

Contents

Feature Article

1. Ontario's Green Energy Act moves Ontario to the forefront of the green economy

Industry News

2. \$435 Billion+ in global green stimulus packages is great news for environmental sector investors
3. It's all about batteries
4. Supply glut should reduce prices for clean energy

Investeco News

5. EnerWorks taps the sun for solar cooling
6. Biorem opens office in China
7. Rowe Farms opens Roncesvalles store
8. Economic recovery will require more infrastructure, less bank bailouts
9. Fund III to benefit from new \$250 million Ontario Emerging Technologies Fund

1. Ontario's Green Energy Act moves Ontario to the forefront of the green economy

Ontario has announced far-reaching legislation to develop renewable energy and conservation in the province. The Green Energy and Green Economy Act, released in February, would position Ontario as a leading jurisdiction for renewable energy worldwide, and create up to 50,000 jobs. Central to the Act is North America's first major "feed in tariff" (FIT)—modeled primarily on similar programs that have been in place in several European countries such as Germany and Denmark. The FIT is a standardized rate to be paid by the Ontario Power Authority for various sources of renewable energy.

The chart to the right lists the proposed rates for the FIT. These rates will be subject to public consultation until May 5, 2009, and may be established by summer 2009. Of particular interest are the proposed rates for solar, which go as high as 80.2 cents per kWh and would be the highest in the world. In addition, wind power rates are noticeably higher than under the previous "Standard Offer Contract". These rates appear to be a statement by the McGuinty government of its intention to create a leading clean energy industry in Ontario.

Some other details of the Green Energy Act and FIT are still undetermined. For example, it is not yet known wheth-

er the government will retain the carbon credits purchased from renewable energy projects as they do under the existing standard offer program. Also unknown is to what extent

PROPOSED FEED-IN TARIFF PRICES

Technology	Proposed cents per kWh
Biomass*	12.2
Biogas*	10.4 - 14.7
Waterpower*	12.9 - 13.4
Landfill Gas	10.3 - 11.1
Solar PV	44.3 - 80.2
Wind	13.5 - 19

*On/off peak pricing applies

domestic content will be required for producers selling into the program.

In addition to the FIT, the Act will spur green energy sectors in several other ways. It will remove the cap on the size of projects eligible for renewable energy rates; it will grant 'a right to connect' (to the grid) for renewable energy projects, it will streamline environmental approvals, and it will create a new "Renewable

Energy Facilitation Office” within the Ministry of Energy and Infrastructure to help renewable energy proponents in their applications.

The Act also promises to foster a “conservation culture” in Ontario. To this end, public sector buildings will be required to meet certain energy efficiency standards, property owners will be required to conduct an energy audit prior to selling their homes, and there will be strict energy efficiency

and labeling standards for appliances. The precise details of these proposals are not yet determined.

Overall, the Act and the FIT are extremely ambitious in scope and have the potential to provide very significant regulatory stimulus to the development of the renewable energy and energy efficiency sectors in Ontario. It seems to show that Ontario is positioned to become a leading jurisdiction worldwide in the development of clean energy.

Industry News

2. \$435 Billion+ in global green stimulus packages is great news for environmental sector investors

As fans of the Chinese language are fond of saying, the Chinese characters for “crisis” and “opportunity” are one and the same. Just so, the current financial crisis is also an opportunity. It has given governments the opportunity to consolidate support for “green stimulus” packages that should facilitate the restoration and modernization of the world’s aging infrastructure. Thankfully, many of the world’s major governments appear to be seizing this opportunity.

Already Announced Global Green Stimulus Proposals

Region/Country	Total \$US Stimulus (approx)	\$US Dollars of Green Stimulus (approx)
United States	\$972 Billion	\$112.3 Billion
Canada	\$31.8 Billion	\$2.6 Billion
European Union	\$325.5 Billion	\$54.2 Billion
South Korea	\$38 Billion	\$30.7 Billion
Japan	\$485.9 Billion	\$12.4 Billion
China	\$586 Billion	\$221.3 Billion
Other	\$356.8 Billion	\$2.8 Billion
TOTALS	\$2,796 Billion	\$436.3 Billion

Source: HSBC. Green Stimulus figures are approximate and generally include investments and incentives related to clean energy, water management, low carbon transport, and/or environmental protection.

