

# GREENHOUSE GAS MARKET 2007

**BUILDING UPON A SOLID FOUNDATION:  
THE EMERGENCE OF A GLOBAL EMISSIONS TRADING SYSTEM**



The EU ETS enters Phase II  
Rapid movement in the US, regionally and federally  
Australia and New Zealand are on their way  
CDM is here; JI makes strides

## 36

## The VER Market: What Trades and Why

Jason Patrick, *Evolution Markets Inc.*

According to a recent report by Ecosystem Marketplace and New Carbon Finance, trade volume in Verified Emissions Reductions (VERs) was up 200% from 2005 to 2006, and 2007 growth already exceeds that. We are seeing an abundance of project types, leading some to think that virtually any project can produce a verifiable carbon offset. However, what actually trades is generally limited to only a handful of project types. Though this is a voluntary market, these trades are often influenced by regulations in existing and developing compliance markets. Another important factor is the development of standards – guiding project type, quantification, verification, etc. – in the VER market. These developing standards affect what trades today but may be more similar than many realize.

Which projects create a real emissions reduction credit? In principle, a VER reflects any activity that can verifiably be shown to lower greenhouse gas emissions (GHGs) below a baseline. However, the project types that actually trade are considerably less diverse. Despite the wide array of proposals in the market, developers and suppliers of VERs should ultimately be driven by demand. What trades in the market is largely what buyers are most comfortable with. To date VERs have been mostly defined by the project methodologies of the Kyoto Protocol's Clean Development Mechanism (CDM), since it is the CDM that has been the incubator for GHG reduction projects. Thus, while speculative projects founded on sequestration or public transit improvements or manufacturing efficiencies abound, what makes up the bulk of VER transactions are project types with approved CDM methodologies such as methane capture or renewable energy generation.

The exception to this rule is VERs from renewable energy projects in developed countries. To date, GHG credits from such projects rarely trade. The reasons for this are 1) the quantification challenges of determining indirect emissions reductions among regions with differing power generation mixes; 2) the determination of title over such emissions reductions, and 3) the additionality of renewables which, in the developed world, already receive considerable financial incentives. While quantification and title have been, in our view, sufficiently well addressed under the CDM, the essential issue is one of additionality.

Additionality is critical to maintaining confidence in the quality of greenhouse gas emissions reduction credits. In our opinion, there is no reason why renewables projects inside developed countries that meet an appropriate and robust standard of additionality – basically one in which carbon finance is a necessary part of project implementation – should not generate VERs. Increasing support for appropriate renewable generation projects in developed countries is, by any measure, an essential part of the ultimate goal of carbon markets; that is, decreasing the long-term concentration of greenhouse gases.

Despite the exaggerated critique of the voluntary carbon market as lawless, this market is in fact neither without safeguards nor unaffected by government policy and regulation. First, any quality VER transaction is contingent on independent third-party verification, clear assertion of title and singularity, as well as other common contractual safeguards. VER buyers should only pay for tonnes verified in this way. Further, as stated above, most of the VER project types that actually trade are those that have survived similar review as CDM projects. Indeed one of the most popular VER products is a pre-registration CDM emissions reduction credit.

An entire sector of VER demand is based on buying credits that are now voluntary, but might reasonably be expected to be accepted in compliance regimes in the future. This is how the deliberations of bodies as diverse as the UNFCCC, the RGGI Staff Working Group and the California Air Resources Board have had real effects on the voluntary market. However, influence may not be just a one-way street. In fact, it may be through the growing sophistication of “speculative” project types in the voluntary market and the demonstration of their real, verifiable and quantifiable environmental benefits that confidence will grow in such projects. This in turn may allow them to be considered as part of future compliance regimes.

One interesting example of the influence of voluntary regimes and emerging mandatory schemes is the California Climate Action Registry (CCAR), a quasi-governmental group established to help firms in California (and beyond) measure and monitor their emissions. CCAR has also led innovation in the voluntary credit market by publishing project protocols for project types that rarely trade, such

as forestry and transportation. As a result, we have seen a number of CCAR-compliant VERs trade.

