SAPPI’S SOMERSET MILL

Equipped for optimal operational and environmental paper supply performance

NEWSPRINT

Prices have slipped for several consecutive months as demand weakness at home and abroad have led to an unbalanced market.
Unpack the power of Maximyze® for packaging.
Let Buckman help you improve sheet strength and increase productivity.

Buckman announces new Maximyze enzymatic technology for recycled packaging. It can significantly improve sheet strength and drainage, so you can increase machine speeds. With a customized Maximyze program you can reduce fiber costs, steam consumption, transportation costs and your environmental footprint too. No wonder it’s an EPA Presidential Green Chemistry Challenge Award winner!

Find out more. Contact your Buckman representative or visit buckman.com.

**Better drainage**
Production on a recycled linerboard machine was limited due to drainage. Buckman’s Maximyze application improved drainage, so machine speeds could be increased by as much as 100 mpm. Steam use was reduced 8%, and CO$_2$ emissions were reduced by 1806 metric tons per year.

**Reduced energy**
A core and tube producer wanted to increase production, have greater flexibility in its fiber selection and reduce energy use. Buckman applied Maximize to the pulper, which conditioned the fiber faster with less refining energy, preserving fiber strength. Speed increased 10%. Refining energy decreased 30%. And tensile strength increased from 20 to 26 kgf/15mm.
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Ok, I stole the title of my editor’s note from the Paper and Packaging Board’s recently unveiled campaign, “Paper & Packaging – How Life Unfolds™.” The $20-million consumer-focused campaign launched on July 8 and this year will run through December with 30-second TV commercials and print advertising (see story on pg. 8).

As you may know, the new campaign is the result of the Paper Check-off, which in 2013 was initiated by a panel of industry leaders. The program’s funding involved an assessment of 35 cents per short ton from producers and importers of printing and writing, containerboard, paperboard and Kraft paper.

On January 22, 2014, the U.S. Department of Agriculture (USDA) formally established the program after approval by the supporting parties through a USDA referendum. The program officially began on March 1, 2014.

A few weeks before the deadline of this issue of PaperAge, I was lamenting to my fiancé Carol that I was having trouble coming up with a topic to touch on for my editor’s note. Without hesitation she said, “Why don’t you write about the paper and packaging ads that are on TV?” Now I have to be honest; I hadn’t seen the ads on TV and had to ask, “What ads?”

“The feel good ads,” she replied. “The one about the granddaughter taking her grandfather to a baseball game is touching, and the one with the little boy and the paper airplanes with notes to his dad is precious.”

Really??!

Carol obviously knows what I do for a living, but isn’t exactly engrossed in the paper industry, if you know what I mean, so not only was I amazed that she recalled the substance of the ads, but happy to hear that the TV spots left her with a ‘feel good’ perception of paper.

As important, and for me personally, Carol’s “take” on the ads is proof positive that there is tangible evidence of progress being made to increase the attractiveness of our industry’s products and in changing the general public’s perception of their usefulness. If she took notice of the ads, it’s safe to say thousands of others did too.

If you’re not familiar with the Paper and Packaging Board, it’s mission (from the Board’s website: www.paperandpackaging.org), “…brings together the paper and paper-based packaging sectors to promote and increase consumer appreciation for paper and paper-based packaging, reduce guilt about using these products and deepen understanding of the industry’s environmentally-friendly practices.”

The Paper and Packaging Board and the people working behind the scenes creating the TV spots and other media campaigns have got off to an impressive start – and I witnessed the impact of such on a consumer, first-hand.

If you haven’t seen the new “How Life Unfolds” TV spots and other media campaigns promoting the usefulness of paper products, go to: www.howlifeunfolds.com and take a look. They’re very good, or as Carol would say, “touching.”
Now you can “triple your winnings” in your deinking process by reducing chemical costs *three ways with one additive!* DEKA can replace up to half of costly surfactants, improve pulp brightness, and lower ink residual numbers as well.

Sound too good to be true? In documented mill tests DEKA has replaced fully 50 percent of expensive surfactant dosage without adversely affecting deinking performance. And laboratory studies prove DEKA usage can increase pulp brightness up to 5 GE brightness points. Plus, additional lab deinking tests have demonstrated ERIC values lowered by up to 74 percent.

DEKA is also versatile—flotation or wash deinking processes both benefit from this revolutionary deinking aid.

Contact Thiele today for details on how your deinking process might benefit from using DEKA. We’ll be glad to show you the test results and set up a trial in your mill.
NORTH AMERICA

Neenah Paper Agrees to Acquire FiberMark for $120 Million

Neenah Paper, Inc. on July 20 signed a definitive agreement to purchase all of the outstanding equity of ASP FiberMark, LLC from an affiliate of American Securities LLC for $120 million. With annual sales of over $160 million, FiberMark is a specialty coating and finishing company with a strong presence in luxury packaging and overlapping technical product categories. The company sells globally from six production facilities in the United States and one in the United Kingdom.

“The acquisition adds new capabilities that will further accelerate our strategy to expand in targeted growth areas like premium packaging and performance materials, and complements previously announced strategic investments supporting the continued growth of our filtration business,” said John O’Donnell, Chief Executive Officer.

Neenah Paper indicated it expects one-time costs in 2015 of approximately $5 million for transaction fees and integration, with synergies exceeding $6 million per year within three years.

The acquisition will be financed approximately equally between cash on hand and borrowing against the Neenah’s revolving credit facility. At press time, Neenah said it expects to close the deal on July 31.

RockTenn and MWV Gain All Approvals, Together Become WestRock

Rock-Tenn and MeadWestvaco on June 24 announced that shareholders of Rock-Tenn and stockholders of MWV overwhelmingly approved the proposed combination of the two packaging companies into WestRock Company at their respective special meetings held earlier that day.

At the RockTenn special meeting, more than 97% of the shares voted “FOR” the proposal to approve the business combination agreement, representing approximately 80% of the total shares outstanding as of the record date. At the MWV special meeting, 98% of the shares voted “FOR” the proposal to approve the adoption of the business combination agreement, representing approximately 83% of the total shares outstanding as of the record date.

RockTenn shareholders and MWV stockholders also approved the other proposals considered at their respective special meetings.

After receiving all necessary approvals, RockTenn and MWV began operating as WestRock Company on July 1.

Resolute Forest Products to Enter Tissue Market by 2017

Resolute Forest Products on June 1 announced a major decision to build a state-of-the-art facility to manufacture at-home, premium private label tissue paper, including bath and towel.

“This is an important step forward for Resolute as we execute on our growth strategy in a way that maximizes our ability to capture synergies and deliver superior value,” said Richard Garneau, President and CEO. “We have been studying this option to diversify into the tissue business for quite some time, and we will continue to look at opportunities to expand our presence in this growing market.”

