

Unifor criticized the closure.

"The market for the kind of cardboard products made at this mill have never been in higher demand, so I refuse to believe this move is anything but an attempt to line shareholders' pockets," said a union official. "The timing could also not be worse as so many families are already struggling with job loss due to Covid-19. This is horrible news for this community and for the forestry sector in Ontario."

With the corrugating medium conversion to URB at Hartsville and the linerboard shut at Trent Valley, Sonoco will fully exit the containerboard market by the end of 2021.

While the closures revealed this week amount to a reduction of about 165,000 tons/yr of capacity, including about 41,500 tons/yr of URB grades by 2022, the official said the overall project will be "capacity neutral" as the company focuses on high-cost machines.

Cost savings. After the full ramp up of production, Sonoco said the investment is projected to provide about \$24 million in annual cost savings starting in 2023, while delivering returns well above the cost of capital.

"Sonoco also expects to drive additional savings from supply chain optimization, increased consumption of low-cost mixed paper along with environmental and power consumption savings," the company added.

Sonoco operates a large recovered paper collection and trading system, and is seventh or eighth largest consumers of recovered paper among North American mills, according to P&PW research.

Sonoco now produces just over one million tons of URB and holds a 40% share of the North American market, excluding gypsum wallboard. That is followed by Greif, 31%, WestRock, 12%, Ox Industries, 6%, Cascades, 4%, and other smaller producers, according to estimates based on Fastmarkets RISI data.

1Q 2020 results. Sonoco reported total first-quarter 2020 sales were down 3.6% to \$1.303 billion with operating profit up 11.3% to \$130.1 million. The company's paper and industrial converting segment revenues were down 4.2% to \$475 million and operating profit was 11.6% higher to \$54 million.

Segment sales reflected lower selling prices, declining volume/mix, and the negative impact of foreign exchange that were more than offset by sales from the acquisition of the Corenso mill in Wisconsin in August 2019, the company said in a press release. The lower volume/mix was driven by weakness in global tubes, cores, and cones, which was partially offset by improved volume/mix in North America paper and recycling operations.

Commenting on the company's outlook, CEO Coker said: "The only



thing certain about the rest of 2020 is there will be tremendous uncertainty. After a strong first quarter, we are projecting a difficult second quarter as the pandemic is expected to continue impacting the vast majority of the US, and most of the world, resulting in rising unemployment and market disruption."

He said the company expects paperboard operations in North America to be relatively steady as increased demand for board for the tissue and towel market should help offset declines from some of its industrial converted products businesses.

"Tubes, cores and cones volume are expected to be negatively impacted around the world, although there are pockets of

strength in other markets, such as plastic film," Coker added. "We expect recycled fiber prices to continue to increase during the second quarter, which is expected to benefit our recycling operations. However, despite many of our sales contracts having material cost recovery mechanisms and an expected cost-driven increase in general market pricing for recycled paper-based products, we expect these higher input costs will provide a difficult headwind to our paper and industrial converted products businesses."

Coker told analysts in an earnings call the "unprecedented increase" in recovered paper furnish costs in the first quarter will continue through second quarter, "which we will recover," referring to

URB price increases such as one announced this week for May 13.

Exec VP Rodger Fuller told analysts the company's tube and core business was seeing a "significant drop off" in demand with closures of printing and writing paper machines, offset by increased tissue paper and steady containerboard operations.

Coker added that the company had considered closing high-cost operations in 2018 but delayed action due to strong demand that continued into 2019.

"The reason we are doing Project Horizon is that we wish we had done it three years ago," Coker said.

--by imclaren@fastmarkets.com

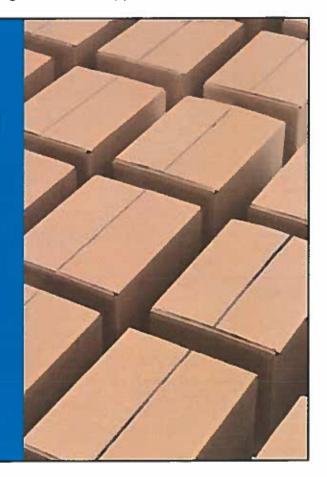
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URB, CRB price hikes set

>>> continued from page 1

did. It's a business decision but in poor taste."

"There is no way around the fiber increases," said a producer source, referring to a recent surge in recovered paper furnish prices. "They are substantial."

He called the Covid-19 related demand and the rise in recovered paper prices "a double whammy."

"The consumer product companies are just going to love this!," said a market watcher. "Recovered paper prices only matter when they are increasing."

"The last two years OCC (old corrugated containers) has had nothing to do with prices," said a recycled board buyer, noting a 2017 price increase that failed when OCC prices were high, and

multiple increases in 2018 when OCC prices were collapsing.

"I don't think it's warranted," said another converter source about the increases.

He said a CRB (coated recycled boxboard) producer had just adjusted prices lower due to a February decline in published prices.

Recycled boxboard prices in February were lowered \$30/ton reflecting ongoing discounting and spot sales through late-2019, a partial rollback from the tail end of \$100-150/ton in price increases on CRB and URB (uncoated recycled board) from 2018, according to Fastmarkets RISI's PPI Pulp & Paper Week pricing survey.

Price announcements. Graphic Packaging on Apr. 7 announced a \$50/ton (\$55/tonne) increase on CRB effective a month later on May 7, contacts told P&PW,

with PaperWorks Industries setting a \$50 hike for May 9. Greif added to the increase for May 13, and WestRock later informed customers it would raise prices \$50 effective May 15.

URB producers this week also set \$50/ton increases with Sonoco effective May 13, Ox Industries for May 15, and Greif for May 18, according to public announcements. Sonoco and Ox also lined up price hikes on URB tube and core by 7-8% effective May 13-15.

Market contacts interpreted the brief letters from CRB producers as driven by the sudden uptick in demand and also by the dramatic increase in recovered paper furnish costs. Benchmark average OCC prices surged by around 200% over four months of 2020 to \$71/ton in April, according to Fastmarkets RISI's recovered paper pricing survey. April OCC prices were up 77% from a year ago.

Sonoco added background to its URB price increase.

"It has been nearly two years since Sonoco's last URB market price increase, and since that time the company has experienced inflation on input costs such as starch and other papermaking chemicals, labor and fringes, repair costs and repair materials, and most recently significant increases in recycled fiber costs," a company executive said in a press release.

