Global Forest Products Markets: Impacts on Western Forests

BY ERIC HANSEN

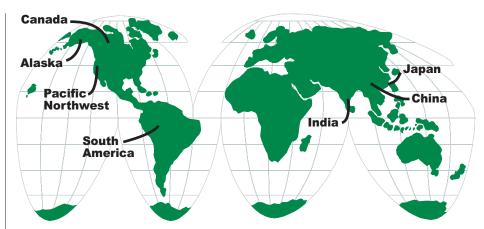
Globalization of forest products markets continues to dramatically impact the North American forest sector. As the largest global con-



sumer for most types of forest products, the United States is the market of choice for manufacturers around the globe. Not only is the size of the U.S. market highly attractive to foreign producers, but so is its relative homogeneity. Despite 50 states and meaningful regional differences, the United States presents an affluent market of nearly 300 million people with generally similar product codes, standards, practices and legal requirements. This article provides an overview of competitive issues facing the industry as a result of globalized markets and outlines potential impacts to western forests. Additional articles provide further insights into the roles of specific countries and regions, as well as a look at how western states are working to help the industry maintain its competitiveness in the face of global pressures.

Competitiveness of Pacific Northwest operations

The North American forest industry has historically relied on a low-cost strategy to maintain competitiveness. Considering the nature of today's global competition, this



The map above shows the countries/regions that are highlighted in articles throughout the publication.

approach is tenuous at best. Modern competitive theory suggests that firms must develop resources that are valuable, rare, without substitutes and something others cannot easily imitate. Low costs are easily imitated by many foreign competitors. For example, an average shop floor worker in an Indian wood industry manufacturing operation makes about \$80 per month. Similarly low labor rates in developing countries give manufacturers in those countries a significant edge in the low-cost game.

Old-growth, high-quality Douglasfir and ponderosa pine have few substitutes. When this raw material was readily available, western companies had a competitive advantage. As rotation ages and overall wood quality fall, many of the distinguishing characteristics of the resource are either lost or diminished. With a trend toward more engineered products, fiber requirements tend to be less qualitybased and more quantity-based. The attitude by some has become that of "produce as much fiber as possible and we'll figure out how to make it into a product." This view fits well with the growth of plantation area in the world. According to estimates by Wood Markets¹, plantations represent about 40 percent of global industrial roundwood supply, and in less than two decades from now plantations will supply over half of all industrial roundwood. According to the Wood Markets report, New Zealand, China, Australia, Chile, Uruguay and Argentina obtain the majority of their wood supply from plantations. As can be expected, those countries listed above that also have small populations (thus large volumes per capita) are currently or becoming key global exporters. The bottom line is that the

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Global Forest Products Markets

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Pacific Northwest resource base is no longer the differentiating factor it once was.

According to a recent Oregon
Forest Resources Institute-sponsored
study, Oregon is particularly strong in
sawmilling. However, according to
Wood Markets, log costs in the region
are some of the highest in the world
and are only partially offset by lower
milling costs (due to high use of technology and larger mills). As a group,
North American sawmills have higher
costs than South American and
European sawmills, and the lowest
costs can be found in Russia.

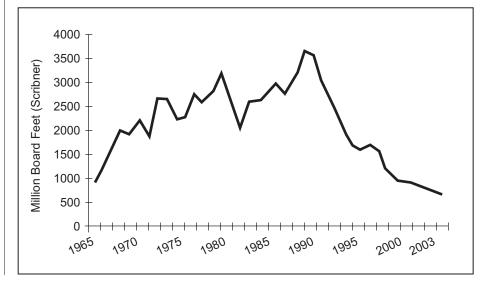
Recent years have seen significant inroads by foreign competitors into a variety of U.S. markets. Al Schuler at the USDA Forest Service Lab in West Virginia has shown that the domestic share of wood products consumption has fallen significantly in a number of sectors. For example, structural panels

were close to 100 percent domestically produced in 1990, but fell to around 75 percent in 2002. Continued trade wars with Canada over softwood lumber have only partially limited the flow of lumber into the United States. Forest health woes in British Columbia are contributing to high harvest levels in

the short term, but will decrease in the coming years (see accompanying article by Chris Gaston). Imports of softwood lumber into North America have increased dramatically from both South America and Europe. Further down the value chain, U.S. Department of Commerce statistics

Figure 1. Exports of softwood logs from western U.S. ports.

Source: USDA Forest Service PNW Research Station.





Western Forester

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show that tens of thousands of furniture manufacturing jobs have been lost in the United States in recent years, largely due to Chinese imports.

What happened to exports?

U.S. companies have a long-established reputation of jumping into the export market when the domestic market is difficult, and dropping out of the export market when the domestic market picks up. During recent years, our domestic market has been very attractive with high housing starts and strong prices in many product categories, leaving little interest in export markets.

Since the early 1990s, the Pacific Northwest has seen a dramatic decrease in log and lumber exports (see figures 1 and 2). This is, of course, largely a result of local supply restrictions, but changes in foreign markets have also contributed. Aftermath of the 1995 Kobe earthquake in Japan resulted in creation of a new housing quality assurance law and a move toward performance-based standards. The result has been

Next Issue: Research Focus—NCASI Forest Environment and Sustainability Program

a shift of products used in the marketplace toward kiln dried and engineered/laminated products.

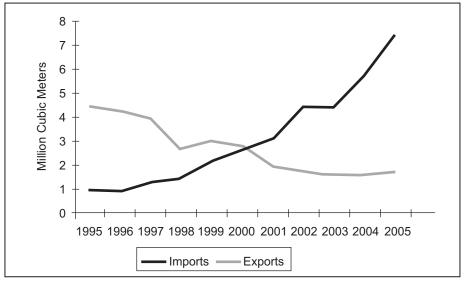
Scandinavian producers have entered the Japanese market with highquality lumber and a market-sharegrowth strategy. Their success has meant loss of market share by others (see article by Ivan Eastin and Jeff Cao).

Often companies in the United States export lumber to countries that add value and export finished products back into the United States. This is the case with hardwood lumber and veneer bound for China, used to manufacture furniture, and re-exported to the U.S. Similarly, exports of softwood lumber to Mexico often return to the United States as finished moldings or furniture.

Major trade flows to the U.S.²

Canada is the largest exporter of forest products to the United States, supplying approximately one-third of U.S. consumption of softwood lumber. This particular flow of raw materials has been controversial for many years with continued trade disputes. A result of the many trade disputes with Canada has been a window of opportunity for other countries to export softwood products to the U.S. (see Figure 2). Even high-cost regions such as Europe have increased volumes exported to the United States. Since 2000, the volume of softwood lumber imports from EU-25 countries to the U.S. has grown over five-and-ahalf times. Germany represents the biggest player with nearly half of the volume. Higher value-added products are also increasingly entering the United States. For example, Cascade

Figure 2. U.S. softwood lumber exports and imports, exclusive of Canada. Source: www.fas.usda.gov.



Structural Laminators in Eugene, Ore., recently signed an exclusive agreement to conduct nationwide sales for glue laminated timbers produced in Austria by Kaufmann.

Ten years ago, secondary manufacturers in eastern Oregon were just beginning to experiment with radiata pine. Most weren't particularly happy with the species and found it to be difficult to work with. Following improved drying practices and learning better how to process the imported pine, it has become widely accepted in the industry. By some esti-

mates, nearly three-quarters of all solid sawn moldings used in the U.S. are now imported, mostly of radiata pine. Southern yellow pines have been planted extensively in Brazil and significant volumes of lumber and plywood are now entering the U.S. from that country. The future will see other South American countries enter the fray. For example, Weyerhaeuser Company and other multi-nationals have over 750,000 hectares of plantation forests growing in Uruguay (see

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Japan's Impacts on Forests in the Pacific Northwest

BY DR. IVAN EASTIN AND IEFF CAO

nited States exports of softwood logs and lumber have been declining for more than a decade. This is the result of expanding Canadian lumber exports to Japan over



Dr. Ivan Eastin

the period 1990-1996, followed by the explosion of lumber exports from Europe over the period 1993-2005 and log exports from Russia.

This supply shift can be attributed to a variety of factors, including the strength of the U.S. dollar from 1996-2001, the Asian economic crisis, the protracted Japanese economic malaise, increasing price sensitivity of Japanese home buyers and home builders, regulatory changes in the Japanese housing industry, a shift from site built to factory pre-cut housing, the aggressive marketing by European lumber suppliers in Japan and the continued strength of the housing market in the United States.