Resolute’s tissue paper machine and converting operations will be built at the Calhoun mill in Tennessee. This $270 million project represents the largest investment made by Resolute since 2010. At full capacity, the new tissue and converting facilities will produce approximately 60,000 metric tons per year of at-home, premium bath tissue and towel, focused on the growing private label market.

With market feasibility studies, technology selection and project engineering nearly complete, construction is expected to begin shortly, with ramp-up expected to start in the first quarter of 2017. The tissue machine will use excess slush pulp over and above the additional dried market pulp capacity associated with the previously announced continuous pulp digester project.

The investment has received support under existing business development programs offered by the state of Tennessee, the Tennessee Valley Authority (TVA) and the mill’s home community in McMinn County.

Mohawk Inaugurates New Envelope Converting Plant

Mohawk on July 21 celebrated the grand opening of its new envelope converting facility in South Hadley, Massachusetts. The 112,342 square foot site features envelope converting capacity to service the company’s East Coast, Mid-Atlantic and European customers.

Mohawk invested approximately $2 million to retrofit the South Hadley facility, which included upgrading electrical systems, installing air and vacuum lines, and purchasing and installing envelope converting and manufacturing equipment.

The facility has been operational since May, and is expected to produce 500 million envelopes annually. To date, Mohawk has hired 16 new employees, and plans to hire up to 40 employees over the next year.

Mohawk operates fine paper mills in Cohoes and Waterford, New York, as well as a paper and envelope converting facility in Ashtabula, Ohio, which produces 1.5 billion envelopes a year.
We help make pulp white and bright!

We are the leading global supplier of bleaching chemicals and deliver customized solutions for bleaching pulp to our customers.

Our world class technology, application know-how, optimized supply chain and global logistic solutions provide customers with a significant advantage for their operations.

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Atlas Holdings LLC on July 2 said that the assets of its portfolio company Forest Resources, a leading North American manufacturer of industrial paper and packaging products, have been sold to PaperWorks Industries, Inc. and New-Indy Containerboard, LLC in two separate transactions.

PaperWorks has acquired CanAmPac, ULC, including coated recycled board (CRB) producer Strathcona Paper and folding carton manufacturer Boehmer Box.

New-Indy has acquired Forest’s U.S.-based business, comprised of Hartford City Paper, Shillington Box and IVEX Specialty Paper. Terms of the two transactions were not disclosed.

CanAmPac’s Ontario-based Boehmer Box and Strathcona Paper manufacture paperboard and folding cartons for some of the most recognizable national and private label brands in North America. Strathcona Paper is the largest producer of coated recycled board in Canada while Boehmer Box is known for its high-quality, offset-litho printed folding cartons for food packaging applications.

“CanAmPac is a leading Canadian integrated paperboard and consumer packaging supplier. Its quality-oriented manufacturing and converting capabilities, coupled with a complementary customer base, make it an ideal addition to the PaperWorks portfolio,” said Kevin Kwilinski, president and chief executive officer, PaperWorks.

In a separate deal, New-Indy Containerboard, LLC acquired the assets of Forest’s U.S.-based companies. These include Hartford City Paper, headquartered in Hartford City, Indiana, as well as St. Louis, Missouri-based Shillington Box, and IVEX Specialty Paper, headquartered in Peoria, Illinois. Hartford City Paper manufactures 100%-recycled papers primarily used in the production of corrugated packaging. Shillington Box manufactures corrugated packaging materials for businesses across a range of industries, including the food, chemical, automotive, plastics and paper sectors. IVEX Specialty Paper offers a variety of 100%-recycled products, with a focus on kraft paper, crepe paper and corrugating medium.

The Paper & Packaging – How Life Unfolds™ consumer campaign launched on July 8 with a $20 million investment in paid and earned media between July and December funding this cross-platform campaign designed to slow the decline in paper usage and grow demand for packaging. The Paper and Packaging Board (P+PB), established as a checkoff program in 2014 by industry referendum, oversees this multimillion dollar campaign which uses an emotional, story-telling approach to generate consumer appreciation for paper and paper-based packaging.

The Paper & Packaging – How Life Unfolds campaign, created by Cramer-Krasselt in Milwaukee, integrates traditional media including 30-second commercials, print advertising showcasing paper and packaging items that comprise milestones big and small, and a digital presence in banner ads, video and the campaign’s information hub, www.howlifeunfolds.com. Social media platforms include Facebook, Twitter, LinkedIn and YouTube.

The program is financed by U.S. manufacturers and importers from four industry sectors including printing and writing; Kraft packaging paper, containerboard and paperboard.

“The paper and packaging industry is a $132 billion dollar industry,” says John Williams, chairman of the Paper and Packaging Board. “It’s important that people know we have hi-tech jobs, sustainable practices and lead in manufacturing innovation — but the best way to talk directly to consumers about the unique attributes of products we make is to connect with them about the role these products play in their lives.”

“The campaign highlights relatable moments that connect consumers to paper and packaging products in meaningful, emotionally relevant ways,” says Mary Anne Hansan, P+PB’s executive director.

The Paper and Packaging Board establishes and guides promotions designed to expand demand for paper and paper-based packaging products. Manufacturers and importers of these products participate in the Paper Checkoff, an industry-funded promotion program established by the USDA in 2014. To learn more, please visit: paperandpackaging.org.
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THE SCIENCE OF WOWING YOUR CUSTOMERS
ColorLok Technology turns everyday paper into a canvas of possibilities. Additives injected during the paper-making process enable the paper to “lock” pigments at the surface. Without this technology, paper absorbs pigments deep into the fibers of the paper.

A NEW LOOK FOR ECO-FRIENDLY PAPER
Even recyclable paper looks better than ever, because ColorLok Technology gives printouts on recyclable paper a brighter, richer appearance. Plus, pigments sit at the surface of the paper, making recycling easier. So yes, you can look good and do good.

Without ColorLok Technology, pigment sinks into the paper, dulling appearances.

With ColorLok Technology, additives keep color near the surface for bold results.

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EUROPE

CEPI Report Says Production of Paper and Board in Europe in Full Transformation

The Confederation of European Paper Industries (CEPI) released its 2014 Key Statistics, giving a clear picture of the industry’s performance last year. The report includes data about production, consumption and the trade of pulp, paper and raw materials, as well as data on energy and environment. It shows an industry in full transformation, with the growth in output in the packaging sector and a more modest increase in hygiene paper production more than balancing out the continuous decline in the output of graphic paper.