"The cost to operate and maintain our paper machines continues to increase," the company added. "It is critical we maintain margins on our uncoated recycled paperboard business at a level that enables us to continually reinvest in these

US boxboard grade summary – March 2020

Production (000 tons)	March 2020	% chg 2020/19	2020	% chg 2020/19
Solid bleached folding	176.7	-5.7	513.2	-1.4
Unbleached kraft & Gypsum	318.0	4.4	960.0	1.9
Total solid bleached board	459.0	-6.4	1,311.2	-4.8
Total liquid packaging/food service	266.2	-7.5	760.7	-6.3
Cup stock	67.2	-17.7	202.3	-14.7
Recycled coated	167.5	-0.2	492.0	0.0
Recycled uncoated	200.8	-1.1	586.2	-0.5
TOTAL BOXBOARD	1,145.3	-1.7	3,349.3	-1.5
Tube, can and drum	125.7	4.8	358.4	1.9
Solid bleached folding export	23.7	-22.7	72.1	-8.1
Operating rate (%) *				
Total boxboard	94.8	95.8	94.5	93.9
Unbleached kraft folding	87.8	93.3	90.3	92.0
Solid bleached folding	90.6	93.3	89.7	89.2
Total food service	101.9	99.3	99.2	96.4
Recycled coated	99.3	97.8	99.4	98.6
Recycled uncoated	96.7	96.8	96.2	95.4

^{1.} Includes folding, food service and white linerboard, excludes bristols.

^{*} Actual year ago operating rate, not percent change.

Source: American Forest & Paper Assn.



paper making assets to ensure uninterrupted supply of quality paperboard for our customers."

Sonoco this week announced a major investment in its mill system with a new large machine as well as two machine shuts (see p. 5).

"Both price increases are in response to cost pressures in labor, recycled fiber, transportation, chemicals used in production and other recycled paperboard input materials, as well as supply-demand balance," Greif commented about its increases on CRB and URB.

A few market contacts said the new increase is also targeted to offset the recent decline in prices.

"The February reduction is part of the equation," a producer contact said.

Demand surge. The uptick in demand was not limited to recycled grades as sources said solid bleached sulfate (SBS) and coated unbleached kraft (CUK) also picked up dramatically.

Trade data for March showed recycled shipments up 8-12% from the prior month and kraft grades 7-8% higher. Recycled was up 3-4% from a year ago while kraft grades were flat.

One recycled producer said business notched up 5% in February and was 25% higher in March-April.

"I don't have the capacity to keep up with that," he said.

He said most of the newer demand was for food products

and driven by consumer packaged goods (CPG) companies.

One CPG contact estimated a 20% increase in finished carton orders.

An SBS converter saw a "real surge in demand," for dairy-related packaging as well as cold and flu medicine "exploding."

"We're busy, and taking care of our customers," he added, estimating business was up 20%.

He wondered if the surge at supermarkets was "pulling future demand into the present."

"Will we see a fall-off? I don't know," he said.

"I would think this would be temporary once everything gets back to normal," said another carton converter about the increases, "unless a new normal sticks."

He said they would swing business to producers not enforcing the increases, "unless they all follow suit. There is still a lot of inventory in the market."

Another carton contact said board producers were shipping on time, meeting deadlines, and the surge at the grocery stores will get back to normal.

"Plus customers bought too much," he added. "There will be a Jull."

"To move that fast when so many people are out of work and hurting," said a buyer about the May price hikes. "I cannot believe they would not hold off." "No one has ever seen this in their lifetime. Where is it going?"

March statistics. Production in most grade categories were lower in March from a year ago but showed some of the uptick in demand that began in midmonth and has continued in April.

SBS folding carton production for example was down 5.7% from a year ago but 9% higher from February. Cupstock showed a drop of 17.7% from a year ago but was 4.7% higher month-to-month.

Total SBS shipments in March were up 7% from February and flat with a year ago at 451,200 tons, and year-to-date were up 0.7% to 1.32 million tons. Inventories at 538,600 tons in March were slightly down from a year ago. Total unmade orders at 492,200 tons were up 13.6% from February and were off 1.5% from a year ago.

CUK shipments in March were up 8% from the prior month and off 0.8% from a year ago at 337,000 tons, and year-to-date were up slightly to 981,400 tons. Inventories at 170,800 tons were 12% higher.

CRB shipments in March were up 12.3% from February and were 3.3% higher from a year ago at 168,900 tons. Inventories jumped 78% from a year ago to 90,400 tons. Unmade orders at 126,100 tons in March were up 6.6% from February and were down 12.6% from a year ago.

URB shipments were up 8.5% in March from the prior month and were 3.7% higher than a year ago at 204,700 tons. Inventories at 83,700 tons were down 11% from a year ago. Unmade



orders were 6.7% higher from February and up 1.8% from a year ago at 160,700 tons.

--by imclaren@fastmarkets.com

Recovered paper

OCC, SOP pricing remains up, supplies way down as some suppliers must cancel some POs

Prices for old corrugated containers (OCC) that popped up \$35/ton last week in the USA were not showing any decline this week, and mills were said to be continuing to add stock as the volatile domestic recovered paper market marches on among an unprecedented lack of generation that has suppliers canceling purchase orders due to the supply shortage.

US OCC supply is "in havoc" and under "extreme pressure," buyers and sellers told Fastmarkets RISI's PPI Pulp & Paper Week this week.

Supply of US sorted office paper (SOP) has "more of a shortage," some contacts said, from the shutdown or reductions at print houses while tissue paper demand has surged, including one company that recently started up a shut machine. SOP pricing surged by up to \$45-50/ton in April, and pricing has not let up this week, contacts said.

An uneven playing field has emerged, contacts described for the US market. It is based mostly on whether a business is deemed "essential" or "non-essential" and remain operating during the coronavirus pandemic. This designation determines

supply on the front end of the recovered paper supply chain.

This rule specifically affects schools, restaurants, offices, and other key sources of OCC that have since dried up.

This supply-shock supported the surge in domestic OCC prices in April, when OCC's average US price increased to \$71/ton at the FOB seller's dock, a price last seen in November 2018, according to P&PW's Apr. 6 pricing survey. At just \$24/ton in January, US OCC's average jumped 196% nationally in April from the start of the year.

Pricing pickups for recovered paper have not let up, and will continue into May, contacts said. This week, one trader said for OCC, "We're getting \$50, \$75, \$100 over OBM." Another supplier said premiums for OCC and SOP are "rising by the day, sometimes by the hour."

A mill contact said: "Another price increase (is) coming in May. Prices have settled out now where they are (this week), but come May, I see significant increases."

The mill contact added: "There are significant premiums this week (for OCC)."

The generation of commercial and industrial OCC is down, while grocery OCC is up. Yet, the run-up in demand seen at grocery stores has started to let up in some areas. Contacts in the Midwest described tons from stores' distribution centers - Walmart, Target, Trader Joes, etc., - "coming in like gangbusters" until this week. Supply from stores like Target were described as "falling off

quickly because of the big-busy (demand) already happening."