This article discusses the impacts these factors have had on the com-

petitiveness of Pacific Northwest softwood log and lumber in Japan. Despite their loss of competitiveness in Japan and the increasingly global nature of the forest products industry, as well as the size of the Japanese market for wood products, U.S. forest products manufacturers need to continue looking for opportunities and market niches in Japan.

Wood Use in Residential Construction

Regulatory changes lead to increased use of pre-cut components

Perhaps the single most important factor affecting the use and specification of softwood lumber in Japan has been the Housing Quality Assurance Act (HQAA). The HQAA was developed to improve the quality and performance of new homes and provide homebuyers with specific safeguards and rights when purchasing a new home. The HQAA was developed partially in response to the poor performance of post and beam houses in the Kobe earthquake. The primary objective of the HQAA was to improve the quality and performance of new homes by requiring homebuilders to provide homebuyers with a 10-year

warranty against structural defects and poor durability. The HQAA, which went into effect in April 2000, has significantly changed the structure of the residential construction industry in Japan, including the specification and use of domestic and imported wooden building materials.

Another factor that has influenced material use in Japan is the demographic changes taking place in the residential construction industry. Fewer young people have entered the carpentry field and, as a result, the number of trained carpenters has been shrinking rapidly. Between 1999 and 2004, the number of trained carpenters dropped from 129,625 to 103,700. It is expected that the number of carpenters will continue to decrease rapidly over the next decade, further driving the shift to pre-cut structural components.

The net impact of these regulatory and demographic changes has been to transition the residential homebuilding industry away from the traditional site built construction system (where structural components were cut onsite by master carpenters) to the precut system (where structural components are cut to exact tolerances at computer-aided machine centers). As a result, the industry had been slowly moving toward the increasing use of pre-cut structural components since the early 1980s. In 1985, the percentage of wooden post and beam homes that used pre-cut structural components was just three percent. By 1995 (the year of the Kobe earthquake) this figure had increased to 32 percent. In response to the regulatory and demographic changes described above, the share of wooden homes built using the pre-cut method jumped to 76 percent by 2004.

Softwood Log and Lumber Imports

Softwood log imports

The vast majority of softwood log imports from the Pacific Northwest are Douglas-fir (DF). Douglas-fir has traditionally been a preferred species for structural components and has been used extensively in the residential construction industry in Japan.

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Japan's Impacts on Forests in the PNW

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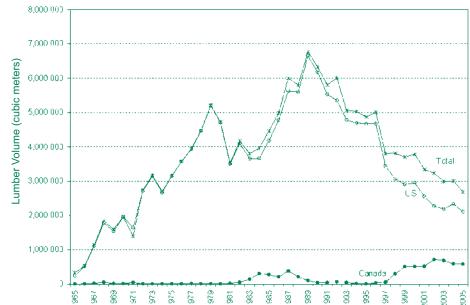
Much of the preference for DF is related to its high strength characteristics as well as its dimensional stability, durability and straightness. The ready availability of close-grained old-growth DF logs and lumber in the past also helped to establish the strong preference for this species. In fact, the preference for DF lumber has been so strong that a major sector of the Japanese sawmill industry processes imported DF logs into structural lumber for the post and beam home building industry.

Imports of DF logs from the Pacific Northwest peaked at 6.8 million m³ (see Figure 1). Since 1989, imports of DF logs have declined by 62 percent, totaling just under three million m³ in 2005. The United States is the major supplier of DF logs to Japan primarily because of the restrictive regulations in Canada that are applied to log exports from provincial forests. While a similar export ban on logs from public lands in the Pacific Northwest was put in place in 1990, the large area of private industrial forests in the Northwest has helped to partially offset the log export ban. However, structural changes in the Japanese market have reduced the demand for DF logs.

Softwood lumber

The composition of softwood lumber imports into Japan has changed

Figure 1. Japanese imports of DF logs.



dramatically over the past 15 years, a fact that is often obscured by the overall trend in import volumes. The fact that imports of softwood lumber increased by just 5.3 percent between 1991 and 2004 (from 8.1 million m³ to 8.6 million m³) suggests that softwood lumber imports into Japan have changed little over this time (see Figure 2). In reality, a closer look at the Japanese import statistics presents a much different story. Imports of softwood lumber grew rapidly during the period 1990-1996 (reaching 11 million m³ in 1996), driven largely by high levels of wooden housing starts. The Asian economic crisis caused softwood lumber imports to drop to 6.8 million m³ in 1998 before

rebounding to 8.6 million m³ in 2005.

The past decade has seen a tremendous shift in the structure of softwood lumber imports into Japan (see Figure 2). Between 1990 and 2005, U.S. exports of softwood lumber to Japan plummeted from 2.1 million m³ to 189,000 m³ (with market share dropping from 27.8 percent to 2.2 percent). Over the same period, the Canadian share of softwood lumber imports remained relatively stable at approximately 45 percent (with a volume of approximately 3.6 million m³). In contrast to the U.S. and Canadian experience, imports from Europe jumped from essentially zero in 1992 to 2.9 million m³ in 2005 (representing a 30.5 percent market share). Similarly, imports from Russia increased from 227,000 m³ in 1992 to 990,000 m in 2005 (increasing to 11.6 percent of the market).

Douglas-fir lumber exports from North America (U.S. and Canada), which peaked in 1996 at just over two million m³, have declined precipitously over the past decade although they appear to have stabilized since 2002 at around 950,000 m³ (see Figure 3). Throughout this period, the U.S. has seen its market share decline from 47.6 percent in 1991 to just 13.8 percent in 2004 while the Canadian market share has increased from 52.4 percent to 84.9 percent. More importantly, as the total volume of DF lumber imports declined by 52.6 percent, the share of



DF lumber in total softwood lumber imports declined from 26.6 percent in 1996 to 12.6 percent in 2004. The import data clearly shows that U.S. softwood lumber has been losing market share in Japan to other exporters, primarily in Europe and Russia. While some of this can be attributed to the increased price sensitivity of Japanese homebuilders, regulatory reform in the Japanese residential construction industry has had a much greater influence. Despite these trends, however, the Japanese market remains an important market for DF logs and lumber, and home builders continue to hold DF in high esteem.

Glulam Imports

The U.S. found itself occupying a strong position in the structural glulam market in Japan following the Kobe earthquake. As the demand for structural glulam lumber prepared to take off in 1993, the United States was the dominant supplier in Japan with an 85.2 percent market share. Despite the fact that U.S. exports of structural glulam lumber more than doubled between 1993 and 1996, growing from 50,412 m³ to 119,365 m³, the U.S. share of the market dropped to 51.6 percent as new competitors entered the market. Between 1995 and 2004, as glulam imports increased from 148,000 m³ to 611,000 m³, the U.S. exports plunged from 119,000 m³ to just 5,000 m³. In contrast, imports of European glulam lumber increased from 32,000 m³ to 417,000 m³ over the same period. The introduction of Chinese glulam lumber into Japan in 2001 undermined both the U.S. and European market positions. By 2005, the Chinese market share had increased to 22 percent (151,000 m³) while the U.S. market share had dropped to just under one percent (2,000 m³) and the European market share dropped to 66.5 percent (446,000 m³).

Despite the bleak performance of U.S. forest products in Japan, this market will continue to be important to Pacific Northwest forest products manufacturers. The large number of wooden housing starts, coupled with high import dependence, makes this an attractive market. Despite record demand for wood products in the

United States, U.S. manufacturers need to maintain a presence in Japan to hedge against a downturn in the U.S. economy and to offset the growing volume of softwood lumber being imported into the U.S. from Canada and, more recently, Europe. Indeed, European softwood lumber exports into the U.S. have now topped a billion board feet. Increasingly, maintaining a diversified portfolio of export markets will be critical to the long-term success of the U.S. softwood lumber industry. With the globalization of the forest products industry, maintaining a short-term focus

on the domestic market is a longterm recipe for disaster. ◆

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Figure 2. Japanese imports of softwood lumber.

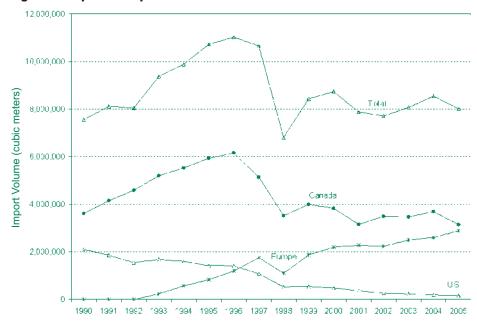
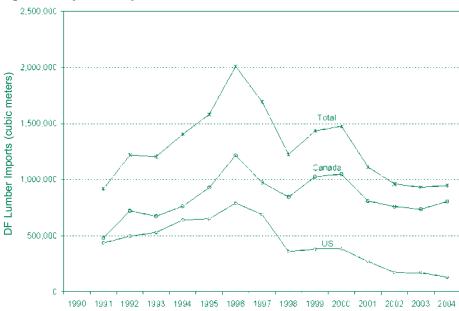


Figure 3. Japanese imports of DF lumber.