The main highlights of the report are:

• The production of paper and board in Europe decreased by 0.2% in 2014 compared to the previous year, after a cumulative decline of 4% between 2010 and 2013. It is now established at 91.1 million tonnes.
• Paper and board consumption rose by 0.9% compared to 2013 and totaled 77.1 million tonnes. This increase is particularly important because it comes after three consecutive years of decline. The EU28 and the euro area recovered in 2014, with the annual GDP thought to have increased by respectively 1.3% and 0.8% (source: Eurostat). This was reflected in the demand for paper.
• Graphic grades represented 40.5% of all paper and board produced in Europe, packaging grades 47.5%, sanitary and household papers 7.7% and specialty grades 4.3%.
• Paper and board exports to countries outside CEPI dropped, causing concern, whilst imports rose, resulting in a slightly negative trade balance impact. However, CEPI countries maintained an overall positive trade balance in paper (exports exceeding imports) of 14.0 million tonnes in 2014 (14.8 million tonnes in 2013).
• Market pulp production fell by 1.4% compared to 2013, with an output of 13.2 million tonnes.

The report is available for download on CEPI’s website: www.cepi.org.

NORTH AMERICA

Pratt Opens Two New Recycling Facilities

Pratt Industries officially opened two new recycling facilities in mid-June, including a 110,000 sq. ft. plant in Gary, Indiana. The other is a 38,000 sq. ft. site in Wichita, Kansas. Both will support the company’s state-of-the-art paper mill in Valparaiso, Indiana, which comes on-line this September.

Together, the two facilities, the company’s 16th and 17th recycling plants, will have the capacity to process more than 120,000 tons of recyclables annually, most of it recovered paper but also metal and plastics.

“The Midwest has long been a strong area for Pratt’s converting operations,” said Myles Cohen, President of Pratt Recycling. “Now, with the upcoming addition of our 4th, 100% recycled paper mill, adding recycling assets and infrastructure is the next logical expansion strategy for us.

The Gary facility, which will process more than 70,000 tons of recyclables annually, is the company’s first in Indiana. Myles said Pratt chose the city because of its close proximity to both the mill and the greater Chicago area paper stream as well as its excellent access to transportation.

Japan Pulp and Paper Acquires Remaining 49% Share of Gould Paper


The acquisition was effected through JP’s consolidated USA subsidiary, Japan Pulp & Paper (USA) Corp., and makes Gould a wholly-owned subsidiary within the JP Group.

In a written statement, Japan pulp and Paper said, “JP has been making efforts to strengthen and expand its global procurement and sales network, and as part of these efforts acquired a 51% share in the ownership of Gould in April 2010. By taking full ownership of Gould now, with its abundant human resources, experience and business sites throughout Europe and North America — two markets considered highly important in JP’s strategy for its non-Japan business segment — JP will be able to simultaneously strengthening its presence in both of these markets, increase the synergies within the entire JP Group and further expand its business activities outside of Japan.”

David Berkowitz, President and CEO of Gould, said, “We are very excited to now be wholly owned by JP. JP is the largest paper merchant in Japan and is publicly traded on the Tokyo Stock Exchange. Their strong support will allow us to continue to grow and flourish in the United States and throughout the World.”
A microfiber. Transforming paper into POSSIBILITIES

Reinvent paper performance with Eastman Cyphrex™ microfibers. They deliver superior uniformity, strength and printability — all in a synthetic fiber which processes very much like cellulose. See how you can change performance without changing your process.

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EUROPE

Finnpulp Launches Environmental Impact Assessment Program for Proposed Pulp Mill

Finnpulp Oy said that it has submitted an environmental impact assessment program to the North Savo Centre for Economic Development, Transport and the Environment regarding the pulp mill project in Sorsasalo, Kuopio, Finland. The assessment program includes Finnpulp’s plans on the various implementation alternatives for the mill project and a plan (working program) on the environmental impacts to be assessed and the implementation methods of the assessment.

The annual production capacity of the proposed pulp mill, designed specifically to produce raw materials for the tissue and packaging board industries, is 1.2 million tons. In addition, it will produce bioelectricity and wood-based biochemicals such as tall oil and turpentine.

It is estimated that the mill will use roughly 6.7 million cubic meters of wood raw material per year.

In addition to the construction and operation of the pulp mill itself, the assessment procedure will cover the essential auxiliary activities required by the mill such as road and rail connections and the power transmission network.

The assessment program will be available online for the duration of the assessment process at: www.ymparisto.fi/finnpulp.pyva.

Finnpulp is a special purpose company solely founded to manage the investment of a new softwood pulp mill in Finland.

DS Smith Agrees to Buy Grupo Lantero’s Corrugated Business

DS Smith on June 25 reached an agreement to acquire the corrugated business of Grupo Lantero, including several operations in which DS Smith currently has a minority holding.

The total consideration, including the assumption of debt, is expected to be about EUR 190 million, subject to closing adjustments. The deal is being financed from existing cash resources and is expected to deliver a return on invested capital above our cost of capital in the second year of ownership, DS Smith said.

According to DS Smith, the business is a well-invested Iberian corrugated producer with a strong focus in the FMCG sector, operating seven sites across Spain.

In a written statement the company said, “This acquisition significantly strengthens our operations in Spain, an important and growing market for corrugated packaging, taking our market share to approximately 10%. It also builds on our recent acquisition of Andopack in calendar Q4 2014, where we have seen a very positive customer reaction to our product and service offering.”

Sappi to Sell Enstra Mill Recycled Packaging Paper Business to Corruseal Group

Sappi recently reached an agreement to sell its Enstra Mill recycled containerboard and kraft papers business situated in Springs near Johannesburg to Corruseal Group. The existing Security Paper, Office, Specialty and Folio businesses also conducted at the mill will remain with Sappi.

Sappi opened negotiations with Corruseal when it was jointly decided that there was a good fit between Corruseal and Enstra Mill.

The value of the deal was not disclosed.

Commenting on the transaction, Sappi Southern Africa CEO Alex Thiel said, “The sale of the mill is in line with Sappi Southern Africa’s strategy to unlock value and is in line with the Sappi Limited strategy which aims to reduce debt, strengthen its balance sheet and direct resources to high-growth opportunities.

“Over the past four years Sappi Southern Africa has undertaken a comprehensive review of its business and implemented a number of changes to help the business turn around and to put the business firmly on the path to profitability and growth — in particular in its paper and paper packaging business. These actions have delivered significant positive impacts with Sappi Southern Africa returning exceptional results during Sappi’s 2014 financial year and strong results during this financial year.”

Commenting on the expansion of their portfolio, Corruseal Group Joint CEOs Mehul Mehta and Rajiv Mehta said, “The Enstra Mill fits perfectly with our strategy to backward integrate and grow our business. Our commitment is to provide better packaging for a better world. We are committed to remain a sustainable, innovative, service driven and world-class manufacturer of packaging.”

UPM Trims Newsprint Capacity at Chapelle Darblay Mill

In late-June, UPM permanently closed paper machine No.3 at its Chapelle Darblay mill in France. The consultations regarding its closure were finalized at the end of April and approved by the Labor administration in the beginning of June.