One mill contact said OCC shipments from grocery stores into his plant are up 50-60% higher.

"That's starting to curb down a bit, but we're still above," the contact said.

Suppliers cancel POs. At the same time mills continue to seek fiber in high demand, suppliers are canceling POs as supply is tight. Traders said mills have asked them to ship as much as possible. Every supplier P&PW spoke to this week reported canceled or curtailed orders due to difficulties scoring supply.

A Midwest supplier, seeing the OCC shortage from automakers' plants and elsewhere, said: "We're getting loads canceled every day, and it's not because of the price, it's because they don't have it. Some mills are starting to freak out a little bit because they're seeing the collapse on the supply side."

There was one report recently of a board mill that had just a few days' supply.

Added another trader: "Yes, we've had to cancel some releases, but we're doing everything we can to fulfill orders for mills with contracts. I might have to pay more to get more (tons), but I'm not going to ask for more."

Another Midwest supplier said, "We've reached outside our freight comfort. People are saying, 'We like you, but we don't have the material."



Meanwhile, some containerboard mills plan to slow down as most US mills have been running strong so far this year – at 94% in the first quarter, far above a sub-90% rate in first-quarter 2019.

"I've heard some mills will have to shut down due to lack of supply," a mill contact said. "I just hope I'm not one of them. We're going full tilt."

The mill contact added: "I'm buying some tons out of the Northeast that normally went export, to build inventories up. We're in pretty damn good shape, more than some people. Some people are hurting."

Export sees less. While export demand proved strong in first-quarter 2020, domestic selling is at the forefront of many market players at the start of second quarter. With containers challenging to secure as supply chains are shaken up due to effects from the coronavirus globally and also as freight rates have increased, export orders are still there, yet in smaller numbers.

China's Ministry of Ecology and Environment recently issued a new round of recovered paper import permits, totaling 1.17 million tonnes, and amounting to 4.39 million tonnes so far for 2020. In its fifth batch this year, total recovered paper licenses are off 43% from the 7.76 million tonnes approved for 2019 around the same time last year.

A "valve," as one contact described it, has been the pullback on export tons to sell domestic. By keeping OCC in the US the start of the second quarter, contacts said it has helped to meet US mill demand, and land higher pricing.

"We haven't been even entertaining (export) because there's no supply and there's no cans," one trader said. "It's hard to get containers. There's really no need to take the risk shipping (OCC) overseas when you can get the price domestically."

Another contact said his company has stopped 75% of export to internalize.

The contact added: "The domestic buyers would not lose the tons to export. The increase we saw in April probably would've been twice as much if export was in the game more."

A mill in the Midwest is pulling OCC tons out of Texas, "and they would never pull from Texas," a contact said of the move.

SOP surging. The significant demand increase in tissue products nationwide has kept tissue mills running strong. With such a supply shortage of SOP, tissue mills have turned to other deinking grades, pushing up pricing and demand for these grades. Pulps substitutes, too, have seen a pricing pickup with demand as mills seek enough furnish to fill orders.

"We're buying those grades now because we're in competition for them," a mill contact said of manifold white ledger and lightly printed solid bleached sulfate paper.

Downtime? This week, a slowdown in finished orders was reported for boxes that might eventually cause a reduction in ordering OCC, with one supplier contact saying: "One large customer cut orders in half, which is probably 2,000-3,000 tons because they don't have orders on the box side of things."

When asked about containerboard downtime in the Midwest, the contact said: "We haven't seen it yet on the brown side, but my opinion is that probably is the next step where we may start seeing the demand side slow, and ... (then mills) taking downtime."

• US exports of old corrugated containers (OCC) were down 15.6% in February, when comparing 2020 vs 2019, and were down by 19% year-to-date in the first two months of this year, based on US government trade figures. Year-to-date, OCC exports to China totaled 245,884 tonnes and were down nearly 35% compared with the US OCC exports to Ching in the first two months of 2019, Also, US OCC exports to India were down 16.1% year-to-date at 92,951 tonnes. The OCC exports year-to-date increased to Vietnam, with the total up 34.5% to 78,909 tonnes, and to Taiwan, with the total up by 10.4% to 54,101 tonnes.

--by mworkman@fastmarkets.com

Containerboard

New summer capacity on tap for startup as potentially a 4th kraft liner PM goes down

As many as four US unbleached kraft linerboard machines appear to be out of operation, after an explosion this week at the Pixelle Specialty Solutions Androscoggin mill in Jay, ME. A pulp digester exploded.

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Pixelle's Jay A3 machine is the third or fourth unbleached kraft linerboard machine unexpectedly shut in the last six to seven weeks. An International Paper (IP) recovery boiler was damaged on Mar. 3 at its Bogalusa, LA, mill that caused a shut of one of two kraft linerboard machines. The second Bogalusa kraft linerboard machine was supposed to be restarted in the "second half of April," an IP official told Fastmarkets RISI's PPI Pulp & Paper Week on Mar. 17. Two other IP kraft linerboard machines in Rome, GA, were shut due to a fire on Mar. 14.

The capacity of the three IP PMs is estimated at 900,000 tons/yr. The annual capacity for A3 was for making kraft linerboard was 190,000-200,000 tons/yr but based on reports from the market this week, the A3 did not appear to making anywhere near that total for kraft linerboard, since its majority output was of market pulp. Contacts said the A3 was mostly making the market pulp, along with unbleached kraft linerboard and bag kraft paper.

"The pulp digester was significantly damaged and as a result the mill will be unable to produce pulp for a significant period," Pixelle said on Apr. 16. "The paper machines were not affected and we are exploring options to resume paper machine operations as soon as possible to serve our customers."

Pixelle Specialty Solutions CEO Ken Hess told *P&PW* in mid-February that the company was in the "final stages of decision making for A3's mix and communicating to customers" if the machine would continue making unbleached kraft linerboard.

Following the explosion on Apr. 15, Hess told *P&PW* that "while I was prepared to give you a definitive answer with the closing of Q1, I am no longer in a position to do so." He said the explosion "may impact our strategy for A3."

The A3 started making 190,000-200,000 tons/yr of lightweight kraft linerboard at an average basis weight of 26-lb in about third-quarter 2018. Contacts have claimed that the output was originally for export but that position was not or was hardly developed.

McKinley Paper startup. Also, McKinley Paper was expected to start up a 180,000 tons/yr recycled containerboard machine this summer in Port Angeles, WA, industry contacts told P&PW. At the former Nippon Paper groundwood paper mill, McKinley at the end of February already started up a smaller machine, with 60,000 tons/yr of capacity, for recycled kraft paper output. McKinley owns US Corrugated, which operates corrugated plants throughout the USA, and is expected to be integrated much of the Port Angeles containerboard, industry contacts claimed.