Forest Products from South American Plantations and their Influence on Western Forests

BY ERNESTO WAGNER

oday, forest products made from plantations grown in South America arrive to Rotterdam, Seattle, Tampico, Hong Kong and other key ports throughout the world.



They are typically high-quality, lowcost products that have gained market share in some of the most competitive markets of the world. This is a new phenomenon. Just a few decades ago, plantations did not exist in South America and two of the countries that today are big wood products exporters were net importers. This article explores some of the history and reasons for this change, illustrates the strengths and characteristics of the plantations and wood products from South America, and discusses some resulting influences on Pacific Northwest forests.

Deforestation and how plantations developed in South America

Historically, South America has been affected by significant deforestation of its natural forests. Even today, several countries continue to lose total forest cover. Brazil is the most notable case by total area, as it had 520 million hectares of forests just 15 years ago (1990) and FAO reports that today that area has diminished to 478 million hectares.

Protection of native forests was one of the reasons that prompted Brazil (followed by other South American governments) to implement subsidy programs to encourage the development of forest plantations more than 40 years ago. There were other justifi-

cations for these subsidies: the recovery of degraded agricultural areas and the industrial development of impoverished regions. The subsidies were either in the form of tax incentives or partial refunds of investments.

Brazil and Chile were the earliest countries in the region that implemented these programs and also the ones that achieved the greatest success. Most of the 5.4 million hectares in Brazil and the 2.7 million hectares in Chile that have been planted are the result of those programs. Although subsidies in Brazil and Chile ended 10 or more years ago, they provided the catalyst for plantations and the development of

the local industry. Argentina and Uruguay are late starters in these programs and the plantation areas achieved are still modest compared with other countries. Today, Argentina has about 1.2 million hectares of plantations and Uruguay about 750,000 hectares. The aforementioned four countries constitute the home of most plantations in South America for a combined total of about 10 million hectares. As a reference, the Pacific Northwest has about 29.7 million hectares of forestlands.

Some characteristics of plantations in South America

There are several interesting characteristics about the plantations in South America, to name just three:



A Eucalyptus grandis stand in Uruguay.

(1) Growth rates: South American plantations achieve some of the highest growth rates in the world. These growth rates equate to enormous wood production in a small area of land, thus helping to reduce pressure on tropical/natural forests. Chile, Brazil, Argentina and Uruguay also have hardwood plantations, typically eucalyptus. Growth rates for eucalyptus are even more impressive than softwoods.

MAI for softwoods: cubic meters per hectare per year (typically southern yellow pine in Brazil and radiata pine in Chile)

Canada	Sweden	USA	Chile	Brazil
1	3	10 -15	25	30

www.forestseedlings.com

- (2) *Species*: A species successful in one country may not be so in another. In this regard, *Pinus radiata* is very successful in Chile whereas southern yellow pine (*Pinus taeda, Pinus elliotis*) is the pine of choice east of the Andes.
- (3) Local or foreign ownership: Chile is dominated by three large, domestic forest products companies: Arauco, CMPC and MASISA. On the other hand, Uruguay shows a much more international ownership, where companies like Weyerhaeuser (USA), Botnia (Finland), Stora Enso (Finland) and Ence (Spain) own significant tracts of land.

Factors that mediate the influence of products from South American plantations on western forests

Wood products from plantations tend to have very uniform characteristics. This issue together with the high growth rate of South American plantations has allowed a quick increase in the exports of certain wood products. where uniform color or other wood properties are essential. A good example is finger-jointed softwood moldings. Fifteen years ago the production of moldings by Chile and Brazil was marginal, whereas in 2003 those two countries represented about 80 percent of the total USA imports of fingeriointed softwood moldings or about 23,000 40-foot containers.

Another important issue to take into account today is the presence of global trade routes. People are often surprised by products reaching far points of the world at very competitive prices. In this regard, ocean freight is not very dependent upon distance between ports. Variable operating costs, equipment balance and supply/demand in the market can result in container rates below \$500, even for crossing the Pacific Ocean. Lower ocean freight rates can actually help some markets that were previously pounded by high volumes of international products, as part of those products can now reach other, more distant markets.

Demand in China has helped the price of some commodities to reach unexpected highs in the last several years. This has appreciated the currencies of several South American countries, as their economies are



Pruned southern yellow pine in Uruguay.

largely based on the sale of those commodities. In turn, this has increased the production costs of exporting companies in those countries, with a consequent loss of cost competitiveness, as labor and other costs must be paid in the local currency, and selling prices are in U.S. dollars (or Euros).

The previous paragraphs have illustrated just a few of the factors that

affect the global wood products market. The change of just one of those factors can affect the industry, and ultimately, all commercial forests throughout the world. ◆

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India: A Sleeping Giant

BY RAJAT PANWAR AND ERIC HANSEN

fter independence in 1947. much of India's economic system was built around the erstwhile Soviet model of a planned economy. The government took Rajat Panwar the role of being the



major driver of economic development with some room for private entrepreneurship, subject to heavy government scrutiny. Imports and exports were highly controlled through licenses. Realizing the changes in the global marketplace, the government of India started opening up the Indian economy in early 1990s, and since then trade barriers are being gradually eliminated.

In recent years, the media has cluttered the news regarding India's potential role in the global economy. U.S. attention to the topic peaked earlier this year when President Bush visited India. The population of India is growing fast (1.38 percent annually, 2006 estimates) as is its economy (with a GDP real growth rate of 7.6 percent, 2005 estimates). A growing middle class with significant disposable income is resulting in lifestyle changes and consumption patterns leading many people to see India as a major world market, surpassing the muchknown reputation as a hub of information technology. All these positive signs are fueling investor confidence and the Indian stock exchange has witnessed an unprecedented rise. However, much of the development is occurring in services or selected manufacturing sectors, and the boom has not necessarily spread to sectors such as the forest industry.

The forest products industry in India consists of a huge number of small players. During the past two decades, the plywood industry has undergone technological improvements and an increase in production volumes, but as a whole, production is still very fragmented. Raw material scarcity and price fluctuations are major constraints facing the industry. Further, feeling the need for forest conservation, the government of India has placed a ban on natural forest felling, so the limited volume of timber originating from natural forests is through government auctions of those trees the forest department decides to cut. Despite the harvesting ban, demand has continued to grow, leading the industry to look for other sources of raw material. Agroforestry provides sizeable volumes to the industry, especially the hardwood plywood sector. Imports have increased dramatically in recent years. According to a recent report from the University of Washington's Center for International Trade in Forest Products, total imports of wood products into India increased

75 percent between 2000 and 2004. Hardwoods are purchased from across Southeast Asia and some softwood comes from New Zealand. Thus, a combination of imports, limited government supplies and agroforestrybased plantations are meeting the present market demand.

The growing middle class in India represents over 250 million people. For this and the more affluent segments of society, price is often a secondary consideration to the desire for products that match their psychological notion of a Western lifestyle.

Retail outlets in many bigger cities are selling products positioned with an image of being "imported." European and American brands are especially sought after. With respect to wood products, furniture and interior doors are the biggest market opportunities for manufacturers that do not have a low cost advantage. Further, "American" brands provide a psychologically based premium in this segment of population, reflected by success stories in products such as fruits (e.g., Washington apples), fast food and automobiles. Given this pattern, there is reason to expect this consumer segment to be willing to pay for well-positioned and promoted wood products. Some European companies have already established retail outlets for furniture and doors in bigger cities and are doing well.

Positive development in the housing sector creates significant opportunity for wood products in interior applications. The primary building material in India is concrete and there are only a few hilly hamlets where wooden houses are built. These geographical locations may present an opportunity to educate and collaborate with architects and builders toward western-style wood houses. Such a shift would create opportunity for Pacific Northwest wood products. Although the Indian culture does not generally perceive wood-based housing positively, recent increases in steel prices and resulting price increases in traditional housing may make wood a more attractive building material

A huge market exists for windows and interior doors in the many houses being constructed in all the major cities of the country. According to



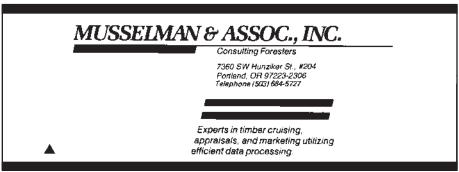




PHOTO COURTESY OF ERIC HANSEN

A typical retail outlet in New Delhi, including normal three-wheeled transport of wood products.