The plan to close the machine was announced in November 2014. The closure impacted 187 positions at the mill.

UPM Chapelle Darblay will continue paper production on the remaining paper machine No.6, which produces standard newsprint and improved grades (MFS) with an annual capacity of 250,000 tonnes.

“This year the European newsprint market has faced even stronger headwind than expected,” said Bernd Eikens, Executive Vice President, UPM Paper ENA. “However, our collective actions will ensure the efficient use of our remaining capacity and secure reliable deliveries to our customers.”

The announced decision is part of UPM’s EUR 150 million profit improvement target introduced in November 2014.
Double Doctors for hard-press rolls

- Independent adjustment of each doctor blade
- Fewer paper breaks in the press section
- Higher paper quality
- Greater press-section productivity
- Better roll cleaning

Rossboss™ Doctor oscillator

- Improved cleaning of roll surface
- Enhanced sheet shedding
- High reliability and long service life
- Provides smooth and dwell free oscillation
- For wet, dry and high-temperature applications
- Increases doctor blade and roll lifetime
- No control panel required
prices. The mill’s 270,000 tpy newsprint machine, PM 8, remains on stream, Volga said.

In order to replace the use of chemical pulp with thermo-mechanical pulp (TMP), the firm plans to build a new 450,000 tpy TMP line at the mill. When the new TMP plant is operational, the three newsprint machines will be restarted, Volga said. No timeline has been provided for this project, but the firm said it would require an investment of some Euro 60 million (USD 68 million).

Volga produces high quality newsprint at its mill located on the bank of the Volga river in the Balakhna district, 30 km from Nizhniy Novgorod (450 km from Moscow), Russia.

CHINA
Orient Paper Begins Commercial Production of Tissue Paper in North China

Orient Paper in June started commercial production of tissue paper products at its production facility in the Wei County Industrial Park in China’s Hebei Province.

The company will produce a line of tissue paper products, including toilet paper, boxed and soft-packed tissues, handkerchief tissues, and paper napkins, as well as bathroom and kitchen paper towels that will be marketed and sold under the Orient Paper brand.

As announced earlier, Orient Paper completed the installation of the tissue paper packaging equipment and began trial production of tissue paper in mid-April 2015.

“The launch of commercial production of tissue paper is a special milestone for us as we expand our product offerings to capitalize on this high-growth market,” said Mr. Zhenyong Liu, Chairman and CEO of Orient Paper. “As we move forward, our focus turns to the ramp-up of capacity of our tissue paper production lines over the next several months, as well as the execution of our marketing and sales efforts to grow our market share and the Orient Paper brand.”

RUSSIA
Volga Enters Sales Cooperation with Poddar Global for Indian Market

Russian newsprint manufacturer JSC Volga announced a long term exclusive marketing agreement with Poddar Global Limited (India) for the sale of newsprint in the Indian market.

According to Volga, the parties will use Sandy Limited, Hong Kong — a wholly-owned subsidiary of Poddar Global — or establish a new company in Hong Kong for creating the joint venture.

The primary purpose of the cooperative deal is “to offer customers a broader range of solutions for their publishing needs while maximizing efficiency and minimizing cost in the supply chain,” Volga said in a press release.

Volga expects to allocate about USD 15-20 million in working capital towards the agreement with Poddar Global in India.

Volga noted that it ceased production on three newsprint machines with a combined capacity of some 295,000 tonnes per year at its Balakhna mill near Nizhny Novgorod on April 13 due to a global decline in newsprint prices and a sharp increase in chemical pulp prices. The mill’s 270,000 tpy newsprint machine, PM 8, remains on stream, Volga said.

In order to replace the use of chemical pulp with thermo-mechanical pulp (TMP), the firm plans to build a new 450,000 tpy TMP line at the mill. When the new TMP plant is operational, the three newsprint machines will be restarted, Volga said. No timeline has been provided for this project, but the firm said it would require an investment of some Euro 60 million (USD 68 million).

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INDUSTRY SUPPLIERS
Voith to Rebuild Parenco’s PM 2 for Production of Packaging Grades

Voith said that it will deliver a comprehensive rebuild of the stock preparation and PM 2 at Parenco’s paper mill in Renkum, Netherlands. The contract also includes a renovation of the mill.

The contract followed a 10-month pre-engineering project, Voith noted.

PM 2, a newsprint machine, was idled in 2009 due to a weak newsprint market. Voith will convert the machine to produce packaging paper grades, including testliner and medium.

The complex, turn-key scope of work includes a new stock preparation with the rebuild and upgrade of existing equipment. The project will utilize the existing TMP and deinking plant.

PM 2 will be equipped with a new two-layer headbox, NipcoFlex shoe press, SpeedFlow sizing unit and after dryer section, Voith said.

The Process Line Package includes all auxiliaries, electrics, DCS, starch preparation, pumps and piping, automation control system and engineering.

Besides civil works and all erection, training and start-up services will be carried out by Voith.

Upon completion, the project will increase the mill’s capacity by approximately 385,000 tonnes per year, with production focused on testliner and medium grades.

Voith expects to complete the project in August of 2016.
Valmet to Supply New Fine Paper Production Line for APRIL in Indonesia

Valmet will supply an OptiConcept M fine paper production line for APRIL Group’s Pangkalan Kerinci site in Riau Province in Indonesia. The value of the order will not be disclosed.

OptiConcept M is Valmet’s modular board and paper making concept, which enables significant savings in energy, water and raw material usage.

Valmet’s delivery includes a complete fine papermaking line from stock preparation to reel with related automation systems. A new winder is also included in the delivery.

The new 7.1 meter-wide (wire) machine will produce woodfree uncoated paper grades in the basis weight range of 40-120 g/m². The production capacity of the machine will be about 900 tonnes per day and the design speed 1,400 m/min.

The new PM3 for APRIL is Valmet’s first OptiConcept M delivery in Indonesia. This is also the first time that the latest OptiConcept M technology is utilized in fine paper production, Valmet noted.

Start-up of the new machine is scheduled for the third quarter of 2016.

Kemira Starts New Production Line for Strength Resins and Solutions Polymers

Kemira announced that it has successfully started a new strength resins and solution polymers production line in its paper chemical site in Äetsä, Finland.

According to Kemira, the new production line was started in April 2015 and the ramp-up of the new production capacity has been successful resulting in high product quality and performance.

The new plant serves Kemira’s customers in both Paper and O&M segments in the Nordics, Western Russia and Eastern European rim and strengthens its capabilities in the growth areas.

Strength products will respond to the growing demand of tissue, packaging boards and specialty papers, Kemira added.

Kemira noted that it continues to invest in growing markets and value-adding product lines and is committed to serve the paper industry.