One industry contact suggested that the summer startup might be delayed especially if old corrugated container (OCC) prices remain elevated. OCC pricing for US domestic mills is up by 150-200% in the South and Midwest, and up 175% in Pacific Northwest, since January. Mills began stockpiling OCC when the virus was called a national emergency a month ago.

WestRock startup. In addition to Port Angeles, WestRock was to start up a large unbleached kraft linerboard machine in Florence, SC, in the first half of this year. The 710,000 tons/yr machine replaces three smaller machines and is an actual new capacity add of 30,000 tons/yr.

IP Riverdale startup. Also, IP was said to be buying OCC for its Riverdale mill in Alabama, where it was said to be planning to start up a converted uncoated freesheet machine that would make bleached white top linerboard and containerboard. Initially, contacts told P&PW the converted PM would start in April, and later, before the coronavirus outbreak, they said it would start up in the second or third quarter. The most recent report in the last two weeks was that IP wanted to hurry the Riverdale conversion startup, because of the unexpected shuts at Bogalusa and Rome.

If Riverdale, Florence, and McKinley all start up, along with ND Paper at Rumford, ME, at yearend, Norpac increasing capacity at Longview, WA, that has already occurred since fourth-quarter last year, and Verso at Duluth, MN, early this year, that totals 980,000 tons of additional containerboard capacity for full-year 2021. The 980,000 tons represents just almost 3% US containerboard production in 2019.

--by grudder@fastmarkets.com

Liner demand concerns

>>> continued from page 1

automotive, furniture, and textiles, and caused 10 million Americans to file for unemployment in the last two weeks of March.

A mid-sized integrated company official said sheet plant output had



declined markedly, because of its connection to the non-essential, durable manufacturing. The contact suggested that April box shipments may falter or, at best, not grow.

"There's not enough nondurable (volume) to cover the drop in durable," the contact said, looking at May orders.

His view was not uncommon.

June, July concerns.

Integrated and independent boxmakers contacted this week and last by Fastmarkets RISI's PPI Pulp & Paper Week slightly reworked their business outlooks. Last month, they reported strong box demand and expected good demand for April. This week, boxmakers said they expected a good April and possibly an OK May, followed by a demand recoil overall in both June and July that may also be creeping into the market in May. One contact with a mid-sized integrated firm even told of a strong chance for mill downtime this summer, possibly similar to what occurred in fourth-quarter 2018 when a global export linerboard oversupply caused significant US mill downtime.

"I think it will be a hard, challenging time ... meeting our budget in May," said an integrated producer who still envisioned slight box business growth for May.

"There will be more e-commerce business but it will not make up for the lost industrial (and non-essential) demand," said a packaging analyst. "It's very much the calm before the storm."

"We're just waiting for the other shoe to definitely drop," said an

US Containerboard/Box statistics – March 2020

(000 tons)

	Mar. 2020	% chg. yr ago	YTD 2020	% chg. 2019
Box shipments '	34.739	9.0%	98.981	4.3%
Average week		4.0		2.7
Containerboard consumption	2,865	10.3	8,198	5.1
Production				
Linerboard	2,255	10.9	6,677	8.5
Corrugating medium	958	7.3	2,817	5.8
Total containerboard	3,212	9.8	9,494	7.6
Exports/imports				1
Linerboard exports	431	39.0	1,301	43.8
Containerboard imports	113	-2.6	346	-0.6
	Mar.	Feb.	YTD	YTD
Operating rates (%)	2020	2020	2020	2019
Linerboard	92.6%	92.3%	93.4%	88.1%
Corrugating medium	95.2	96.0	95.4	92.9
Total containerboard	93.3	93.4	94.0	89.5
	Mar.	Feb.	Mar.	Chg. (tons)
Containerboard inventories	2020	2020	2019	prior month
Mill Inventories	397	405	399	-8
Box plant inventories	2,128	2,298	2,335	-170
Total inventories	2,525	2,703	2,734	-198

^{1.} bsf=billion ft1. YTD=year-to-date, n.a.=not available.

FBA to release box shipment and inventory statistics Feb. 1 after annual audit.

Source: Fibre Box Assn, American Forest & Paper Association, US Bureau of Census (imports).

US containerboard inventories at box plants and mills

(000 tons)

	20	2020		2019		2018		2017	
	Tons	Week's Supply	Tons	Week's Supply	Tons	Week's Supply	Tons	Week's Supply	
December			2,526	3.9	2,659	3.9	2,379	3.6	
November			2,417	3.6	2,561	3.9	2,335	3.5	
October			2,395	3.7	2,482	3.9	2,350	3.6	
September			2,499	3.8	2,588	3.9	2,379	3.6	
August		i I	2,555	4.0	2,566	4.1	2,393	3.8	
July			2,580	3.9	2,564	4.1	2,421	3.7	
June			2,489	3.8	2,381	3.8	2,323	3.7	
May			2,587	4.0	2,408	3.8	2,334	3.7	
April			2,613	4.1	2,437	3.8	2,389	3.7	
March	2,525	3.9	2,734	4.4	2,428	3.9	2,359	3.9	
February	2,703	4.3	2,787	4.5	2,396	3.9	2,492	4.2	
January	2,722	4.3	2,835	4.5	2,500	4.1	2,467	4.0	

n.a.=not available.

Source: American Forest & Paper Assn., Fibre Box Assn.

official this week at an integrated US containerboard producer who expected a dramatic consumer spending downturn in the summer.

Even so, one corrugated contact colorfully told of a UPS driver claiming to be so

busy with box deliveries that he termed it "like Christmas times 10 right now."

March actual shipments totaled 34.739 billion ft². The last times that March actual shipments exceeded that level

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were in 2000 at 36.0 billion ft² and 1999 at 35.7 billion ft², based on *P&PW* research.

The rise-up in March shipments resulted from the virus outbreak that the US government declared a national emergency on Mar. 13. Panic-buying erupted in stores as well as online, causing as some boxmakers called it last month, a "surprise surge" in food and consumer product purchases. P&PW reported the March surge before it was made official by the FBA report based on interviews with boxmakers the last four weeks. Some plants were running overtime shifts and on weekends, and as fast as they could. Some orders were made and filled in as fast as 16-17 hours, contacts told P&PW.

"It is make-it, ship-it," one Chicagoland boxmaker told *P&PW* this week.

All told, in an indication of the impact of the virus in the USA in the last month, there were about 3,000 cases reported a month ago, while there were more than 680,000 on Apr. 17. A total of about 330 million Americans are now under a shelter-in-place rule for nearly a full month. Along with the buying in grocery and other stores, there was also a demand surge for buying products online, with the most ordered product categories being disposable gloves, packaged food, soup, cough and cold medicine, and bread machines.