Integrated Database India Limited web report, with an urbanization rate of 28 percent per the 2001 census, an estimated housing shortage of 22.4 million, and increasing population, India will need 80-90 million new housing units during the next two decades.

Housing developments by builders, as is typical in the United States, are just beginning in India. Builders, therefore, represent a market segment for direct collaboration. These builders typically promote the salient features of houses through advertisements, and U.S. companies should seek to have Pacific Northwest wood products included as a salient feature. This development could lead to making other Indian market segments aware of Northwest wood quality and availability.

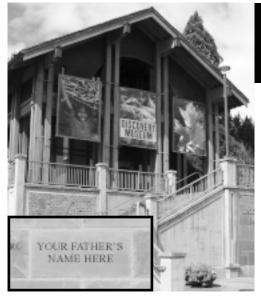
Despite the many positive macro economic indicators, the Indian market presents many challenges for potential exporters. Understanding cultural norms and the resulting unique business behavior of traders is critical to developing long-term trade relationships. Although developing quickly, India has many infrastructure bottlenecks and challenges.

Transport times are often two to three times what might be expected in the United States. The forest products sector presents special challenges and complications based on inventory storage availability and a highly fragmented value chain. Development funding agencies in India have realized that sustained economic growth can only be realized by infrastructure development and this is on the priority agenda of the government. Nonetheless, change takes time and foreign business partners must incorporate this fact in their decision making.

United States wood products exports to India have not been significant in the past. Given the need for developing new markets for U.S. wood products,

India's promising economic indicators and raw material shortage, and the lowering of the tariffs by the government of India, there is strong reason to believe that India could be a potential wood sector partner for U.S.-based manufacturers. A democratic political system in the country and English being understood by most people engaged in trade and production bolster this proposition. Efforts from academia and government are already exploring such potential and it is expected that exports will increase in the near term. This brings opportunities for Pacific Northwest foresters and manufacturers to cater to a new market. In addition, the issue of illegal logging in Southeast Asia could dramatically alter existing trade flows into India and potentially create a competitive advantage for places such as western North American that can depend on a sound forest management reputation. •

Rajat Panwar is a graduate research assistant and a member of the Forest Business Solutions Team at Oregon State University in Corvallis, Ore. He can be reached at 541-737-4343 or rajat.panwar@oregonstate.edu. Eric Hansen is professor, Forest Products Marketing, Department of Wood Science and Engineering, at Oregon State University in Corvallis. He can be reached at 541-737-4240 or eric.hansen2@oregonstate.edu.



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Softwood Lumber Supply Changes for the Canadian Wood Products Industry

BY CHRIS GASTON

here are a number of significant supply shocks that are and will continue to affect Canadian lumber supply. This article focuses on three factors: (1)



mountain pine beetle infestations in British Columbia; (2) Québec and Ontario annual allowable cut drops; and (3) reduced chip demand due to declines in pulp manufacture. While not discussed here, these factors are in addition to sawmill supply/profitability effects of the ongoing Canada/U.S. softwood lumber dispute and the increase in the Canada/U.S. exchange rate.

With the exception of the short- to medium-term effect of increased lumber supply due to the mountain pine beetle, all of these factors will put downward pressure on lumber supply in the years to come, including exports to the United States.

Mountain pine beetle

The mountain pine beetle (MPB) is one of the most destructive forest pests in North America. It infests mainly mature forests of lodgepole and other pines, and has decimated extensive areas. Two main factors have led to a large outbreak in western Canada. Successful forest fire prevention in B.C. and Alberta over many decades has created a larger land base of mature forest that is now susceptible to the beetle. Warmer weather and lack of killing frosts in the winter has enabled





PHOTO COURTESY OF NATURAL RESOURCES CANADA-CANADIAN FOREST SERVICE

The mountain pine beetle infestation in British Columbia has been present for over 10 years, but exploded to cover seven million hectares by 2004. It is now the largest insect epidemic in North America's history.

the beetle to extend its geographic range further north and to higher elevations than previously. Efforts to control the outbreak of the beetle in B.C. have failed. The beetle has spread through Rocky Mountain passes and now threatens Alberta forests.

With an impacted area comparable to approximately two-thirds the size of Sweden, the extent of the MPB outbreak in B.C. poses an enormous challenge to all aspects of forest management. As of 2004, the mountain pine beetle had infected more than seven million hectares of forests. The full effect of the beetle kill is not expected to be felt before 2012. It is expected that 2006 will be the worst year to date with 90 million cubic meters (m³) of merchantable pine killed, according to B.C. Ministry of Forests estimates.

To help address the beetle epidemic, in October 2002 the Government of Canada announced the six-year Mountain Pine Beetle Initiative. This initiative has since been supplemented with the B.C./Government of

Canada 2005-2010 Mountain Pine Beetle Action Plan, which includes funding dedicated to reforestation and community/economic stability.

To deal with the increased volume of infected pine, the B.C. annual allowable cut (AAC) will likely increase in the short- to medium-run to keep pace with the infestation. While AAC increase forecasts have not been published, a 10 million m³ increase is conceivable by the peak of the infestation. Additional AAC will increase lumber volumes, and possibly fuel one or more new oriented-strand-board plants in the province. Other uses are also being sought, including bio-energy.

Québec and Ontario AAC drops

In response to the recommendations of the Commission to Review Public Forest Management in Québec (also known as the Coulombe Commission), the province has announced a reduction in the AAC by 20 percent for softwoods between now and 2008 (the government is allowing a degree of leeway as to how compa-

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nies may spread out this decrease over the next two years). This recommendation is for conservation, with the stated goal of setting aside 12 percent of Québec's boreal forest in protected land areas.

Québec's AAC for 2000 through 2004 was roughly 55 million m³, of which 30 million m³ were softwoods on Provincial Crown land. A 20 percent reduction on Crown lands translates to roughly six million m³.

The province of Ontario is also expected to announce AAC reductions. Although the amount is not yet known, it is expected to be around a five percent reduction. With Ontario's AAC of softwoods on Provincial Crown land at roughly 20 million m³, this would lead to another one million m³ drop in allowable cut.

Reduced Pulp Capacity

In their recent forest products conference in San Diego (October 2005), Resource Information Systems, Inc. suggested that there are a number of "high price" pulp and paper mills in eastern Canada that will be the most vulnerable in North America to continued commodity pulp price drops. Pressure has also been felt in western Canada, particularly for hardwood pulp mills.

Reduced pulp mill demand, combined with wood chip surpluses as a result of the beetle-killed wood in British Columbia, has already led to drops in chip prices since 2004 in

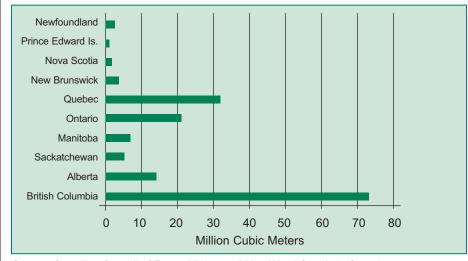
western Canada. This can affect lumber supply, as chip revenues are an important part of lumber mills' profitability. In eastern Canada, on the other hand. where chip rev-



PHOTO COURTESY OF NATURAL RESOURCES CANADA-CANADIAN FOREST SERVICE

Warm weather and lack of winter killing frosts have allowed the mountain pine beetle to extend its geographic range north.

Canada AAC by Province



Source: Canadian Council of Forest Ministers, 2005, Wood Supply in Canada

enues are even more important to the profitability of a sawmill, chip prices have remained strong. In fact, in eastern Canada, where the pulp industry was the original user of fiber supply, chip revenues are roughly 60 percent higher than in British Columbia. This is crucial. If pulp-milling capacity is significantly reduced, lumber manufacturing in eastern Canada could be reduced even beyond the existing levels of AAC reductions.

For both eastern and western Canada, a reduction in pulp manufacture and wood chip demand may lead to a restructuring of sawmilling technology away from the so called chipand-saw head rigs. This is more problematic in eastern Canada due to their higher small diameter log supply.

Again, with the exception of the possible short- to medium-term effect of increased lumber supply in British Columbia due to the mountain pine beetle, all of the factors mentioned above will put downward pressure on lumber supply in the years to come. •

Chris Gaston is national group leader, Markets and Economics, Forintek Canada Corp., Vancouver, B.C. He can be reached at 604-222-5722 or gaston@van.forintek.ca.