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Global Folding Cartons Market Set to Reach Over $100 Billion by 2020

The global folding cartons market will be worth over $100 billion by 2020 and will consume almost 47 million tonnes, according to a new market study by Smithers Pira.

The $87 billion market for folding cartons, already dominated by demand from the Asia-Pacific sector, is set to undergo more of a shift towards this region. It is expected to increase its share of the world market from 52% of the volume consumed in 2014, to more than 60% of the forecast 2020 market. Key to the increasing dominance from this region is the growth in demand from China, which will increase its share of the market from 31% in 2010 to 39% by 2020, assisted by growing consumption in the Indian sub-continent, which will consume over 6% of the total in 2020.

A new study from Smithers Pira — The Future of Folding Cartons to 2020 — shows that health care products are the single largest users of folding cartons, followed by tobacco, and it is these two industries that face the most significant challenges in folding carton usage. Other market influences include heightened demand in packaging for household care products. Global demand for small electrical appliances, including smart phones, is driving up consumption of mini-flute and folding carton packaging, while the recession has seen an increase in DIY and automotive parts.

The popularity of dry foods, especially in Asia, is driving up demand for folding cartons; conversely, the gradual improvement in these distribution chains and the expansion of supermarkets in this region also stimulates folding carton consumption in frozen and chilled food applications.

The Future of Folding Cartons to 2020 outlines that the entire supply chain in this market faces ever-growing pressure from its customer base to come up with innovative techniques, processes and designs to enable the sometimes fickle brand owners to differentiate their products on the highly competitive supermarket shelf. Consequently, converters and printers are facing a need for on-going investment in new printing technology that offers more colors and more impactful finishing techniques such as hot-foiling, embossing, spot varnishing and the like.

The end result of these many influences and trends is a growing market, with end use consumption of folding carton packaging expected to increase by nearly 5% in 2015, followed by a period of sustained growth of around 3.5% annually, worth $106 billion at constant 2014 prices.

The Future of Folding Cartons to 2020 is available from Smithers Pira. For more information, please visit: www.smitherspira.com.

Smithers Pira is the worldwide authority on packaging, paper and print industry supply chains. Established in 1930, Smithers Pira provides strategic and technical consulting, testing, intelligence and events to help clients gain market insights, identify opportunities, evaluate product performance and manage compliance.
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Newsprint Market Struggles as Demand Decline Gains Speed and Prices Slip

By Harold M. Cody

Newspaper markets have hit a very bumpy road that began in late-2014 and continues into the summer of 2015. That’s saying quite a bit for a market that has seen nearly double digit declines in demand in the last couple of years and where the drop in newspaper demand has been going on for a long time. It’s no surprise to producers that demand has continued to decline. In fact, a drop was expected this year and mills have continually responded by shuttering additional capacity to match current demand levels.

The problem is that the U.S. decline in demand has appeared to gain steam and coupled with the impact of the strong dollar has resulted in an excess of supply. Problems related to the decline in the big U.S. market have been exacerbated by a downward shift in the export market as North American mills have been hammered by weak export prices and volumes. Lacking the ability to sustain operating rates and output via exports has been a key contributor to the decline in prices in recent months.

Prices actually held remarkably steady for about three quarters of 2014 before weakening domestic demand and a slowdown in exports occurred during the latter part of the year. U.S. prices began to slide during the third quarter of last year, and by the end of the second quarter 2015, had dropped for seven straight months. Prices have decreased roughly 10% since the fall or about $60 per tonne according to reports.

DECLINING DEMAND

As noted, the decline in demand appears to have accelerated. For example, during the first quarter of 2015, North American demand was off 12% compared to prior year levels and exports plummeted by 21%. Through May, North American demand was down 11.6% to 1.5 million tons and just as importantly exports plummeted to 648,000 tonnes for the five month period or a 19% drop. Operating rates actually improved to 94% vs a weak showing in April.

A drop in demand in China coupled with a weaker euro and a drop in Russian currency are all making it difficult for North American newspaper mills to compete on the global market. North American exports to Asia were off over 15% and N.A. mills lost considerable market share in several world markets owing to the strong dollar and in turn the
increased cost competitiveness of producers in other regions. North American demand in 2014 was 4.1 million metric tonnes which was down 9% vs. 2013. Demand by newspapers, the major user of newsprint, actually fell by 12% with demand for other commercial printing uses rising 3% as users shifted down in quality and cost to newsprint from other grades in order to reduce printing costs. Demand was 4.5 million tonnes in 2013 and 5.4 million in 2010. Shipments to the U.S. market in 2014 were down almost 10% to 3.4 million metric tonnes. Overseas exports were off 6.8% at 1.8 million tonnes. Operating rates averaged just 91% in 2014. The rate of demand loss has posted a notable increase in the last two years, as the drop averaged 6% to 7% annually over the 2010-2013 period.

These data actually understate the problem as U.S. newsprint demand by newspapers has really plummeted and it clearly shows the problems facing the industry. Last year, newsprint use in newspapers fell by just over 12%, but the drop accelerated significantly during the second half of the year as demand fell 13% and 17%, respectively, in the third and fourth quarter.

The malaise affecting the newsprint market is not isolated to North America. World demand is down by 12% so far in 2015 as well.

Detailed current data on newspaper advertising is not readily available but a feel for the market can be gleaned by looking at some specific examples. For example, News Corp. advertising revenues were off 5% and 4%, respectively, during in the first quarter to 2015 and for the last nine months to March 31, 2015. The New York Times reported an 11.1% drop in print advertising in the first quarter 2015 vs. the prior year.

ENOUGH CAPACITY CUTS?

As noted, North American mills and producers in other regions as well have moved aggressively to cut output.

Resolute, the largest producer, cut significant capacity in late 2014 when it announced the closure of 460,000 tonnes of capacity in Canada. This raised the total closures for the year in North America to just over one million metric tons or a 15% drop in capacity in just one year according to industry estimates. Other 2014 closures included: Great Northern, East Millinocket, Maine; SP Fiber, Newberg, Oregon and Dublin, Georgia; PCA, Deridder, Louisiana; and Kruger, Brompton, Quebec.

Since 2010 nearly 2 million tons of newsprint capacity have been shutdown, and over the last 4-5 years nearly three million tons of capacity, or roughly one-third of capacity, has been closed in North America. Of interest is that it’s reported that most of the Resolute capacity that was shutdown was targeted at the export market. The Resolute shuts include capacity at three mills in Canada: Baie Comeau, Iroquois Falls (mill closed), and Clermont.