The March actual box shipments were up by 9% over March 2019 shipments and were 7.3% better on an average per-calendar-day basis than February 2020 shipments. On an average-week basis, with one more shipping day last month at 22 days than in March 2019, March 2020 shipments grew by 4.0%. Year-to-date actual shipments

were up 4.3% at 98.981 billion ft² and up 2.7% on an averageweek basis, the FBA reported.

Even with strong March box demand, US mills did not run at a high rate. The March operating rate was 93.3%, possibly indicating that mills were seeing a possible production decline by May or June. The American Forest & Paper Association (AF&PA) figures showed that the containerboard inventory at box plants and mills declined 178,000 tons to 2.525 million tons.

Other market dynamics this week were a slowing of "panic" buying and still-strong enough domestic containerboard mill demand including one major producer who reportedly pushed forward export order commitments from April to May, contacts told P&PW.

"It went stop last week (the week of Apr. 6). Down 20%. No furniture. No automotive. It's only food and medical now," explained one boxmaker in the East.

A few boxmakers told of canceling containerboard orders this month or maybe not until next, concerned about building up board inventory when they thought there might be potential for lower linerboard prices this summer.

"It's a different world now," one boxmaker added.

Others heavy in making boxes for food and related, and tissue packaging told of still running overtime shifts. Yet another company with big Amazon business told of being 30-40% above its targeted volume.

Domestic linerboard prices hold. US domestic pricing for April levels remained unchanged from

March for both unbleached kraft linerboard, including the 42-lb benchmark, and also for 30-/31-lb recycled linerboard, and there was no change on any containerboard price in the domestic marketplace, according to *P&PW*'s price survey of the open market.

Export prices up in two markets.

It was the export market where prices did increase for a second straight month. Still, for kraft linerboard going to Mexico and offshore, industry contacts did claim to have more export orders than they could handle. This surprisingly occurred also as mills appeared to eliminate spring machine maintenance downtime. One industry contact expected these maintenance shuts would be moved to the fall or in June or July, when some believe box demand will be harshly reduced.

Export to China. For export, US kraft linerboard pricing increased to China for the first time in almost two years. The US 175-g+ level delivered CIF to main ports in China was up \$25/tonne to \$550-570/tonne. China's demand appeared to be subtly improving in the face of the pandemic. China did announce last week the reopening of the city of Wuhan in eastern China, where the virus started late last year. Wuhan began to reopen after a 76-day lockdown, international media reported.

US kraft linerboard also increased Euro 25/tonne to southern Europe (Italy and Spain) this month and is up by Euro 40/tonne the last two months. The export increase occurred as a domestic kraft linerboard increase in Europe was to roll though this month. The kraft linerboard increase followed a recycled linerboard increase last month. In addition, this week, two



producers in Europe announced price hikes for recycled corrugating medium, effective next month.

US prices held this month to Mexico and to South/Central America. For Mexico, the peso devalued significantly in the last month to about 24 peso to the dollar and US crude oil was at \$20/barrel, in half from where it was in mid-February. Several contacts with Mexican containerboard and corrugated companies said the devaluation was too steep for US producers to increase kraft linerboard, despite "good" box demand in Mexico. Instead, they believed that US kraft linerboard prices would face downward pressure. Two US suppliers shot down that view, noting that US kraft linerboard prices dropped by about \$100/ tonne to the Americas/Mexico and by more than \$200/tonne to China and Europe last year.

US boxmakers mostly spoke of "good" to "very good" March demand that carried into April at a smaller pace. But they added that shipment volume was a result of how much volume was essential, rather than non-essential. There were reports of some slowness in the first two weeks of April.

A Los Angeles contact, citing Walmart, Target, and Costco, acknowledged that "we're starting to see the panic buying slow."

For non-essential businesses, he said "it's about survival" for how they can relaunch and differentiate themselves. He said most were working on plans or already executing on-the-run before losing too much money, while also trying to qualify from US low-interest loans and CARES Act funding.

Another executive added that "it will take them a little time to get their strategies together in this new environment."

"The world has obviously changed," another pointed out.

At box plants, one industry contact claimed the "honeymoon might be over now in a few weeks," due to the rise in the number of virus cases in the USA. The contact noted the huge virus outbreak in the US Northeast and New York state, where some plants were slowed by ill workers and difficulties filling shifts.

"Some shifts (of workers) are getting tired with less backup," one contact said.

At some plants, it was mandatory for workers to wear masks and, at others, they were optional, and some temperature-tested workers again at mid-shift as well as the start, and had more in-plant workers wear hand-set communication devices, contacts told P&PW.

Several contacts estimated that the time to disinfect a box plant if a worker is found to have the virus or symptoms varied from two hours at a small plant to as long as a full day or more at a large facility.

• New-Indy Containerboard, a 50/50 joint venture of the Kraft Group and Schwarz Partners, announced that it acquired Shoreline Container, a Michigan-based paper and packaging company that operates a Holland, MI, facility that produces corrugated packaging products, and a Zeeland, MI, facility that distributes protective and specialty packaging materials. Shoreline COO Bob Zuker will remain with the company. "The addition of Shoreline Container is a great fit strategically to our existing operations and provides further integration for our mill system," New-Indy said in a release. New-Indy has continued to grow in the corrugated business as the company also contemplates when in the future it may converted a coated print paper machine to unbleached kraft linerboard output in Catawba, SC.

--by grudder@fastmarkets.com

Kraft paper

Uptick at grocers being feit by suppliers due to virus

Kraft paper industry contacts reported steady and good demand in the North American domestic and export markets, primary from business related to the coronavirus outbreak. They told of better unbleached grocery bag demand, partly due to some grocers who no longer allow customer reusable bags for bagging groceries because of the virus, and also some pickup for unbleached multiwall sacks for increased food business.

The positives this week seemed to outmatch the negative, which was for bleached kraft paper bags. Bleached bag demand was expected to drop in demand because of retail stores closed to foot traffic. Still, there remained click-and-collect pickup at some top-level retailers. One supplier told of an estimated 66% decline in bleached bag orders.

"Retail stores are all closed for the most part, so ... demand is soft for retail stores," added another industry contact.

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Industry contacts described to *P&PW* that grocery bag and sack demand was "good" in March and "seems to be normalizing" in April. One industry contact said "kraft paper has become prevalent again" at grocers now due to the virus, and a push back on reusable bags and plastic bags. Still, in some parts of the USA, grocers were still offering shoppers either paper or plastic for bagging their groceries.

One even suggested that the recent surge in old corrugated container (OCC) prices might lead to some higher bag pricing from recycled-content producers. The contact did not expect OCC domestic prices to lower in the next month.

"It might clean up the bottom of the market" in terms of the market pricing range, one industry contact said.