Globally, the ‘green’ portion of these stimulus packages already totals more than US\$435 billion (see chart), and more may be added. In major economies such as the US, China, South Korea, the EU and Canada, the biggest investments are planned for energy efficiency, the “smart grid”,

and water infrastructure. Large investments are also planned for renewable energy and low-carbon transportation. This is great news for environmental investors as it should accelerate the already rapid growth in these sectors.

Of particular interest to Investeco is the US stimulus package that includes US\$112.3 billion dollars of environmentally related investments and tax cuts. For example, US\$11 billion will go towards the development of the smart grid, including the funding of pilot projects and construction; US\$15.4 billion will go towards renovation and repairs to make homes and government buildings more energy efficient; US\$8 billion will go towards loans for the building of renewable power generation capacity; and US\$9.5 billion in loans will go towards upgrading drinking water delivery and treatment infrastructure.

Asian countries have also pledged enormous green investments. China is spending US\$221 billion, much of it for building a clean modern public transportation system and for environmental protection. And Japan plans to create one million new “green collar” jobs by 2015.

Europe’s investments are also significant. The European Commission, Germany, the UK, France, Spain and other EU countries have collectively pledged about US\$54 billion in green investments, including approximately \$17 billion for energy efficiency and nearly \$19 billion for the development of the next generation of green automobiles.

For Canada's part, the 2009 Federal Budget pledged about US\$2.6 Billion to go towards, among other things, carbon capture and sequestration (CCS) technology and retrofitting homes and other buildings to make them more energy efficient.

These worldwide stimulus packages represent a major step in the development of a clean economy that is resource and energy efficient. To the extent the world's governments follow through effectively with their plans, they will have seized a great opportunity presented by the financial crisis.

3. It's all about batteries

The global auto industry is betting heavily on a transition to electrified vehicles (EVs) but success will depend on some significant battery technology breakthroughs.

For almost a century the energy efficiency advantage of an electric over an internal combustion engine has been widely appreciated. Internal combustion engines have an energy efficiency limitation of about 20% efficiency while electric engines are often in the 90% range. Electric engines themselves cause no real GHG emissions and have fewer parts so they tend to be much more reliable. The problem with EVs has always been the limitations of their batteries.

Theoretically if you could replace the engine of a car with an electric engine and plug it into a socket at 10 cents per

sources; they need to store energy for the journey.

There are many ways to store energy in a car other than in combustible fuel; hydrogen, compressed gas, flywheels, capacitors to name a few but batteries are the only practical solution today. And the best battery technology for EVs is the lithium ion (Li-ion) class.

“battery technology hurdles will ultimately determine when EVs go mainstream.”

Li-ion batteries are significantly better than the nickel metal hydride batteries currently being used in today's hybrid cars. They have high energy characteristics, are 50% lighter, have 25% longer life, and are about 81% efficient through their charge. Consequently, the major car companies cannot get their hands on the new Li-ion battery technology fast enough. In the past year several R&D and supply agreements have been struck between auto giants and technology leaders like Sanyo, Panasonic, Johnson Controls and Chinese battery company BYD.

But even the newest Li-ion batteries still have significant weight-to-storage ratios (energy density) limitations and the costs are still too high to replace gasoline outright.

If one were to retrofit the current Honda Civic, for example, with an electric motor, it would need 14.2 kWh of storage to go even 100km. The required battery would cost about \$7,000 and weigh 140 kg. To replace the energy stored in a pickup truck's gas tank like the Ford F150, would require a battery costing over \$70,000 and weighing



Better Place Israel CEO Moshe Kaplinsky demonstrates an EV charging station

kWh, the car could go 100 km for about \$2.00. At \$1 per litre the same car running on gas at 30 miles per gallon, would use approximately \$8.00 of gas. So at today's prices, EVs would operate at a quarter the cost of internal combustion engines. But cars on the move cannot be tethered to fixed electron

in at 4,000 kg – even though the total payload capacity of the truck is only 1,360 kg!