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China's Impacts on Forest in the Pacific Northwest

BY JEFF CAO AND DR. IVAN EASTIN

S ince the national logging ban took effect in 1998, imported forest products have played a crucial role in supplying China's expanding industry and consumer needs. The



Jeff Cao

State Forestry Administration of China reported that imported volume of wood products accounted for 43.5 percent of the country's total supply in 2003¹. In terms of value, paper and paperboard was the largest import category, totaling \$US5.7 billion in 2005, followed by wood products at \$US4.4 billion.

Trade patterns

Russia is by far the largest timber supplier to China, exporting predominantly softwood logs. Russian exporters clearly have several advantages, including lower prices, close proximity to China and substantial unexploited forests. The major softwood log species from Russia are Scotch pine, white pine and Dahurian larch. In 2005, Russia exported \$US1.4

billion of softwood logs and lumber to China, a 23 percent increase over 2004.

The United States was China's third largest timber supplier (\$US450 million) after Russia and Malaysia, and the second largest supplier of paper and paperboard products (\$US579) million) after Japan, in 2005. Forest products trade between China and the Pacific Northwest (PNW) region (consisting of Alaska, Washington, Oregon and northern California) has been growing over the past decade (see Table 1). The total value of forest products exported from the PNW to China grew at an average annual rate of 14.6 percent between 1996 and 2005, reaching \$US470 million in 2005. Waste paper, paper and packaging, pulp, hardwood lumber and softwood lumber were the top exports in terms of value, accounting for 94.9 percent of the total export value in 2005.

The U.S. is the largest buyer of Chinese secondary wood products, importing \$US6.4 billion of wooden products and \$US9.5 billion of furniture products from China in 2005. PNW ports reported a total of \$US793 million of forest products and wooden

furniture imports from China in 2005. Between 1996 and 2005, Chinese imports to PNW grew at an average annual rate of 29.6 percent (in value terms). Wooden furniture, paper and packaging, and plywood were the biggest items imported from China in 2005, accounting for 97.6 percent of total import value (see Table 2).

China has been a net forest products exporter to the PNW region since 1999, and the trade gap has expanded substantially since then. In 2005, China enjoyed a \$US323 million trade surplus, compared to \$US5.3 million in 1999. Trade patterns have shown that China is quickly moving up the value chain to become a higher value-added exporter. On the other hand, the country is largely dependent on overseas wood fiber raw materials.

Factors driving the demand and supply

China has become the world's third largest economy (based on purchasing power parity) and the third largest trading country in the world. A large population, rising incomes, booming housing-related markets and rapid development of export-oriented industries are major factors driving China's imports of forest products. These demands are largely met by abundant and inexpensive Russian timber supplies, as well as recycled fiber from the United States.

The housing industry (including interior decoration) is the largest consumer of wood products, accounting for 48.9 percent of the country's total timber supply by volume in 2003. Since 1999, China adds more than 550 million square meters of floor space of new residential buildings in urban areas annually². Per capita living space in China has increased from 39 ft² in 1980 to 111 ft² by 2000. By 2005 per capita living space was projected to reach 248 ft². By 2010, China's urban residential floor space will reach over 161 billion ft², according to industry sources.

China's expanding wood processing capacities, particularly furniture, flooring and panel industries, are driving the country's demands for imports of log, lumber and veneer products. The

Table 1. Forest products exports from PNW to China 2000-2005 (US\$, thousand).

	2000	2001	2002	2003	2004	2005	Percent Change (2004-05)
Waste paper	41,210	53,464	56,155	124,590	151,389	188,692	24.60
Paper and paperboard	95,321	64,147	75,309	78,974	99,611	101,412	1.80
Pulp	25,449	17,154	41,192	40,696	68,914	80,932	17.40
Hardwood lumber	21,236	22,341	31,072	34,855	40,393	59,641	47.70
Softwood lumber	1,280	11,720	14,042	16,041	19,005	15,723	-17.30
Softwood log	5,915	10,533	10,789	2,774	3,125	8,589	174.90
Hardwood log	2,386	8,082	7,645	5,549	6,011	7,044	17.20
Hardwood veneer	2,490	3,217	5,196	2,631	13,245	3,480	-73.70
Softwood veneer	878	393	2,976	3,353	1,608	1,667	3.70
Plywood	574	627	190	912	1,221	1,230	0.70
Prefabricated buildings	1,473	2,462	446	325	602	942	56.60
Wooden furniture	425	259	335	391	585	430	-26.50
Particleboard	979	1,369	3,049	2,088	893	370	-58.60
Fiberboard	671	515	843	1,288	222	192	-13.80
Total	200,287	196,287	249,239	314,480	406,824	470,408	

Source: USITC 2006

Table 2. Forest products imports from China to PNW 2000-2005 (US\$, thousand).

	2000	2001	2002	2003	2004	2005	Percent Change (2004- 2005)
Wooden furniture	153,794	158,606	248,669	300,541	351,553	472,548	34.40
Paper and paperboard	53,258	58,193	74,451	111,853	155,046	218,133	40.70
Plywood	3,922	6,258	14,699	21,624	56,341	83,426	48.10
Fiberboard	4	21	49	522	1,783	5,809	225.80
Hardwood lumber	0	204	265	547	1,256	4,265	239.60
Hardwood veneer	2,824	2,509	3,070	5,187	3,789	3,889	2.60
Softwood lumber	21	0	33	21	426	2,792	554.90
Prefabricated buildings	119	862	68	869	1,101	1,632	48.20
Particleboard	0	2	197	27	101	375	270.00
Total	214,015	226,706	341,529	441,356	571,935	793,334	

Source: USITC 2006

furniture industry is one of the major wood end-users in China, consuming about 10 percent of the nation's total by volume. Hardwood lumber and veneer and wood-based panels are major wooden raw materials used in furniture production. Malaysia. Indonesia, Russia and the U.S. are the top hardwood suppliers to China. Compared with hardwoods, softwoods are used to a lesser extent in furniture production in China, but the volume is growing thanks in large part to outsourcing activities by foreign companies, especially global retailers such as IKEA (Sweden) and Ethan Allan (U.S.).

Paper and packaging consumption is closely related to the development of domestic consumer products market and export-oriented industries in China. Between 1995 and 2004, domestic Chinese retail market and industry exports have been growing at an average annual rate of 10.5 percent and 14.8 percent, respectively². Domestic agri-fiber resources and imported waste paper are currently two major fiber sources to the booming Chinese paper industry¹.

Future outlook

Commodity price is probably the most reliable predictor of future sources of wood fiber supplies to China. Low-cost production has long been a competitive edge for Chinese manufacturers. As Chinese manufacturers continue to invest in automation and develop more sophisticated business strategies, there is little doubt that China will soon

become a global manufacturing powerhouse in almost all value-added forest products sectors. Achieving long-term, low-cost fiber supplies has thus become critical for Chinese industries to sustain the fast growth momentum.

Meanwhile, China aims to become self-sufficient in wood fiber supplies via plantation development and technology innovation in the future³. The government has issued several policies to encourage the use of domestic timber supplies, which will lead to a gradual shift from imports to domestic sources for commodity fiber supplies.

For sawmill and paper industries in the PNW region, China presents to be an emergent market. The structure of future trade patterns between PNW and China is less likely to be changed significantly as China will continue to increase its demands for high-quality timber products from the PNW region, as well as fiber commodities given relatively stable prices. China will remain one of the major exporters of value-added products to PNW.

Jeff Cao is a graduate research assistant and Dr. Ivan Eastin is director for the Center for International Trade in Forest Products (CINTRAFOR), College of Forest Resources, University of Washington, Seattle, Wash. Cao can be reached at caoxz@u.washington.edu or 206-616-3681. Eastin can be reached at 206-543-1918 or eastin@u.washington.edu.

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Innovative Efforts to Remain Competitive Underway

BY SCOTT LEAVENGOOD

he western U.S. forest industry has endured dramatic changes in recent years. The industry has consolidated and retooled to process



smaller diameter logs of a more limited range of species. Many of the small- to mid-sized mills are no longer in business and domestic firms increasingly rely on foreign sources for raw materials. For forest landowners, the result has been a shrinking of markets and dwindling incentives to manage for anything beyond a narrow range of species and log diameters. As Eric Hansen stated in the lead article in this issue, "a healthy manufacturing sector and healthy forests are inextricably linked." And there is increasing recognition that the future health of the manufacturing sector is tied to its ability to innovate—in processes, products and business systems.