Cement out, cement in. Further, the Mexican government first designated cement business as non-essential before quickly switching it to essential. Cemex on Apr. 7 said it would resume operations in Mexico, just hours after announcing that it would halt all operations, Global Cement reported. Global Cement also reported this week that China in mid-April said construction projects that use cement had restarted.

Major global cement companies buy cement bagged in extensible kraft paper. Two North American companies are key extensible paper producers.

Two startups. On the mill production front, Kruger temporarily shut down its 55,000 tons/yr of kraft paper output on Apr. 3 at the Brompton, QC, mill. Kruger had been making kraft paper at the mill for roughly two years.

McKinley Paper started up at end of February a 60,000 tons/yr recycled unbleached kraft paper machine in Port Angeles, WA. The PM was once owned by Japan's Nippon Paper and made groundwood print paper. The machine is running trials for customers, contacts said.

West Linn Paper also began making kraft bag paper on its machine No. 3 about a week ago at its West Linn, OR, mill, a company official said. The company was in the process of having the paper tested. The West Linn mill restarted in November 2019.

--by <u>arudder@fastmarkets.com</u>

Woodfiber

US South offers abundant, cheap wood, yet often passed by as markets changed

Home to the deepest free market timber resource in the world, the US South remains the undisputed leader in US virgin wood supply, supporting over two thirds of all pulp and paper production and sustaining about 75 of the remaining 110 US pulp mills, according to market contacts.

The South's low-cost reputation is well-known based on market pricing history. Among many attributes, the region's softwood fiber is long-proven: cheap, abundant and reliable, the contacts added. So reliable, it's overlooked, taken for granted, even by companies dependent on it, sources pointed out.

Meanwhile, a buyer's market has prevailed for several years across the region. Over the last five years, wood prices traded in a historically low and narrow band, averaging \$33/ton delivered for softwood roundwood, the benchmark grade. And prices never varied more than \$2-3/ton (5-9%) annually over the period.

Early 2020 numbers to April confirm continuation of that low-cost trend, according to the price survey by Fastmarket RISI's Woodfiber and Biomass Report.

The vast South's two market sub-regions, South Atlantic and South Central, are each larger by volume than all others in the US: the Northwest, Northeast, and Lake states.

South Atlantic softwood prices averaged just over \$34/ton delivered the last four quarters while South Central was \$30/ton. Hardwood averaged \$35/ton and \$34/ton, respectively for the period for the South Atlantic and South Central.

Covid-19 effects on all this are yet to be reliably quantified. The latest data from Fastmarket RISI's pulp forecast shows only limited change in US wood pulp production in 2020.

Abundant, reliable, overlooked?

"We are overrun with plantation wood," explained a TIMO wood supplier, "growing too much" every year. This abundance comes at the same time when consuming companies slow or shut struggling paper machines and whole mills. US paper and paperboard mills today are producing roughly 75 million tons of year, compared with a peak of 96 million in 2000, according to American Forest & Paper Association (AF&PA) figures. During this dramatic decline, the hardest-hit segment that also had the highest virgin fiber furnish



demand was printing and writing paper. Since 2000, printing and writing shipments have dropped in half, from 27 million tons in 2000, according to the AF&PA. In addition, during this time, new capacity growth has occurred mainly in tissue and packaging segments, where US production is big in virgin furnish yet has seen a growing recovered paper position.

For years, during that falling consumption, wood supply has been easy and reliable for mills, with exceptions only during extreme wet weather, which are usually brief and buffered by seasonal wood inventories.

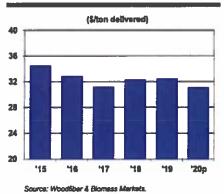
Overlooked. Because of that long-term reliability, the wood resource, while irreplaceable, is often overlooked, contacts said.

"It's rarely on the radar – if ever," summed a leading analyst.

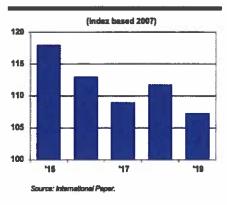
As example, largest buyer International Paper's (IP) wood costs dipped again last year in their favor. IP is the largest pulp and paper company in the world.

IP's 2019 wood cost number (index-based, not dollar) was lower by 9% since 2015, the

US South softwood roundwood prices 2015-20p



International Paper wood cost 2015-19



company reported. Factoring inflation, an additional 8% drop occurred over the period, providing the company its lowest real-dollar costs in decades.

Suppliers suffer. At the same time, the pricing condition underscores the long-running downshift in pulpwood. As Southern mills reduce pulp and paper output to 30+ year lows in 2019-20, softwood plantations march to decades-high growth peaks.

"We're now growing far more than the mills can use," of pulpwood and sawtimber, a veteran TIMO manager reiterated. "But we said that years ago."

Two dozen world-class softwood sawmills have ramped up in the South, mostly run by Canadian firms. The new chip output, counting several million tons of pulp furnish annually, displaces a similar quantity of roundwood. That shift leaves landowners with "big problems" to perform needed thinnings with everfewer outlets, contacts said.

Recovered fiber competes.

Adding to wood supplier woes, a rash of recovered fiber projects are underway in the

South, capturing almost all the industry's billion-dollar capital investments 2019-21. This new recovered fiber supply, in today's overall contracting market, further erodes virgin demand, contacts said.

Consolidation matters. At the same time, ever-more concentration in pulp and paper ownership the last several years leaves few wood buyers managing more market share: IP owns about 60% overall in the South; WestRock owns more than half in Virginia and elsewhere; Georgia-Pacific is dominant in large swaths of Florida, Alabama, and Mississippi, according to RISI market research.

Old handicaps remain true for wood: It's a local, low value product, half of it moisture and truck dependent. Most mills feed their needs within a 50-mile circle. Wood value quickly disappears on longer hauls.

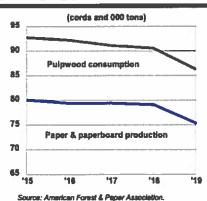
Oriented strand board (OSB), the largest non-pulp wood user, consumed about 25 million tons in the South last year, just a fraction of pulp and down from the prior year.

Export pellets. While pulp and paper wood demand withers, and OSB wood stumbles and stalls, only pellets provided reliable Southern demand growth over the last five years and into the next two to three years.

Last year marked strong performance and continued aggressive capacity expansions by pellet leader Enviva. The company is on track to expand its total consumption almost 50% within the next two to three years to 12 million tons across 10 mills,



US pulpwood, paper & packaging production 2015–19



including three expansions. That would propel the company into the top tier of all US wood buyers.

Bigger than big. The industry harvest numbers mask the enormity of the region's wood market: Pulp and paper consumed an estimated 140 million tons last year; that's equal to more than five million truckloads. Further, the biggest mills each require more than 3,000 loads per week.