The hope going forward is that all of the announced capacity decreases for newsprint are just beginning to take hold and that as we move into the second half of 2015 markets may stabilize. However, it’s also possible that prices will continue to slide and to counter this will require additional capacity reductions in the U.S. and Canada more quickly than had been planned in order to return the market to some semblance of balance. This will be particularly true if the export market remains weak and the dollar strong meaning the time tested use of exports as a means of sustaining operating North American rates is not an option.
Maine natives are known to be sparse with their words. “Walk the talk” is not just a catch phrase. At Sappi’s Somerset mill, the “talk” they are walking is focused on continuous improvement and continuous investment — even in a down cycle.

Somerset is owned by Sappi North America. The mood at this mill is surprisingly positive. Not because people here are oblivious to the inching down of demand for coated fine papers — but maybe because of it. Somerset people know their actions to improve efficiencies are the right ones — serving them well against their competitors.

SKOWHEGAN IS HOME

The Somerset mill is near Skowhegan, a small town with deep roots in the forest industries. Skowhegan was described in the 1886 Maine Gazette as “… a prosperous manufacturing town lying on both sides of the great bend of the Kennebec River.” Today, most of the factories are gone, hard-hit by the recession. But, as in 1886, a pulp and paper mill plays a central role. The men and women at Somerset understand the pivotal role this mill plays. It is in their blood, and in their thinking every day.

FROM SOUTH AFRICA TO THE USA

Sappi, a South African company now global, acquired the Somerset mill, which was established in 1974 as part of Scott Paper, in 1994. Somerset is a large, integrated complex with a unique hardwood and softwood pulp blend (Somerset Synergy) which is used by its three machines. Annual production is about 795,000 metric tonnes of paper. This contributes to Sappi being a leading supplier of coated fine paper, pulp, and release paper in the United States — with a

At a time when some coated freesheet producers are folding their tents, Sappi is taking a strategic and bold approach — making investments to drive quality up and costs down. With the help of key suppliers, the Somerset mill in Maine is reaping benefits from these investments.

By Robert Puhr
production capacity of 1.3 million tons annually.

The mill’s flagship products (Opus, Somerset, and Flo) are specified by publishers of premium magazines, catalogs, books, and high-end print advertising. The mill also produces a small quantity of grease-proof paper (LusterPrint) for the food industry, pet food bag material, and has recently entered the coated one-side packaging paper market for labeling and other uses (LusterCote).

**NO PROBLEM BEING FIRST**

Sappi has several “firsts” to its credit: the first to coat and calender on two sides; the first to produce a dull coated paper; and the first to implement Elemental Chlorine Free (ECF) bleaching in all its pulp mills.

Somerset is on a drive to be first in quality — and the lowest cost producer. Each of the three machines at Somerset use the company’s patented online finishing technology. As Kirk Ross, PM2 Manager, explains, “Having the machine, coater, and calender in line gives us added efficiencies. Of course, it also requires us to be very good at what we do, as threading the line after a break takes away from this designed-in efficiency.”

**QUALITY UP, COSTS DOWN**

Sappi recently invested US $13 million to rebuild the forming section of Somerset’s PM3. Tony Ouellette, Paper Mill Manager, said, “The rebuild was all about improving quality and optimizing machine efficiency.”

AstenJohnson worked in concert with Sappi Somerset to fine-tune the forming fabrics for the rebuilt machine. “The rebuild added three movable blades and a two-zone suction box on the other side of the forming fabrics, which created a lot of shear,” explains Tim Gallagher, Regional Business Leader for AstenJohnson. “That shear increased the wear on the fabrics. So, we brought in new designs to improve wire life. Ron Herrin, our Forming Specialist, recommended adding a shower to the suction flat box, and our Paperchine group re-engineered the box cover to take drag off the wire. In addition, Somerset adjusted the drive motor load splits to alter how the fabrics are run.”

“PM3 was one of the first BelBaie gap former machines to produce fine papers. “The design of the gap former removed about 80% of the water from one side of the sheet, causing unique challenges for us,” Guillow says. “We had to compensate for the sidedness in the sheet with additives and we added coating to create the smooth surface our customers demand. The rebuild essentially brought this machine into the quality arena for coated freesheet.”

AstenJohnson made small adjustments to the fabric design. “The primary things we look at are wear, drainage, formation, and stability,” Gallagher says. “Somerset runs PrintStar forming fabrics on two positions: backing and con-
veying. The finer PrintStar fabric helps with formation. We also supply the clothing for the pick-up, bottom, and third press positions.”

After start-up and during optimization, the machine slowly began to develop a mechanical problem in the press section. Operators noticed elevated wear in part of the press felts. “No matter how many nip impressions of the press we did,” Guillow says, “we could not isolate the problem. We have found in the past that AstenJohnson can often be an important part of the solution, so we asked for their input. They bring an excellent level of expertise to the table.”

Says Jim Byrne, Sales and Service Representative for AstenJohnson, “We performed a worn felt analysis when the press felt came off — checking caliper, weight loss, and permeability, among other things. We were getting different readings from front to back. This helped Somerset isolate the culprit — a clevice attached to a pin which would bind up from time to time so that the back of the press was not loaded the same as the front.”

“We also discovered a roll covering that was developing a defect,” Guillow says. “By changing the roll cover and replacing the clevice, I’m confident we have the pickup issues behind us.”

Ouellette adds, “AJ engineers were here during the start-up after the rebuild, and have been active in the on-going optimization. We have marked productivity improvements and have achieved record productivity on PM3, which is essentially 80% clothed with AJ fabrics.”

**PM2: A TIGHT OPERATING WINDOW**

Somerset’s PM 2 is the lightest weight, on-machine finished, coated freesheet machine in the world. It runs 3,500 fpm and produces 40-50# basis weight grades. “It has an extremely narrow operating window which requires tremendous discipline from our operators,” says Kirk Ross, PM2’s Manager.

By building three similar machines, Somerset created beneficial economies of scale. As Ross explains, “We have sufficient pulping, good utilities, on-site PCC, and good purchasing power. We are positioned to weather the storm of declining demand and rationalization of capacity. We focus on being economically sustainable at the bottom, so we can capitalize on any uptick.”

Because of this, most investment projects are not to make more paper, but to lower the cost of production and improve
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“We have also used AJ’s PQS team to analyze vibration issues,” Ross says. “It is an advantage for a machine clothing supplier to have these added capabilities. Even though we like to be self-sufficient here, the reality is that we can’t solve every problem ourselves. In terms of on-going training, I have attended conferences as part of AJ University and was a presenter at their Gap Former User’s Conference recently at the University of Maine.”

**AWARD FOR EXCELLENCE**

Sappi North America was recently selected the winner in two categories of the 2014 PPI Awards: 1) Managing Risk & Safety, and 2) Mike Haws was named Mill Manager of the Year.

Sappi North America is a leading supplier of coated fine paper, pulp, and release paper in the United States – with a production capacity of 1.3 million tons annually.