There are other hurdles that need to be overcome too: the high energy density makes Li-ion susceptible to fire, charge times are still in the 6-8 hours range at standard household voltage levels, and cold weather can cause power loss of up to 40%. Global lithium metal supplies are limited. And finally, our electricity grid is not ready to charge fleets of electric cars. The wiring inside houses is not beefy enough for high voltage charges, and utilities are not prepared yet for the demand fluctuations caused by the plug in.

Indeed, a whole new type of “re-fueling” infrastructure is necessary to recharge cars and/or replace batteries away

from home. Companies like California-based Better Place have plans to build this infrastructure. They have entered into agreements with Israel, Australia, Denmark, California and recently Ontario. Details of capital sources, auto manufacturing standards, and government commitments are not fully established but are crucial before the EV roll-out can happen.

Considering the challenges, it was not surprising that Toyota, arguably the leading electric car company, recently had to push out their 2010 “plug in” Prius launch for a few years. Investeco believes EVs are coming, but battery technology hurdles will ultimately determine when EVs go mainstream.

4. Temporary supply glut should reduce prices for clean energy

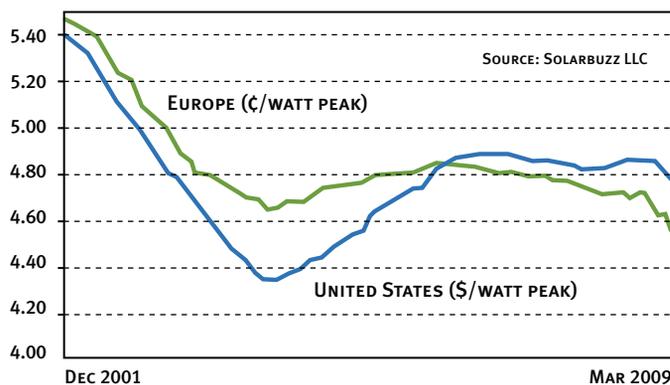
A phenomenon is taking hold in some of the clean energy sectors. It goes like this: in the past few years, the great profit margins enjoyed by some upstream suppliers in the wind and solar industries attracted a lot of new supply. But now, exacerbated by the current financial crises, certain upstream suppliers are faced with evaporating demand and evaporating order backlogs. The result is that these suppliers are no longer able to command the prices necessary to maintain their margins. This is bad news for these suppliers, but great news for consumers and installers who should reap the benefit of the lower prices. This is not to say that there are not still some very significant growth opportunities available for suppliers, but for now, some of these suppliers will have to make due with slimmer margins.

The phenomenon is most obvious in the polysilicon-based solar module sector. A shortage of supply lifted polysilicon prices to as high as \$450/kg in 2008. The resulting high margins attracted a major expansion of supply. However, supply now outstrips demand, and, as a result, polysilicon prices are forecasted to drop to between \$40 and \$60 per kg. MEMC, a leading supplier of raw polysilicone and wafers for making solar cells, reported operating margins of 43% in 2008 but forecasts they will drop to below 20% in 2009. The reduced prices charged by upstream suppliers has quickly resulted in lower prices for solar modules in the past few months, as can be seen

on the far right side of the graph below.

As each of the clean energy sectors such as solar and wind matures, this phenomenon of shrinking upstream margins is likely to duplicate itself. It already appears to be happening in wind. Wind turbine supply increased dramatically in 2008, but now there is not enough demand to sustain supplier margins. For example, Vestas, a major European turbine manufacturer, expects a drop in its operating margins from over 15% in 2008

Solar Module Retail Price Index (125 watts and higher)



to as low as 11% in 2009. These decreased margins should soon result in lower prices for wind turbines.

For more on this topic please see the article “Temporary Supply Glut...” in the news section of the Investeco website.