Of that 140-million-ton gross, 75% is softwood (pine), the rest hardwood. By delivery source, 60% is direct from the woods by truck, about a third comes from chip mills, and sawmill chips make up the remaining 8%.

--by clyddan@fastmarkets.com

Print paper

Paper Excellence to curtail Crofton, Powell River paper mill output into mid-summer

Paper Excellence (PE) Canada is extending the curtailment of its paper operations at Powell River and Crofton mill in British Columbia (BC) into "mid-summer," the company announced on Apr. 16. Pulp production at Crofton will "run full" during this period, a company official told Fastmarkets RISI's PPI Pulp & Paper Week.

PE was already operating at lower capacity at the Poweii River and Crofton paper mills since a reported malware attack on Feb. 19 impacted operations at both mills. As a result, PE reportedly ran on manual processes to operate the mills and sell its paper for almost two months until it was able to recover most of its systems earlier this month.

The Crofton paper mill also had to stop in March due to lack of wood supply.

Now, the Covid-19 outbreak and its impact on graphic paper demand came up as a new driver for Paper Excellence Canada to slow down paper production. Fastmarkets RISI forecasts that North American newsprint demand will decline by 17.5% in 2020, while printing and writing paper demand is estimated to drop by 12.6%.

"Over the past six months, an exceptional intersection of events has negatively impacted our operations, including a material shortage of economic forest fiber on BC's coast; a significant external malware attack which rendered our paper business enterprise systems inoperable for a period of time. and from which we continue to recover as we work to restore all affected operations; and Covid-19 which has materially impacted the supply chain for many of the paper products that we manufacture," PE said in a press release.

Paper production. The Crofton mill has capacity of 310,000 tonnes/

yr of newsprint and 380,000 tonnes/yr of northern bleached softwood kraft (NBSK) pulp.

The Powell River mill can make 370,000 tons/yr of uncoated mechanical (UM), newsprint, and specialty paper.

PE said it will sell paper to its core paper customer base from its Port Alberni, BC, mill while reducing paper production at Powell River and Crofton. The company said it will also do intermittent manufacturing runs at the Crofton facility as opportunities permit.

The Port Alberni mill makes about 375,000 tons/yr of coated mechanical (CM), UM, and uncoated freesheet (UFS) papers.

PE also noted that due to Covid-19, its operating program for paper mills "is expected to continue to be highly fluid and the timeline may be modified in the coming months."

PE expects that decisions by Canadian municipal, provincial, and federal governments related to mitigation measures for maintaining business during the Covid-19 outbreak "will provide immediate needed relief for the paper industry."

The company also said that it remains committed to its long-term investment in BC.

• US printing and writing paper shipments decreased 4% in March compared with shipments in March 2019, according to the latest report released by the American Forest & Paper Association (AF&PA). Printing and writing paper purchases decreased 7% year-over-year, while inventory levels fell 4% in March compared with in February.



• The Los Angeles Times' daily newspaper advertising revenue has "nearly been eliminated," leading to salary reductions for sr managers on both the editorial and business sides of the company, and the furlough of "certain employees" on the business side for up to 16 weeks, according to an internal memo from pres/COO Chris Argentieri, media reports said earlier this week. "The decline in revenue from every area of our business is unprecedented," Argentieri said. The Los Angeles Times is the fifth-largest in circulation US newspaper, behind the Wall Street Journal, USA Today, New York Times, and the New York Daily News, based on estimates.

--by rmercante@fastmarkets.com

NBSK moves up in USA

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implement a round of hikes that ranged from \$35-55/
tonne depending on producer announcements, and where buyer and seller's starting points began. Preliminary April effective list prices for benchmark northern bleached softwood kraft (NBSK) varied case-by-case, and the list range broadened to \$1,135-1,165/tonne, flat to up as much as \$30/tonne, according to PPI Pulp & Paper Week polling.

"What the hell is going on, and why is pulp going up when most buyers are going be hurting and taking production down? It's pretty clear inventories will continue to grow. I've heard of guys putting off downtime until later this year. If inventories slowly rise through summer, then our suppliers will be sitting on inventory," said a North American

buyer contact, adding that his suppliers weren't pressuring him to accept higher prices.

"Two mills in BC (British Columbia) have market downtime next week, Cariboo and Northwood. Tissue (demand) is holding them up on crutches. I don't see how prices continue to rise," the market pulp buyer said.

The source was referring to Canfor Pulp, which has three weeks of downtime accurring at its Northwood NBSK mill in BC that will trim 35,000 tonnes of output but the firm isn't having workers perform maintenance work until fall. The Cariboo Pulp Mill, a joint venture owned by Mercer International and West Fraser, will shed 30,000 tonnes of market NBSK output as it idles for four weeks starting Apr. 20 due to a woodchip fiber shortage in BC. Whether it's marketrelated or Covid-19 and woodchip supply-related downtime, the outages at Canfor Pulp and West Fraser-Mercer Internationalowned NBSK mills tightened supply, producer contacts said.

"We've got so many issues dayto-day making sure supply lines are good to existing customers. Canfor is down, Cariboo is down, to make it simply," said an NBSK producer contact, adding that navigating pulp to North American customers remained a challenge. "If a few more sawmills go down, there could be more downtime or extensions (of downtime)."

Spot NBSK bounce. Producers of NBSK, focused on sending tonnes

to regular contract customers, reduced spot market activity after some buyers requested tonnes above their regular contract allocations. That led some to supplement their internal stocks in spot markets, where NBSK prices rose to \$630-670/tonne net delivered, up \$15/tonne, according to Fastmarkets RISI's PPI Pulp & Paper Week polling through Apr. 17.

Several producers that had maintenance downtime scheduled this spring are either pushing back outages by a couple months or waiting as late as fall. However, Domtar is proceeding with a plan to idle production in mid-May at its 330,000 tonnes/yr market NBSK pulp mill at Dryden, ON, for annual maintenance work.

Dryden NBSK clips 19,000 tonnes. Domtar originally planned on a nine-day outage at Dryden, which would've shed an estimated 8,200 tonnes of market NBSK output. However, industry sources said it has rescheduled the downtime for 21 days starting in mid-May. That will clip an estimated 19,000 tonnes of market NBSK output.

The change comes as travel issues industrywide mount amid widespread stay-at-home or shelter-in-place orders due to Covid-19. The trend has prompted many North American pulp mills to delay regularly-scheduled maintenance work until the fall, sources said. While Covid-19 has led to a shortage of contract workers, Domtar decided to proceed with its downtime using mostly mill

PIX - pulp indexes - April 7, 2020

NBSK-US Net Change (Jan 2016 = 100.00) March 2020: 109.59 (+0.17)

Fastmarkets

PPI Pulp & Paper Week

employees and minimal outside contractors. A smaller base of contract workers as well as social distancing practices and increased health monitoring will combine to make work at the facility more time consuming.