“The combined efforts of the Somerset team made it possible to successfully implement a growth strategy in a challenging market,” Haws says. “This award recognizes the achievements of an ambitious plan to drive innovation, while taking into account our commitment to stringent environmental and safety factors.”

Robert Puhr is President of Ad Hoc Communications, a marketing and media consultancy with extensive experience in the forest products industry. He can be reached at bob@adhoccom.com.
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Scientists have demonstrated the potential for softwoods to process more easily into pulp and paper if engineered to incorporate a key feature of hardwoods. The finding, published in this week’s Proceedings of the National Academy of Sciences, could improve the economics of the pulp, paper and biofuels industries and reduce those industries’ environmental impact.

“What we’ve shown is that it’s possible to pair some of the most economically desirable traits of each wood type,” says John Ralph, the Great Lakes Bioenergy Research Center’s (GLBRC) plants leader and a University of Wisconsin-Madison professor of biochemistry.

According to Ralph, altering what once was the hard and fast distinction between softwoods and hardwoods — which process into largely separate product streams — could create opportunities for the multi-billion dollar industries that process biomass for profit.

Like most plants, hardwood trees such as birch or poplar contain lignin, the notoriously hard-to-process “glue” that lends plant tissues their structure and sturdiness. Lignin is derived from binding molecules called G- and S-monomers, with S-monomers producing a simpler and more easily degradable lignin. As hardwoods contain both G- and S-monomers, they have traditionally been prized for their relatively easy processing into pulp or paper.

Softwoods such as pine or spruce, on the other hand, derive their lignin from G-monomers only, producing a lignin that is much harder to degrade and which renders softwoods more difficult to process. Their industrial advantage, however, is their long fibers, which are particularly well suited for use in making strong paper products such as shipping containers and grocery bags. In addition, the sugar found within softwoods converts more easily and in higher volume to ethanol, making softwoods a potentially superior feedstock for biofuels.

Ralph and a team of collaborators, including first author Armin Wagner from Scion, one of New Zealand’s Crown Research Institutes, and GLBRC’s Fachuang Lu, used a model called the “tracheary element” (TE) system to prove that it’s possible to engineer conventionally long-fibered softwoods to contain the easier-to-process lignin found in hardwoods.

The TE system induces suspension-cultured cells to make
secondary cell walls representative of those found in real wood fibers. In this study, the researchers transformed cells from softwood pine within the TE system by introducing genes for two key enzymes known to produce lignin in flowering plants, showing that the resulting softwood was capable of making and incorporating the S-monomers needed to produce a hardwood-type lignin in its cell wall.

Next, the researchers will attempt to use the same approaches to engineer actual softwood plants to produce S-monomers and S/G lignins. The transition from model to plant is highly anticipated.

“If we could implement this in real plantation softwoods, we could decrease the intensity of pre-treatment processes and increase yields across a variety of industries,” Ralph says. “But there’s a tangible environmental benefit as well: processing biomass faster and more efficiently cuts out a significant amount of waste and energy.”

The research was funded partially by GLBRC, one of three Department of Energy Bioenergy Research Centers created to make transformational breakthroughs that will form the foundation of new cellulosic biofuels technology.

For further information about the topic presented in this story, please contact John Ralph at jralph@wisc.edu or call 608-890-2429.
Inspiring Innovation, Attracting the Next Generation

As products, necessities and consumer requirements continue to evolve, so will the demand for new paperboard packaging solutions and the designers who create them.

By Cathy Foley, AF&PA Group Vice President

Packaging designers drive the evolution of the packaging that is manufactured.

A successful package design melds creativity and practicality; it must be innovative and capture the consumer’s attention from the store shelf, and also be easy and economical to produce, fill and use.

The American Forest & Paper Association and the Paperboard Packaging Council created the Paperboard Packaging Alliance (PPA) to promote the benefits of paperboard packaging.

Packages made from paperboard protect, promote, identify, and inform the consumer better than any other form of container; have fantastic printing quality; offer endless visibility, product differentiation, and style versatility combinations; are highly efficient in terms of freight and storage; and are environmentally-friendly due to their renewable origins, reusability, and recyclability.

Knowing that innovation in paperboard packaging is a direct result of the push and pull between designers and manufacturers, the industry understands the importance of attracting new talent. Since 2004, PPA has run the annual Student Design Challenge (SDC), inviting student designers from schools across North America to put their skills to the test while fostering their awareness and appreciation of paperboard as a packaging substrate.

Engaging Packaging Design Students

SDC participants are asked to submit their most innovative designs on a given theme, which changes each year to reflect the continually evolving nature of paperboard packaging.

Over the years, participating students have accepted the challenge to design a men’s cosmetic gift set package that can also be used as a merchandiser display, a functional package for movie theater candy, and a package for a quick-serve chain kids’ meal – always using paperboard as the primary material.

The SDC strives to give students a valuable experience by exposing them to all elements of importance in the packaging design field: consumer research, branding, materials and technology, and so forth.

The challenge mirrors what happens when a paperboard packaging company receives a new project request. The student designers take their ideas from concept to product launch and get to experience packaging testing, develop targeted marketing and glimpse behind the scenes of the paperboard packaging industry.

The opportunity to do an all-around project provides considerable value. While students are learning about everything that paperboard has to offer, they are also establishing their identities as designers as they work in a team environment.

**Smooth Transformation.** In 2014, teams were tasked with designing an innovative men’s cosmetic gift set package that can also be used as a merchandiser display. Students from Pratt Institute designed DASH, which earned them first place in the competition.
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This develops students’ know-how in terms of team-building and leadership skill-building, and teaches them to do research, design quickly, and redirect where needed.

**CHANGING WITH THE TIMES**

Over time, the SDC themes evolved to have a greater focus on sustainability and recyclability to reflect consumers’ increasing preference for those attributes in packaging.

Young designers have a knack for using unique ways for a product to captivate a consumer. As early adopters, they tend to be on top of emerging trends in the consumer packaging field and this is reflected in their SDC entries. The SDC saw students tie social media into their package designs before it was the norm, and interactive and multi-purpose elements have become increasingly popular.

In recent years, a representative from a consumer goods company that is relevant to the challenge scenario and requires packaging for their products has been invited to participate in the SDC as a guest judge. Participating guest judges came to the SDC from top companies such as Mars, Unilever, and LEGO and Hasbro toy companies. They provide a different dimension to the SDC and an opportunity for students to showcase their skills to people who make final decisions on product packaging.

**POTENTIAL EMPLOYEES**

PPA’s founding associations both have company members that produce and convert bleached, unbleached and recycled paperboard packaging. These companies supply the participating students and schools with paperboard and, in turn, are exposed to the fresh perspectives of these up and coming packaging designers, who are potential new employees of the paperboard industry.

Paperboard packaging companies get to see what the student designers are creating, and what problems the students may be able to solve as potential members of the paperboard industry.