Western states are working to foster such innovations through a number of initiatives. A short list of these initiatives includes the Rural Technology Initiative (RTI) and Wood-**Plastic Composites Information** Center in Washington. RTI (highlighted in the September/October 2005 issue of Western Forester) is focused on using technology to facilitate technology transfer to rural communities. Washington State University's Wood Materials and Engineering Laboratory is focused on new product development using wood residues via R&D and outreach in wood-plastic composites.

In Alaska, the Sitka Wood Utilization Center and Ketchikan Wood Technology Center are assisting Alaskan wood-products industries and timber-dependent communities to explore new products and processes through research, technology transfer and outreach.

And in Oregon, the new Oregon Wood Innovation Center (OWIC) at Oregon State University is serving as a "clearinghouse" for information and assistance in areas such as technical data on western species, market assessments and feasibility studies, new product development, product testing, education, and assistance with process improvement and facilitation of networking among industry personnel.

Some projects that are currently in progress at OWIC include:

- Technical data on western wood species. The publication *Hardwoods* of the Pacific Northwest has been converted to separate web pages for each species (http://owic.oregonstate. edu/orwoods.php). There are links on each page to Oregon firms that buy or sell products using the species. Websites for western conifers are in progress.
- Market assessments and feasibility. Graduate students in forest products marketing are preparing a proposal to an Oregon woodland cooperative to assess niche market opportunities for products on member woodlands.



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The Oregon Legislature created the Oregon Forest Resources Institute to improve understanding of forestry and to encourage sound forest management.

- New product development. A group of inventors has approached OWIC with a new wood composite product idea. The concept and target market are being refined prior to conducting product tests to determine material properties.
- Education on process improvement. A two-day workshop on statistical process control in wood products manufacturing was held in Portland in late April. Courses on lean manufacturing and wood technology for wood industry managers are also in the planning stages.
- Industry networking. A searchable on-line directory of the Oregon forest industry (www.orforestdirectory.com) has been developed that lists species used, products produced and purchased, residues available, etc. Also, a series of topical e-communities (on-line forum/bulletin board) where users can post questions and answers on topics such as lumber grading for independent mills are being developed.

The globalization of markets is forcing the forest products industry to step back and examine how it does business and how it will compete in the future. The preceding initiatives and activities will help the industry find new ways of using the resource; new ways of processing and distributing products; new ways of interacting with suppliers and customers; and undoubtedly, a host of new ideas we have not yet dreamed up! •

Scott Leavengood is director of the Oregon Wood Innovation Center in Corvallis, Ore. He can be reached at 541-737-4212 or scott.leavengood@oregonstate.edu.

WSSAFers Enjoy Lake Chelan

ne hundred twenty-eight SAF members, guests, speakers and exhibitors converged on Campbell's Resort in Chelan for the Washington State SAF annual meeting April 4-6. Hosted by the Mid-Columbia Chapter under the guidance of general chair Michelle Ellis, foresters from throughout the state enjoyed a program under the theme of "Living with Widfire—Lessons Learned." The spouses tour, 24 strong, was very successful and featured a guided limo tour with wine tasting in the Chelan Valley. The meeting was capped off on Saturday with a cruise on the "Lady of the Lake" up Lake Chelan for a guided tour viewing historical wildfire sites and other points of interest.



Past Foresters of the Year join John Gross (with plaque), this year's award winner. Gross, a former forester with International Paper, went back to school to earn his Masters in teaching. Now a science teacher in the Longview School District, he is tending the young minds of students who explore nature at Wake Robin, the district's 82-acre Learning Center. The center is a critical jumping off point for the district's environmental education curriculum, providing classroom, lab and field experiences not available in a traditional school setting. John's endless enthusiasm serves to complement the core values and mission statement of the Society.



The Southwest
Washington Chapter
was named Chapter of
the Year. Receiving the
award on behalf of all
chapter members was
John Ehrenreich.
Numerous chapter
members contributed to
the success of the
chapter in their monthly
chapter meetings and
general chapter management.

(right) Fifty-year members were recognized at the annual meeting awards banquet for their continued commitment to SAF.



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From Mariners tickets to bottle stops, a variety of donated items brought in \$1,405 for the Foresters' Fund through raffle ticket sales, silent auction and oral auction. Several additional items were auctioned off with \$220 in proceeds going to the WSSAF Foundation.



We Remember

Dick Holmes 1938-2006

Richard (Dick) Holmes, age 67, of Milwaukie, Ore., died March 27, 2006, at home of liver failure. Born June 2, 1938, in Sheboygan, Wisconsin, he grew up in Portland where he attended St. Andrew's grade school and Jefferson High School. He graduated from Southwest High School in Minneapolis, MN in 1956.

Mr. Holmes returned to Oregon for college and graduated in 1961 from Oregon State University with a degree in forestry. He began his career with Oregon Department of Forestry while still in college, working on fire suppression crews as a student. He joined the forestry department full time upon his graduation. In 1965, he joined Publisher's Paper Company and moved with his young family to Milwaukie.

He was active in the community, volunteering in one of the earliest outdoor education programs at Ardenwald School, and professionally, as a member of the Society

of American Foresters. After leaving Publisher's, Mr. Holmes enjoyed a long and successful career as an independent forestry consultant, retiring in 1998. In retirement, he served on the Oak Lodge Community Council and the Oak Lodge Sanitary District Board.

Mr. Holmes loved the Pacific Northwest, but also enjoyed Hawaii, making frequent trips to the islands. The Kona coast was his favorite spot. He had a curious and creative mind, and was able to fix or build almost anything. He was the SAF Portland Chapter chair at the time of his passing.

A memorial and celebration of Dick's life was held April 8 at Magness Memorial Tree Farm. In memory of Dick, plant a tree, tend a garden, adopt a stray cat or send a donation in his name to the Feral Cat Coalition of Oregon.

Joseph C. Dose 1927-2006

Joseph C. Dose was born October 17, 1927 in Keokuk, Iowa. He graduated from Keokuk High School in 1945 and was then drafted in the US Army. In 1951 he graduated from Iowa State University with a degree in Forestry.

Mr. Dose began his career in forestry

with the Bureau of Land Management in Coos Bay and later served as district manager of Eugene and Salem, bureau staff forester in Washington, D.C. and chief of Forestry for BLM. He was on the advisory board of the North American Forestry Commission, World Forest Congress, and the US-Japanese Forestry Panel. He retired from the BLM in 1986.

After retirement Joe and wife Carol continued to live in Salem where he enjoyed working in his vineyard and they found great joy in RV traveling with the River Sam's RV Club. They also found Mexico exciting, as well as traveling to Europe with friends. He was a member of the Salem Golf Club and enjoyed the fellowship of the Senior Group, where he boasted two holes in one. Mr. Dose was extremely proud of his family and looked forward to family gatherings, especially those summers at the ranch in central Oregon. He was always ready for a fishing trip with his boys.

Mr. Dose was a member of the First Presbyterian Church, serving as an Elder and on various committees. Much of his attention focused on Habitat for Humanity and he challenged church members to build houses for this worthy cause. He was a member of South Salem Rotary and the Society of American Foresters, for which he was recently honored for 50 years of service, and he served in various capacities for Public Land Foundations.

The family would like to thank the doctors at Salem Hospital, and to Hospice for their support and dedication. In lieu of flowers, contributions may be made to Willamette Valley Hospice, Salem, OR 97302, 503-588-3600; First Presbyterian Church, 770 Chemeketa Street NE, Salem, OR 97301; or Salem Hospital Foundation, PO Box 14001, Salem, OR 97309-5014. ◆



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Calendar of Events

UNIVERSITY-SPONSORED EVENTS

Course	<u>Dates</u>	<u>Sponsor</u>	<u>Location</u>
Using GPS	June 10	UID	Coeur d'Alene, ID
Pruning for White Pine Blister Rust	June 16	UID	Coeur d'Alene, ID
Managing Forest Organic Debris	July 21	UID	Priest River, ID
Forest Insects and Disease Field Day	July 21	UID	Moscow, ID
Forest Insects and Disease Field Day	August 4	UID	Sandpoint, ID
Inland Empire Dry Kiln Workshop	Oct. 2-5	UID	Moscow, ID

OTHER EVENTS

Joint Inland Empire SAF/Washington Farm Forestry Association/ Association of Consulting Foresters annual meeting, June 8-10, Community Colleges of Spokane, Colville campus. Visit www.iesaf.org.

10th Annual Leadership Academy, June 17-20, Snowbird Resort, Snowbird, UT. Contact: Louise Murgia at murgia@safnet.org or 301-897-8720 x118.

Western Mensurationists Meeting, June 18-20, The River Lodge, Fortuna, CA. Contact: WFCA.