There is considerable confusion over the value of VERs. As a product that is currently fragmented and illiquid to an extreme, there is no single price for a VER. Besides fundamental supply-demand – and the vast spread between wholesale and retail prices – the price of a VER is a function of project type, location, vintage and adherence to one or more of the standards that have been developed for the market. Understanding the interplay between these variables goes a long way to bridging the gap between \$1 forestry VERs and \$15 forward Gold Standard international wind energy VERs. Just as there is no singular carbon market, the voluntary market is in fact best conceived as a collection of markets for similar but distinct products.

### Developing and Refining Standards

Few discussions of the voluntary carbon market today lack mention of the need for standards regulating project acceptance, quantification, monitoring, verification, etc. As was already mentioned, savvy buyers and sellers of verified emissions reductions have done well without such new standards. Indeed, greenhouse gas accounting and reporting protocols developed by the Environmental Resources Trust, the International Standards Organization, the World Business Council for Sustainable Development and the World Resources Institute, and others, have guided projects for several years before the recent call for new standards.

Nonetheless, the growing market demands further refinement. Today we are aware of at least fifteen independent efforts to govern one or more aspects of VERs, perhaps creating more confusion than clarity in the market. But again fortunately much of this confusion is easily settled. First, most of the efforts build on existing and well-understood documentation on the quantification of GHG emissions. Some “standards”, such as the Voluntary Offset Standard, are more accurately understood as purchasing guidelines for ECIS/ICIS members. Many voluntary standards simply apply CDM guidelines. Other efforts, such as those of the Center for Resource Solutions are really quantification guidelines and certification services for other, more fully-developed standards.

While there is sure to be a shakeout in the “market” for VER standards, this work is not necessarily competitive. The Voluntary Carbon Standard, developed mainly by the International Emissions Trading Association and The Climate Group, is becoming increasingly accepted as the most prominent standard broadly governing voluntary credit

quality. This should provide a baseline of sorts for the market. The Gold Standard, developed by an NGO of the same name, assures not just the basic quality of a voluntary credit, but also adherence to a range of social and environmental goals – it is a “gourmet” product. Rather than being mutually exclusive, these two prominent standards are in our view complementary, providing different products for the market, at clearly distinct prices. Finally, it is important to point out that there is also demand in the voluntary market for a single well-run registry to track verified emissions reductions. In the U.S., CCAR has led a successful effort to establish such a registry.

It is understandable that a certain degree of confusion surrounds the market for voluntary greenhouse gas emissions reductions today. This is an emerging market in a complex and illiquid product defined by science, law and economics. But in our view much of this confusion is unnecessary. Skilled buyers and sellers who are able to see through the noise in this market today can be rewarded with more valuable opportunities than in the more established compliance carbon markets.

**Evolution Markets Inc.** provides strategic financial and efficient transactional services to participants in global environmental markets and the clean energy sector. Formed in 2000, the company leverages its unrivaled experience and knowledge on behalf of participants in the global carbon, U.S. emissions, renewable energy, weather derivative, and over the counter (OTC) coal, natural gas, nuclear fuel, and biofuels markets. Evolution Markets personnel are pioneers in energy and environmental markets having facilitated the first trades in Kyoto carbon credits, European emissions allowances, SO<sub>2</sub> allowances, NO<sub>x</sub> allowances, ERCs in several states, weather derivatives, and OTC natural gas and coal trades. Based in White Plains, NY, Evolution Markets serves clients on five continents from offices in New York, San Francisco, London, and Calgary. [www.evomarkets.com](http://www.evomarkets.com)

Evolution Markets was voted “Best Broker: GHG North America” by the readers of *Environmental Finance* in 2006, and the global carbon team was named “2007 House of the Year: European Emissions” by *Energy Risk* magazine.

Jason Patrick is Vice President with Evolution Markets Inc.’s Carbon Markets Group. Mr. Patrick facilitates trades in global greenhouse gas credits and provides advisory services for Evolution Markets’ global network of clients from the company’s White Plains headquarters.