The forest sector is not what it used to be. Over the past five years there has been substantial change in areas of forest management policy and practise, international trade, and in the mix of goods and services that forests provide and how they are valued. For Aboriginal communities there is less opportunity in the area of timber harvesting as the downsizing and consolidation in the traditional forest industries – pulp and paper, lumber – has caused a drop in demand for wood supply. There are exceptions to this general observation as First Nations in BC are now harvesting timber in greater volumes than in any time previous as a result of the need to salvage mountain pine beetle killed wood. A major concern in BC is that once the mountain pine beetle infected wood is harvested, there will be a sharp reduction in available timber supply and First Nation timber harvesting will decline in many communities. What then?

If Aboriginal communities across the country are to derive economic benefit from the forest resources that surround their communities – for many this is the only major development option – then they need to develop strategies encompassing new and different approaches to forest-based development. Basically, overall there has to be a diversification of the Aboriginal forest-based economy and now is the time to address this matter.

The downsizing of large forest companies and their vacating of forest tenure and certain market niches is creating market space for smaller community-based enterprises. The forest sector appears ripe for those First Nations that have acquired or are seeking forest tenures, or are managing forested land acquired through land claim settlements, treaty entitlement, or other means. These and several other factors are contributing to the need for diversification in the Aboriginal forest sector.

Currently, there is increasing pressure for forest conservation reflecting the growing societal concern for protecting the ecological functioning of forest ecosystems and the role forests play in mitigating climate change. Considered gifts from Mother Earth by Indigenous Peoples, environmental or ecological goods and services (EGS) are defined as all the benefits that human populations derive directly or indirectly from healthy ecosystems. Forest conservation is the best option in ensuring that EGS from forests – namely biodiversity, air and water purification, and carbon sequestration, are maintained and in some cases enhanced.

There are two basic approaches to forest conservation. First, governments in Canada are committing to establishing forest protected areas to maintain the health of ecosystems and wildlife species, and to mitigate climate change. Forest policy such as that announced by the Quebec and Ontario governments in 2009 that 50% of the boreal forest within their respective jurisdictions will be protected is indicative of this broad direction.

Secondly, market-based conservation is now a feature of forest management in Canada. Eco-tourism, forest certification and biodiversity offset projects, all now play a part in linking forest conservation to the marketplace. More significant will be the establishment of a compliance based (regulated) carbon market for
the trading of carbon offset credits once Canada and the USA are able to harmonize their overall approaches to climate change. In place now are several voluntary markets, e.g. Pacific Carbon Trust in BC and the Chicago Climate Exchange, through which carbon offset credits generated through specific initiatives, e.g. forest carbon sequestration projects, are bought and sold.

Forest carbon sequestration projects are widely acclaimed as a primary means of reducing greenhouse gas emissions thereby mitigating climate change. For this reason, projects that increase storage of carbon either in existing or new (afforestation) forests provide a service which has economic value. The carbon credit has value to business entities (the buyers), such as power companies and manufacturers that burn fossil fuels, who are seeking to offset their carbon dioxide emissions. Carbon credits in these projects are gained by actions taken by the project proponent (the sellers) that help store carbon dioxide thereby reducing emissions into the atmosphere. These actions can be the result of forest conservation practises related to reforestation, afforestation and avoided deforestation.

Engaging in what is being called the conservation economy has to be a key component of First Nations’ strategies to diversify in the forest sector. It offers opportunity to strengthen the relationship with the land and to advance Aboriginal and treaty rights recognition. It requires however, the negotiation of long term tenure arrangements with other levels of government to define relationships and determine the nature of revenue generation, either in the form of carbon credits or public payment mechanisms for EGS or protected areas management.

In addition to the opportunities emerging from the broad forest conservation imperative, Aboriginal communities could diversify their forest interests through approaches that focus on value-added wood processing, non-timber forest products and forest bio-products. These forest sub-sectors are targeted as key components of the future forest economy and governments have committed significant financial resources for research and development (R&D) and market development to support growth in these areas.

In these areas of development, Aboriginal communities and their enterprises should investigate; how government policy, R&D outputs, and support programming, can be tailored to their needs and circumstances, and, how competitive advantage can be gained through principles of green marketing, corporate social responsibility, and buy – Aboriginal procurement programs. Aboriginal enterprises in these forest sub-sectors should seek market differentiation for their products and services based on effective resource use and sustainability in forest practices. Aboriginal forest companies must represent their own interests in the market place, and in so doing, enhance their competitive advantage based on their relationship with the land and the willingness and desire of clients to do business with Indigenous peoples.

Typically, value-added wood products include treated lumber, engineered wood products, shakes and shingles, posts, poles, log and timber-frame homes, mouldings, pallets, boxes, cabinets, furniture, art and other finished or semi-finished goods. Value-added producers must be market-oriented focussed on the needs of end consumers. Often they require partnership arrangements with other forest companies to obtain wood supply and for primary breakdown. There is opportunity here for Aboriginal communities to engage in traditional value-added production and to develop products which are distinctively Aboriginal based on traditional knowledge and the unique artistry that Aboriginal people possess.
Non-Timber Forest Products (NTFPs) include herbs, medicines, functional foods, arts and crafts materials, home decor and gardening products obtained from different types of forest plants. All Aboriginal communities utilize NTFPs though most not in a commercial sense. Concern exists about any NTFP development relating to medicinal uses and overall ecological sustainability. Nonetheless, diversification requires some consideration of NTFP potential bearing in mind that the commercialization of most NTFPs does not require the disclosure of traditional knowledge, and may in fact contribute to a strengthening of cultural practises in a contemporary manner.