Taking part in the challenge allows students to build their portfolios and to demonstrate their decision-making skills to prospective employers by discussing the development process of their designs. The students can prove that they can not only develop unique shapes and package profiles but provide innovative economical and ecological solutions as well.

Many SDC participants cite the usefulness of their experience in helping them land their first job out of school. Several of them have gone on to have successful careers in the paperboard packaging industry. One of the winners of the very first SDC participated in the 2015 SDC — this time as a guest judge.

**THE FUTURE OF PAPERBOARD PACKAGING**

In 2015, PPA asked SDC participants to design a limited edition innovative paperboard toy package that can also be reused as an interactive structure for the toy.

The votes are in and the winners will be announced at PACK EXPO on September 28th and featured on PPA’s website paperboardpackaging.org.

PPA plans to keep the SDC’s annual themes timely, original and captivating in order to attract the interest of the best and brightest packaging design students. Many talented designers are graduating each year. They are interested in opportunities and are looking for jobs. And the industry is hiring.

Paperboard packaging has served to protect, preserve, transport and store products people use and need for well over a century. As products, necessities and consumer requirements continue to evolve, so will the demand for new paperboard packaging solutions and the designers who create them. SDC participants will help shape the future of paperboard packaging.

*More information about PPA and the SDC is available at paperboardpackaging.org.*

*Universities that have participated in the PPA’s Student Design Challenge to date are California Polytechnic State University, Clemson University, Fashion Institute of Technology, Indiana State University, Maryland Institute College of Arts, Michigan State University, Millsersville University, Mohawk College, North Carolina Agricultural & Technical State University, Pratt Institute, Rochester Institute of Technology, Ryerson University, San Jose State University, University of Cincinnati, University of Wisconsin-Stout, and Virginia Polytechnic and State University.*

All universities across the U.S. and Canada with packaging design and engineering programs and courses are welcome to take part in the challenge. Participating in the SDC will also make them eligible to receive classroom materials and student scholarships. Interested parties should contact: ppa@afandpa.org.
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Paper products are a constant presence in our lives, and they are ever-evolving to meet people’s needs.

Under the theme – Past, Present, PAPER – the June 24, 2015 AF&PA Fly-In provided a platform for the industry to educate members of the U.S. Congress about the importance of the industry’s issues. Held every other year, the AF&PA Fly-In is an important element of our advocacy efforts.

House Leaders, including Rep. Cathy McMorris Rodgers (R-WA), the third-highest elected leader in the Republican Party, met with industry leaders and explained the importance of coming to Washington, D.C. to help lawmakers understand first-hand the business implications of policies. Reps. Greg Walden (R-OR) and Patrick McHenry (R-NC) gave an overview of issues Congress hopes to address in the remainder of the year and encouraged executives to “make it real” by giving specific examples of the potential effects of proposed laws and regulations.

Executives met with policymakers in numerous meetings where they called for action on the following AF&PA priorities:

**Recognition of the industry’s use of biomass as carbon-neutral.** Paper and wood products mills use biomass residuals from their manufacturing operations to produce bioenergy that provides significant carbon-reducing benefits to the environment. As a result of the meetings, more than 45 senators have written to the Obama Administration calling for clear recognition of biomass carbon neutrality.

**Oppose regulations that could impose as much as $14 billion in new capital obligations on the industry over the next 10 years.** Paper and wood products manufacturers face challenges from recently released and expected new regulatory proposals, including lower ozone limits, that are driven by lawsuits or petitions under the Clean Air Act. Our members have already invested billions to improve performance and air quality. This cumulative regulatory burden is unsustainable.

**Increase America’s freight capacity through truck and rail policy changes.** Transporting raw materials to our mills and finished products to the marketplace is costly and difficult. Our national highway system cannot accommodate projected surges in increased freight without also making changes to reduce the number of trucks hauling that freight. By safely increasing the maximum weight trucks can carry from 80,000 pounds to 97,000 pounds, the forest products industry could reduce truck trips by nearly 2 million. Executives told lawmakers that railroad service is at historic lows, mostly as a result of the railroads’ monopoly status and no leverage for shippers. Pending Surface Transportation Board legislation would provide new investigatory authority, rate review timelines, and other improvements.

**Preserve paper options for federal government information and services.** Federal agencies are eliminating services and communications such as social security documents, tax documents and forms, prescription drug labels, and savings bonds in paper formats. Such digital-only policies discriminate against millions of Americans, many of whom are in rural communities and/or low-income households: 45 percent of seniors do not own a computer and 30 percent of citizens do not have online access at home.

**The launch of the congressional Paper and Packaging Caucus.** More than 20 lawmakers and 40 industry executives celebrated the launch of the newly formed House and Senate Paper and Packaging Caucuses. Caucus co-chairs Senators John Boozman (R-AR) and Debbie Stabenow (D-MI), and Reps. Reid Ribble (R-WI) and Gwen Graham (D-FL) spoke about the importance of the industry to local communities in their districts, states and the nation. The caucuses will work to raise awareness among members of Congress about the policy issues facing our industry workers and facilities across the country.

Paper and paper-based products are an important part of our past, our present, and our future. AF&PA will continue to advocate for policies that promote competitiveness for our industry, allowing us to continue the innovation and manufacturing of products that people across the country and around the world rely on to make their lives better.
IBS Paper Performance Group and Transphase Technology Ltd.
INTRODUCE: SUPER STEAM VAC patented steam shower technology for advanced dewatering of sheet and paper machine clothing.

a. **Patented Steam Diffuser Technology** produces a narrow intense footprint or bump response to increase CD Zone range for better profiling over traditional high velocity steam boxes.

b. **First installation:**
On a high-speed machine making brown grades from sack to linerboard, the first installation along with an iTable™, achieved the following:

- 6% increase in sheet solids before the couch.
- 6% speed increase from SSV on 26# liner.
- Couch to be covered by grooved rubber cover.
- Elimination of 3 couch vacuum pumps, saving over $300,000 per year in operating costs.
- Increase in sheet temperature into the press from 130° to 160°F by the elimination of couch vacuum.
- Increase in sheet temperature into dryer.
- Decrease in reel moisture by 1%.
- Reduction in total machine steam usage by 5%.
- No steam spillage.

**HOT OFF THE PRESS!**
Mill shuts off couch.
Is hotter and dryer through Press.
6% speed increase.
Reduces total machine steam use 5% – dryer load by 5%.
Strong bonds lead to unique possibilities – in business as well as in chemistry. And that’s precisely why we’ve acquired AkzoNobel’s paper chemicals business. Additional expertise. A broader technology base. Greater presence where you need us most. It all adds up to a winning partnership with a shared commitment to innovation.

We’ve extended our capabilities so you can extend yours. Let’s work together to build value into paper.

www.kemira.com/extend-your-capabilities