Fluff, SBSK rise \$10-30. In other key grades of BSK, southern bleached softwood kraft (SBSK) preliminary effective list prices rose to \$1,050-1,070/tanne, up \$10-30. Fluff pulp has tightened due to strong demand for diapers, adult incontinence products, femcare, and medical gowns made from fluff, sources said. As a result preliminary effective list prices also rose \$10-30, to \$1,150-1,170.

International Paper moved regularly-scheduled maintenance downtime at its its 573,000 tonnes/ yr Georgetown, SC, and 502,000 tonnes/yr Columbus, MS, pulp mills that produce SBSK and fluff pulp from April/May to August, P&PW learned. Resolute Forest Products meantime moved its April shutdown at at its 280,000 tonnes/yr Coosa Pines, AL, mill to August, sources also said. While such moves would normally lead mill inventories up, contacts said it's not the case at fluff mills thus far. Instead, the fall season of maintenance downtime will get crowded as producers compete for workers, and slash more output than normal during the fall.

"You'll have 12 months worth of maintenance outages consolidated into six. Most outages are getting pushed out because we can't get contractors," said a contact at a fluff producer. "You've got to get contractors to do maintenance work. Every mill is going to look at the second half of the year."

US SBSK spot prices held unchanged at \$540-580/tonne net delivered.

The grade had surged the first few months this year until narrowing the typical gap between SBSK and NBSK to \$70/tonne. Now, with NBSK spot prices rising once again, a contact at an SBSK producer said it "will be moving up in May."

When tissue frenzy ends. While producers won't stop pushing for higher spot and contract prices over the next month or two, US buyer contacts warned that a reversal could occur by June, especially if the tissue-driven buying rally eases. Once US households stop hoarding toilet paper, tissue mills will eventually catch up to demand and find consumers don't need as much supply, contacts have claimed for the last month. That would eventually crimp demand for pulp, they said.

"We're at the end of the pantryloading in sectors where tissue demand was propping up pulp demand," said a buyer contact for a tissue producer. "We are seeing indicators it's slowing down in China. In North America, we still at a point where we're selling as much as we can, it's not yet here but it will be. And printing and writing paper demand that came out of the system more than offsets the demand boost in tissue. Once tissue demand slows, these guys aren't going to have a case to be made [for raising prices]."

-by bryan.smith@fastmarkets.com

LSC files for bankruptcy

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Tortuous path. The bankruptcy occurs following LSC's failed attempt to merge with Quad/ Graphics last year and the

continued outbreak of the Covid-19 pandemic in the USA in the last month.

Looking forward, LSC
Communications chmn/pres/
CEO Thomas Quinlan III said
that the company has "closed,
or (is) in the process of closing,
eight facilities" and also that the
company has "new contracts."

Last year, LSC shut a book printing plant in Philadelphia, as well as two other printing facilities, one in California and one in Nevada. Earlier this year, the company announced plans to close print facilities in Strasburg, VA, Glasgow, KY, and Mattoon, IL, by July 2020.

Based in Chicago, IL, LSC was established in 2016 as part of a corporate spin-off from RR Donnelley. The company is the fourth largest printer in USA with 2019 revenues at \$3.8 billion, according to *Printing Impressions'* 400 ranking. Specialty printing (magazines, catalogs, and retail inserts) accounted for about 40% of LSC sales last year and book manufacturing for about 30%.

Hard hit on printers. Printing companies are being hit hard by the Covid-19 crisis, as their main driver – advertising – is drying up from so-designated "non-essential" business, according to Fastmarkets RISI's PPI Pulp & Paper Week contacts.

Quad/Graphics has implemented a number of measures to offset the pandemic effects, including plant closures, and cuts in employees and salary reductions. The company ceased operations at three book plants at the end of March in



Versailles, KY, Martinsburg (Baker Road), WV, and Fairfield, PA.

 Due to unexpected decrease in customer demand caused by the Covid-19 pandemic, LSC this week announced layoffs during a 14-day period beginning on Apr. 20 that impacts the majority of its workforce at the company's Baraboo, WI, printing plant. The staff reductions impact about 393 positions workers. The layoffs are being considered temporary through June 30, but may be extended, depending on market conditions and customer demand, according to LSC.

--by rmercante@fastmarkets.com

News briefs

Seaman Paper said it introduced a new paper-based solution to try to help minimize direct hand contact with high-contact common surfaces. High-Touch Barrier Tissue is an FDA-compliant paper, packaged with either 500 or 1,000 "grab-and-go" sheets, which can serve as a barrier between hands and high-contact surfaces. The Seaman Paper product is available in two sizes (6"x10.75" and 8"x10.75") of High-Touch Barrier Tissue that can be dispensed to customers at the "gas pump, in the grocery/ convenience store, or wherever many hands touch the same surface," the company said. "In this time of heightened concern over the spread of viruses, we are happy to be able to bring an innovative solution that can help keep everyone healthy and safe," says Seaman Paper owner Jamie Jones. "With protective gloves in high demand, our barrier tissue creates a paperbased alternative that has less of

an environmental impact while also helping to ensure that our medical professionals and other emergency workers retain access to crucial glove supplies."... Tissue product producer Royal Paper Converting purchased its fourth Gambini America Flex 700 Swing rewinder line. The line will soon be installed at Royal Paper's Arizona facility, according to Gambini America. Royal Paper operates three manufacturing facilities, and more than 1.3 million ft² of integrated production and distribution space... Case Paper said it acquired the assets this month of a former API Laminating, coating, and transfer metallization operation of Steel Partners in Osgood, IN. The former API plant's general mgr Jonathan Hummer, and most of the office and plant employees joined Case under the new name "Case Makes." Case Paper pres/CEO Robin Schaffer said Case Paper previously worked with API and he called the combination a "perfect fit" for Case Paper, and "our long term vision to consistently add value to customers

through inventories, converting equipment, locations, and people." "Additionally, it allows us to vertically integrate, control our supply chain, and improve our response time," Schaffer said, in a company release. The 117,000 ft² Osgood plant is near Cincinnati, Louisville, and Indianapolis, and "perfectly complements and adds to Case Paper's six national converting and distribution facilities," Case Paper general mgr of corporate operations Thomas McDonough said.

People news

Verso appointed Matthew Archambeau as Sr VP, Manufacturing and Energy, effective immediately. Archambeau has worked at Verso and its predecessor companies for 26 years in "various manufacturing leadership and technical roles, including his current responsibility for our Centers of Excellence," Verso pres/CEO Adam St. John said in a release.

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