The New Green Business Model

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As we enter year three of the greatest commodity bull market of all time, higher and sustained energy prices are pushing clean technologies and other green investment opportunities into the foreground. While perhaps not meeting some traditional investment metrics, this emerging sector is nonetheless now beginning to attract institutional and other investors. Much of this interest is of course due to the impact of high energy prices, but an equally compelling market driver is the acceptance that environmental responsibility is a rising global issue for both corporations and governments.

It is at the nexus of energy and environment where this is most pronounced since energy is the most capital intensive industry in the world – as well as the world's biggest polluter. However, the energy industry will also be the world's biggest solution provider. Witness the traction today of hybrid vehicles as well as the rapid movement to commercialisation of gasification technologies for coal and other fossil fuels due to rising emissions prices.

The capital markets are always looking for investment opportunities. Here we have one that not only holds the prospect of being a good investment but it also has a 'feel good' dimension for investors. The creation of green financial products is a likely outcome of the recent convergence of the capital markets and the environment. We expect to see not only green hedge funds investing in market caps on stock exchanges but also carbon and renewable energy trading, project finance where they can trade the credits, green exchange traded funds (ETFs) and indexes, and eventually green Master Limited Partnerships (MLPs).

Why Now?

It's been over 36 years since the first Clean Air Act in the US, and environmental remediation is now a global phenomena. Developed countries can no longer export their pollution to the developing world. In fact, under the Kyoto Treaty, there are certain investment mechanisms to pay for clean technology projects by the developed world in the developing world through the Clean Development Mechanism, Joint Implementation and Emissions Trading Schemes.

Also, today, environmental and social issues count. The investor has moved beyond socially responsible investing (SRI) and is driving more disclosure by companies on their climate change risk as well as their overall 'greenness'. We are starting to see environmental score cards emerge as well on both GHG risks and clean technology exposure. Being 'green' is now good for business and its something that more and more shareholders expect and seek out to the point where it has now emerged as a board level issue.

Demonstrating true environmental stewardship is a good business strategy for corporations to pursue, especially when there is both consumer demand and money to be made. We are rapidly reaching the tipping point at which the combination of pressures from stakeholders, increasing environmental regulation, and the emergence of new business and financial opportunities flips old corporate attitudes on the environment. In fact, it is the rising cost of fossil fuels that may prove to be the final ingredient in the mix. Indeed, we have observed this phenomenon gaining traction over the last several months with leading companies such as Wal-Mart, Goldman Sachs and others going 'green'. This is not a fad or simply good PR: The savvy executives at these firms have recognised that this is simply good business.

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The Opportunity

Our view – agreed with by most other experts and commentators – is that much of the increase in energy commodity prices and price volatility has occurred as a result of a 20 year lack of investment in energy and energy related infrastructure. Energy prices reflect supply/demand tightness in global and regional markets, not just in terms of absolute supply capabilities, but also in the inability to transport that supply to market. The evidence for this assertion can be observed in rising freight rates and in the sudden interest in LNG for example. This aging and demand-constrained infrastructure is now presenting investors with the opportunity to provide capital to energy, environmental, agricultural, and water projects. The question to ask is, why not take this opportunity to replace it with more environmentally benign technology?

In fact, we see multiple ways to play this investment theme. Venture capital funds are seeking to invest in green projects and technologies, though with more conservative lock down periods for investors (some up to 10 years), and many of these have been receiving fourth and fifth round funding. There is now also a growing new universe of green hedge funds seeking opportunities in both renewables and emissions trading as well as in projects. In fact, the difference between the green hedge funds and venture or equity funds is now beginning to blur as hedge funds lengthen lock up periods to invest in such projects. Hedge funds in general are diversifying into non-traditional plays including project finance and, in the clean technology space for example, we increasingly observe that hedge funds are providing the seed capital to entrepreneurs seeking to commercialise these technologies.

Of course, there are also straight equity investment opportunities in green power projects using wind, solar or biomass. We also see emerging carbon finance funds that have the 'right' emissions credits as it appears that the world may be short 4 billion tonnes of carbon dioxide reductions for the first compliance period under the Kyoto Treaty (2008-2012). There are now upstream oil and gas plays to use carbon dioxide injection for enhanced oil recovery, and sequester the carbon. These carbon capture techniques are now under consideration for inclusion under Kyoto. There are forestry plays to do the same thing. Capturing the carbon is now the name of the game.

Investment opportunities, particularly in the nexus of energy with environment, abound from hybrid engine technologies to alternative energy projects. Interestingly, many of these projects are located outside of Western Europe and North America in countries like India and other Asian countries and in Eastern Europe. The truth is that any new energy project now involves significantly greater environmental constraints. New tankers to transport crude oil now have to be multi-hulled vessels; new field development plans often have to include facility removal and remediation plans and costs; new power generation facilities are required to manage and account for emissions and other pollutants. Environmental issues add both cost and complexity to the next round of energy infrastructure investment. On the other hand, these costs and complexities are an opportunity for a growing number of environmental service companies while driving new and cleaner technologies, business processes and approaches.

The emergence of cap and trade markets for carbon dioxide and the more than a decade old existence of successful cap and trade markets for nitrous oxide, sulphur dioxide and trioxide in the US provide another opportunity to profit. By investing in technologies that reduce these emissions, credits may be traded profitably in relatively liquid markets. And, as we observed above, capturing carbon is an opportunity driven by this new profit opportunity.

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Ultimately, we believe that energy cannot be separated from the environment. Each new energy project will be scrutinised for alternative, more environmentally benign alternatives and its incremental environmental business opportunities. Whether it be a new oilfield development with its associated carbon sequestration opportunity or a new power plant, there are not just growing pressures to re-examine the project for its environmental aspects but increasing profit opportunities too. It is the increasing financialization of the environment that will drive this trend as opposed to simple nostalgia for a cleaner planet.

Where Are We Going?

As year three of higher energy prices and cries of peak oil excite more and more interest in the energy sector as an investment opportunity, we believe that something has fundamentally changed, not only in energy markets with its lack of mean price reversion, but also in the environmental space. We think that environment is now positioned as the next disruptive factor in energy markets and it will have an impact on the entire energy value chain including upstream, midstream, refining, and downstream energy markets. We are not just looking at emissions trading but the entire energy value chain. This heightened awareness of the environmental impact of any energy or agricultural project will also create more investment opportunities for disruptive technologies that are more energy efficient and more environmentally benign. The high price regime of today has unleashed the dragon and precipitated the tipping point in these markets. It is a whirlwind of the unexpected where no models and templates of the past will work.

As a result, we expect to see more and more investment opportunities and vehicles through which to make those investments in the nexus of energy and environment emerge. There will be more green hedge funds, equity funds and venture funds as well as more investable financial products targeting the mainstream and alternative investors. Eventually, energy may become synonymous with environment as any energy project will be scrutinised for its contribution to environmental stewardship. For investors, this is the next big opportunity ■

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The writers are also the authors of the book *Energy and Environmental Hedge Funds - The Next Investment Paradigm,* published by Wiley, 2006