Forestry Leadership Youth Summer Camp, June 18-24, Magness Memorial Tree Farm, Wilsonville, OR. Contact: Rick Zenn at rzenn@worldforestry.org or 503-488-2103.

Annual Meeting: Western Forestry and Conservation Nursery Association, June 19-22, Hilton Conference Center, Eugene, OR. Contact: WFCA.

Tree Day & Family Adventure Day, August 18-19, Udell's Happy Valley Tree Farm, Lebanon, OR. Contact Fay Sallee at sksallee@proaxis.com or 541-451-5322.

Who Will Own the Forest 3? Sept. 11-13, World Forestry Center, Portland, OR. Visit http://wfi.worldforestry.org or call Sara Wu at 503-488-2137.

Meeting the Challenge: Invasive Plants in PNW Ecosystems
Conference, Sept. 19-20, Center for Urban Horticulture, Seattle, WA. Visit http://depts.washington.edu/urbhort/ or call 206-685-2692.

Components of Successful Reforestation, Sept. 26-27, Hilton

Conference Center, Eugene, OR. Contact: WFCA.

Managing for Wildlife Habitat in Westside Production Forests, Oct. 18, Hilton Hotel, Vancouver, WA. Contact: WFCA.

SAF National Convention, Our Woods: Wild and Working, Oct. 25-29, Pittsburgh, PA. Visit www.safnet.org/natcon-06/index.cfm.

Contact Information

UID: University of Idaho Extension, 1000 West Hubbard, Suite 140, Coeur d'Alene, ID 83815, 208-446-1680; cschnepf@uidaho.edu.

WFCA: Western Forestry and Conservation Association, 4033 SW Canyon Rd., Portland, OR 97221, 503-226-4562; richard@westernforestry.org; www.westernforestry.org.





Our Voice

Our Voice is a column for students that will appear in every issue of the Western Forester. The intent is to provide students with a venue to present their thoughts and views on a variety of topics related to forestry and SAF, and to provide a communications link where professional members can learn what is on the minds of students and our future leaders.

Opinions: Are They Just Your Beliefs?

BY MICHAEL THOM

ormulating a clear, concise, relevant opinion based on pertinent data is harder than most people expect. Generating simple opinions is often very easy, but generating opinions you are able to back up and support with evidence is much more difficult.

Throughout the United States, thousands of federally owned Forest Service-managed land is proposed to be sold to fund the Secure Rural Schools and Community Self-Determination Act of 2000. Approximately 26,000 acres in Idaho, 7,500 acres in Washington,

About the Author

Originally from Aurora, Minnesota, Mike Thom will graduate from the University of Idaho in May with a Master of Natural Resources degree. He has been active



in the University of Idaho SAF student chapter the last two years, which has provided opportunities to broaden his knowledge and perspective on the forestry profession. He looks to continue SAF involvement in Illinois while working on the Midewin National Tallgrass Prairie. A career goal of his is to progress through the Forest Service, continually learning and garnering more management responsibilities.



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Bruce H. Williams

and 11,000 acres in Oregon are proposed to be sold. Is this a good idea for local schools and communities, private landowners, recreationists and the Forest Service? What do you think?

When addressing an issue as large as this one, do your own research or get it from credible sources. While at the SAF National Convention this past year in Fort Worth, Texas, I remember how the speakers had evidence for what they were speaking on and showed their methods and sources. Therefore, they were able to use that evidence to support any opinions or claims they were making. It was very convincing listening to these experienced speakers support their opinions; this was a learning experience for me.

Regarding the public land sales issue, look at both sides of the issue. Why should the land be sold or not sold? Will the communities benefit economically? Will the focus of land managers be narrowed by the loss of land? Does this threaten the National

Forest System with "loss of open space" identified by Forest Service Chief Dale Bosworth? Will it limit access to public land?

As much as we may not like it, politics drive natural resource fields, with at least two political sides to every issue. Do not formulate your opinions based on individual scientific knowledge or a one-track mind. Be open to suggestions from the "other side" they often have very good and feasible suggestions. Do not work only within your specific group or specialty area, but also between groups to help limit the amount of conflict on an issue. So, before stating your opinion, consider how other groups or individuals will react to it and consider how you can influence their reaction.

I leave the readers to form their own opinion on the Secure Rural Schools issue, but remember to dig deep into an issue; search out all relevant and credible facts; and then formulate your opinion so that you can support it with evidence. All natural resource fields will have conflict, but look for ways to mitigate those conflicts. Students, as hard as it may be, take note on how important evidence is in any issue (school or work) and how you can combine this with the knowledge learned in class to better prepare yourself for the future. Professionals, strive to garner further knowledge through SAF activities, continuing education and through your job. They are all great places to continually develop professional skills. •

About University of Idaho College of Natural Resources

The College of Natural Resources is located on the Moscow campus of the University of Idaho in northern Idaho, nestled between Moscow Mountain and the beautiful hills of the Palouse. Our residential campus is close to wilderness and recreation areas, fostering hands-on learning through field trips and labs that challenge our natural resource majors to learn and apply their knowledge to the real world.

Our college educates natural resources professionals with integrated, multidisciplinary knowledge and skills, striving to balance theoretical and practical experiences.

We have 50 research and teaching faculty and 600 students in seven undergraduate majors, along with six Master and Ph.D. degree programs. Our college houses one of the largest DNA and genetics laboratories in the nation devoted to collecting critical scientific data for wild populations of plants and animals. We are home to 15 research units, a world-class seedling production research nursery, an 8,500 acre experimental forest and Taylor Ranch, a remote wilderness field station. Our college consists of five academic departments with interdisciplinary programs.

For additional information, visit www.cnrhome.uidaho.edu.

SAF Council Report: Foresters' Fund Whole Again

BY RICK BARNES

oresters' Fund, budget items, Fellows and continuing education opportunities were all topics of discussion at the March 11-12



Council meeting at Wild Acres in Bethesda, Maryland.

The SAF Leadership Academy is quickly approaching. It will be held June 17-20 at the Snowbird Resort in Utah. For any of you looking for great leadership training for yourself or an employee, this is a tremendous opportunity. For more information, contact Louise Murgia at the SAF national office at murgial@safnet.org.

The National Convention, under the theme of "Our Woods, Wild and Working," will be held October 25-29 in Pittsburg, Pennsylvania. It is shaping up to be a great convention. The keynote speaker is Wanari Maathai, a 2004 Nobel Peace Prize winner. She is the assistant minister for Environment and Natural Resources in Kenya. I am looking forward to hearing her speak. The funding to make this happen was largely due to a \$50,000 grant received from the Hines Foundation.

The 2006 SAF budget approved by Council included \$40,000 in Foresters' Fund grants. There has already been more than \$11,000 awarded in 2006. All chapters and SAF units are encouraged to be thinking about opportunities to apply for Foresters' Fund grants to help with projects. Over the course of the Centennial Campaign in 2000, we used SAF funds to pay obligations, which resulted in the general fund owing the Foresters' Fund more than \$250,000. Since the year 2000, SAF has been diligently working to pay back the Foresters' Fund. Due to diligent budget control, that debt is now paid in full and the Foresters' Fund is once again whole and working for SAF

All members should pat each other on the back for helping make the Foresters' Fund grow to more than \$1.3 million over the years. SAF members at the local level have been able to influence the public and strengthen forestry because of the money available through the generosity of members like you. Let's continue this great effort and work together to help the Foresters' Fund continue to grow.

The Fellows Nominating Committees are now in place and are working on the task of determining who should be nominated as a Fellow. SAF honors those members who have provided outstanding contributions to the Society and to the forestry profession with the title of Fellow. The goal of the Society is to recognize approximately five percent of its members with this honor. This requires us to be diligent in our selection process to choose those that have truly been leaders in our organization and provided outstanding contributions to the Society as well as the forestry profession. If you would like to nominate someone

to become a Fellow, contact the chair of the Fellows Nominating Committee from your district. District 2 (Oregon) chair is John Bell, who can be reached at 541-758-4939 or johnbell@proaxis.com. District 1 (Washington State, Inland Empire and Alaska) Fellows chair is Ann Forest Burns, who can be reached at aforestburns@msn.com.

Thank you again for the opportunity to serve as your Council Representative. If you have any questions, concerns or items you would like to see Council address, please contact your Council representative. ◆

Rick Barnes is District 2 Council representative. He can be reached at 541-673-1208 or rbarnes@barnesinc.com.
District 1 Council representative Kirk David can be reached at 208-769-1524 or kdavid@idl.state.id.us. The next Council meeting is June 3-4 in Bethesda.