Investeco News

5. EnerWorks taps the sun for solar cooling

Dorchester-based EnerWorks, the North American leader in solar thermal technology, was instrumental in building the largest solar heating and cooling installation in the world, which came on line in January. The installation is located in North Carolina, and uses EnerWorks solar thermal panels. Although solar thermal water heating, EnerWorks core business, is a large and rapidly growing market opportunity in North America, the prospect of solar cooling opens up an even larger prospective market for the company. Last month EnerWorks closed a \$5 million private placement, providing the resources it needs to meet this accelerated growth going

forward. Investeco Private Equity Fund II, L.P. is the third largest equity investor in EnerWorks, and Alex Chamberlain of Investeco sits on the EnerWorks board.



The world's largest solar thermal plant

6. Biorem opens office in China

Biorem recently announced it had opened a sales office in Beijing, China. "The office will enable better liaisons with Biorem's growing representative and supplier networks in China, and enable the company to sell more of its biological air pollution control systems", said CEO Peter Bruijns. China has been slow to adopt wastewater treatment technologies, but this is changing. Biorem currently has five projects under construc-

tion in China and estimates there will be over 400 projects in the next two years that they can compete for. This is in addition to the outstanding sales growth the company had in North America last year.



Biorem's new Chinese sales team

7. Rowe Farms opens Roncesvalles store

Rowe Farms continued its retail expansion by opening its fourth retail outlet in December of 2008. Roncesvalles looks and feels a lot like the busy Leslieville store opened just a year ago. Sales have exceeded expectations and the store was profitable in its first month. "It looks like we've found the right retail model. The product offering, footprint, employee mix and type of location is proving to be a great model to help expand," said CEO Jamie Cooney. Rowe has a significant wholesale business, offering its products through national retail chains and it also uses select company-owned retail locations to build brand awareness for its locally sourced, natural foods.



The new store at 105 Roncesvalles Ave, Toronto

8. Economic recovery will require more infrastructure, less bank bailouts



On January 2nd 2008, Investeco launched the Global Environmental Sectors Fund, a mutual fund trust that invests in publicly listed stocks in the environmental sectors. Greg Payne (left) is the fund's portfolio manager.

We focus our skills on finding great businesses and investing in them at the best possible prices, but even the best companies are affected by macro economics. It is time to comment on the consensus fix for the global economy. Too much focus has been on rescuing banks by adding more debt to the taxpayer's balance sheet. Rather than more credit, we need more savings and more investment.

It is only by renewing, and making more efficient, our basic infrastructure that we will in fact recover. This is where much of the world's savings will need to go and we're positioning ourselves in front of this wave. Over fifty percent of the hold-

ings in the Global Environmental Sectors Fund have exposure to infrastructure spending in areas such as the electricity grid (Siemens, ABB, Schneider Electric, Telvent), public transportation (Ansaldo, Wabtec), and water (Veolia, Layne Christensen, Lindsay Manufacturing).

These companies will benefit in the short term from public infrastructure spending programs (see page 2), but they will benefit even more when global capital shifts its focus from bank bailouts to more productive assets.

The fund has had a high correlation to global markets over the past year, but it is starting to separate from the index and outperform. Considering the attractive valuations, the growth prospects for our sectors, and the extreme challenges facing other parts of the economy, it's a good time for accredited investors to buy this fund as a core holding.

9. Fund III to benefit from new \$250 million Ontario Emerging Technologies Fund

For more information on Investeco's funds please contact us at info@investeco.com

DISCLAIMER: This newsletter does not constitute investment advice or an offer for the sale of the funds discussed herein. Each of Investeco's funds is sold solely pursuant to its offering or private placement memorandum. Further essential information about each fund is contained in the relevant memorandum. Accredited investors can obtain these memoranda and other information by contacting info@investeco.com. It is recommended that you obtain independent professional investment advice before making any investments. Although the sources referred to herein are believed to be accurate no guarantee can be provided as to their accuracy. INVESTECO is a trademark of Investeco Capital Corp. (ICC), which is used at times under license by Investeco Financial Corp. (IFC). When used herein the term INVESTECO refers to ICC and/or IFC as applicable.