Forest bio-products are manufactured from wood and other forest biomass including plants and forest industry waste materials. They include textiles, fibres, polymers, adhesives, bio-insecticides, antibiotics, plant-derived pharmaceuticals, neutraceuticals, biochemicals and biofuels. There are an estimated 500 forest bio-products in commercial use today though the industry is deemed to be in its early stages of development. Manufacturing and bio-energy are two promising fields of opportunity for Aboriginal communities given their proximity to the raw materials needed, and in some cases, priority rights to harvest the natural resource.

Approaches by Aboriginal communities to diversify their forest-based interests will often mean building on current initiatives and enterprises by adding value through ancillary economic activity, i.e. silviculture contracting added to logging operations. Aboriginal communities and enterprises can broaden their scope of activity by providing a range of forest management services which could include data collection and management, forest/watershed restoration, GIS and planning support, auditing and field services, fire safety/fuel management, road maintenance, etc. Forming partnerships at a regional level is key to diversification, as forest-based businesses are inter-related and often inter-dependent. Aboriginal communities need to consider inter-nation (groupings of First Nations with complementary development plans) development strategies, and relationships with research institutes and governmental agencies. Networking with all forest interests in a regional context is key to remaining current on sector issues and establishing oneself as an integral presence.

Diversification brings about the need for different skills, aptitudes and perspectives. Aboriginal communities that view the forest sector as a primary avenue for development, need to adopt and implement human resource development strategies that will channel their youth towards education and training in natural resource management, wood science and processing, and various technologies, i.e. biotechnology. The forest sector emerging will require a combination of science and business expertise, and for Aboriginal communities, their utilization of traditional knowledge will enable innovation and diversification in a truly unique manner.

Note: This article provides a scan of options to diversify. Terms used and references made can be internet searched to obtain greater elaboration.
Forest Diversification at the Community Level

The downturn in the traditional forest products industries i.e. commodity production: lumber, pulp and paper, has meant that many First Nation communities must look beyond timber harvesting, if they are to derive economic benefit from the forests that surround their communities.

Business initiatives described briefly below, indicate that First Nation communities are broadening their approaches to forest-based development.

Non-Timber Forest Products: Awazibi Pure Maple Syrup, owned by the Kitigan Zibi Anishinabeg First Nation in Quebec is a 17,000 tap state-of-the-art maple syrup processing facility.

Inter-Nation Partnerships: A value-added partnership project; Two Feathers Forest Products between three First Nations: Pikangikum, Eagle Lake and Wabigoon, in collaboration with the Wood Tech Group, A Finnish forestry technology firm, will see green energy and lumber being used for assembling pre-manufactured chalets destined for Asian and European markets. The project will provide a manufacturing base and create 129 direct jobs.

Logs from the Whitefeather Forest at Pikangikum will be shipped to a sawmilling and kiln drying plant in Red Lake. The site will have log sorting and wood chipper stations, along with a 9.9 megawatt biomass co-generation plant supplying power for the operation and the Ontario grid. Sawn lumber will be trucked 200 kilometers south to the community of Eagle Lake First Nation, near Dryden, where it will be made into building components for pre-fabricated cottages for export.

The Eagle Lake plant will contain a wood planer, re-saw and assembly lines, storage for raw and finished products, and also a wood pellet plant. The Wabigoon Lake First Nation, with established businesses in logging and trucking, will be the administrative headquarters. Construction is scheduled to begin in 2011.

Export: Coast Tsimshian Resources LP, owned by the Lax Kw’alaams First Nation and located 35 kilometers north of Prince Rupert, B.C., is the largest First Nation owned logging company in B.C. As part of an overall plan to grow the enterprise, the company is focusing on new opportunities in China, beginning with the export of lower-grade hemlock logs, and opening a trade office in Beijing.

Forest Carbon Management: The Carrier Sekani Tribal Council in central B.C. is proposing a forest carbon sequestration project on an 80,000 square kilometer land base within the traditional territories of its members. In its preliminary stages, the project will allow the communities to restore and manage the forests while generating financial returns in the form of carbon offset credits. Similarly, the Wolf Lake First Nation in Quebec is developing a Comprehensive Community Forest Carbon Development Plan focused on “avoided deforestation”, a technical application which will address the need for “additionality”, on lands which the Wolf Lake First Nation wishes to have protected.

Value-Added Processing: Niska North at Chapleau, Ontario, one of the largest cedar manufacturers in Eastern Canada is majority owned by local First Nation investors, including company president, Wade Cachagee, the former Chief of Chapleau Cree. The company produces high quality cedar and white pine lumber and will make log houses, flooring, decking and other products. Niska North won a Request for Proposal competition in 2007 held by the Ontario government to acquire 60,000 m$^3$ of eastern white cedar. Other wood supply is acquired from Sustainable Forest License holders across the eastern part of the province. The mill is up and running on the site of a former Domtar mill.

Forest Management Services: The Unama’ki Institute of Natural Resources, on behalf of the five First Nations of Cape Breton Island (Easkasoni, Membertou, Potatek, Wagmatcook and Waycobah), represents the Mi’kmaq voice regarding natural resources and their sustainability. Through agreements with government and industry, the Unama’ki Institute of Natural Resources provides forest planning, harvesting, silviculture, wildlife management and other related services.