GREEN CROW CORPORATION

 $\textbf{Position:} \ \ \textbf{Silvicultural Forester} \ - \ \ \textbf{Western Washington and Oregon}$

Green Crow Corporation is seeking a candidate to fill the position of Silvicultural Forester in our Port Angeles, Washington Office.

Responsibilities include all aspects of providing silvicultural services, and implementing silvicultural projects on fee and client lands. These include planning, budgeting, reporting, site-specific silvicultural guidance, and management of several silvicultural technicians.

A Bachelor's Degree in forestry and a minimum of five years continuous field experience, implementing coastal and western cascades silviculture for intensive plantation management is required. Fluency with FPS, FLIPS and GIS applications is helpful, but not mandatory.

Green Crow Corporation manages over 200,000 acres of timberland for numerous clients with a strong focus on financial returns. We offer a competitive salary, and a full range of benefits and programs.

Qualified applicants should send a letter of interest, references, and Resumè by June 30, 2006 to:

Green Crow Corporation • 805 East Eighth Street
Port Angeles, WA 98362 • Attention: Silvicultural Position

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Global Forest Products Markets

(CONTINUED FROM PAGE 3)

article by Ernesto Wagner for more information on South America).

When it comes to furniture, China has dramatically impacted the U.S. industry and market. Over half of Chinese exports of furniture make their way into the U.S. marketplace. The Chinese are having dramatic impacts in other sectors of the industry as well. Hardwood plywood imports from China have increased nearly 12 times since 2001 to approximately 1.4 million cubic meters. It is expected that Chinese exporters will soon be shipping structural plywood bearing requisite grade stamps as well. Softwood logs from Russia's Siberian forests are a major source of

softwood fiber for the Chinese industry (see China article by Jeff Cao and Ivan Eastin).

Many experts consider India to be the next China. Over the next decade. India will overtake China as the most populous country in the world and has a growing middle class that represents enormous consumption potential. India is not an exporting powerhouse in the wood sector like China and is unlikely to become so. Instead, India may be a significant market for U.S. exporters (see article by Rajat Panwar).

What may the future hold?

Healthy Pacific Northwest forests

and healthy forests are inextricably linked. While many family forestland owners may keep their forestland despite limited economic returns resulting from a diminishing processing infrastructure, this will not be the case with timberland investment management organizations and real estate investment trusts. If the return on investment becomes too low, these organizations will quickly divest their portfolio of timberlands, presenting potential significant negative impacts on sustainability of our forests.

The U.S. housing sector has experienced a sustained, strong run since 2002. This run appears to be over or at least slowing. As demand contracts, import volumes into the United States will be impacted, as will domestic manufacturers who face additional challenges to their competitiveness. In the short to medium term we can expect to see the same trends continuing that we see today. However, high energy prices could create new advantages for local production.

Although it may seem impossible to stem the seemingly continual erosion of competitiveness, there are major efforts within and outside the industry to help assure long-term viability for the forest sector. Some of these efforts are documented in Scott Leavengood's article on the Oregon Wood Innovation Center. ◆

Eric Hansen is professor, Forest Products Marketing, Department of Wood Science and Engineering, at Oregon State University in Corvallis. He can be reached at 541-737-4240 or eric.hansen2@oregonstate.edu.

are highly dependent upon strong local log markets. Without these markets, landowners will have no incentive to actively manage their forests. Thus, a healthy manufacturing sector

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REFERENCES CITED

¹Wood Markets: Monthly International Report is a newsletter from the International WOOD MARKETS Group, Inc. from Vancouver, B.C., Canada. Several issues from 2005 and 2006 were used in preparing this article.

²Import and export statistics are from the United States Department of Agriculture, Foreign Agricultural Service, www.fas.usda.gov.

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Policy Scoreboard

Editor's Note: To keep SAF members informed of state society policy activities, Policy Scoreboard is a regular feature in the Western Forester. The intent is to provide a brief explanation of the policy activity—you are encouraged to follow up with the listed contact person for detailed information.

Washington Lawsuit Settled. Public Lands Commissioner Doug Sutherland announced on May 21 settlement of a major lawsuit against Washington DNR. Environmentalists filed suit in October 2004 against DNR's new sustained harvest adoption, alleging several violations of environmental review process. Superior Court Judge Sharon Armstrong agreed with plaintiffs on three of four counts in October 2005. Plaintiffs initiated settlement negotiations shortly thereafter.

The settlement permanently removes dozens of owl circles that hamstrung DNR's operable land base and also lifts several restrictive land-use policies. In return, environmentalists received assurances DNR's Habitat Conservation Plan expeditiously will be implemented using standards developed during negotiations. In addition, long delayed planning processes on the Olympic Peninsula will occur in the near future.

DNR will implement a long-term study to examine emerging silvicultural methods and plaintiffs agree to not pursue future litigation on issues covered in the agreement, mostly owl habitat issues. A dispute resolution process is designed to deal with future problems before they reach the media or the courtroom. This issue seemed to catch the attention of the media, indicating they may be tiring of the constant state of war in the woods. Is that possible?

DNR's projected harvest level essentially remains unchanged, although there will be an increase in owl habitat creation/enhancement harvests over the next decade. These harvests will use a variety of thinning types, generally known as Variable Density Thinnings used to create multi-storied stands in uniform forests. Contact: Bob Dick, WSSAF Policy co-chair, bdick@afrc.ws.

Washington Legislation. Washington's legislature headed home on budget and under time limit, a first in several decades. Along the way, they dealt with two bills of interest to foresters.

House Bill 3227 would have given state sanction to creation of log trucker unions.

The bill died, but the underlying problems of high fuel costs and intense pressure to cut costs, along with increased stumpage on declining lumber values, assures the problem will be around in the foreseeable future. Landowners and operators, however, generally acknowledged the problem and pledged to find solutions.

Senate Bill 6874 reduces the B&O tax, in two steps, on most of the forest industry by some 40 percent through 2024. A 0.05 percent forest fee surcharge on the tax reduction assures Forest/Fish funding over the period. The bill passed both houses with wide margins and is expected to be signed by the governor. Sen. Mark Doumit, D-Cathlamet was the bill's chief architect. Contact: Bob Dick, WSSAF Policy co-chair, bdick@afrc.ws.

OSAF Members Encouraged To Use Position Statements. With adoption of a new position statement on Managing Mature and Old-Growth Forests in late 2005, OSAF now has eight active positions on important forestry issues. The others are: Active Management to Achieve and Maintain Healthy Forests; Salvage Harvesting; Commercial Timber Harvest on Public Lands in Oregon; Clearcutting; Using Pesticides on Forest Lands; Riparian Forest Management and Fish; and Landslides on Forestlands. Members are encouraged to use OSAF's position statements to help convey their professional forestry views to key decision makers and the interested public. In addition to handouts and mailings, text from the position can be helpful in articulating important points in letters to the editor, comments to public agencies, etc. All of the OSAF position statements are posted at www.forestry.org. Contact: Paul Adams, OSAF Policy chair, 541-737-2946; paul.adams@oregonstate.edu.

Forestry Professionals as Stakeholders. Public agencies and other decision-making groups often seek input from stakeholders as they evaluate forest

issues and develop policies and management plans. Forestry professionals may be included due to their affiliation with commonly identified groups (e.g., forest industry, landowners), but rarely are they called upon to represent a professional perspective independent of their employer or client interests. The result is missed opportunities to tap highly relevant expertise and experience, as well as a limited voice for a key group that must deal directly with policies and plans shaped by others, often without the unique, independent insights of the professional forestry community. SAF members are encouraged to help fill this gap, and to remind agency leaders and decision makers of the importance and value of including forestry professionals as stakeholders. A one-page handout has been prepared to help communicate these points, and is available from Paul Adams, OSAF Policy chair, 541-737-2946; paul.adams@oregonstate.edu.

Forest Recovery Issue Remains

Hot. 2006 began with many news reports prompted by an OSU study titled "Postwildfire Logging Hinders Regeneration and Increases Fire Risk" and related actions involving OSU and agency scientists, students and administrators, as well as federal and state lawmakers. Issues raised by the OSU study have overlapped discussions both in the region and on Capitol Hill about new legislation (e.g., H.R. 4200) to deal with the unique management concerns that follow wildfires and other catastrophic events. The national SAF office continues to promote key post-catastrophe recovery concepts on Capitol Hill and with the news media, including providing fact sheets and testimony at Congressional hearings. SAF members also can use these materials to help inform their own representatives and the interested public about this important issue. Further information can be found at: www.safnet.org/policy andpress/forestrecovery.cfm. Contact: Paul Adams, OSAF Policy chair, 541-737-2946; paul.adams@oregonstate.edu. •



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