

New York Sees Higher Power In Lower Sulfur

Silicon Valley has taught the business world many lessons, one of which is, “If you don’t eat your children, someone else will.” Although the imagery may be unsettling, the principle is sound: Any firm that allows itself to remain wedded to and protective of a successful and thriving business opens itself up competitive challenges from newcomers who have everything to gain and nothing to lose.

The futures industry, while highly dynamic, is susceptible to this curse of success. A thriving futures market becomes integrated into the fabric of its associated cash market; not only is it used for price discovery and risk management, it becomes the basis for an ecosystem of swap and differential markets. Those markets often require a long chain of futures contracts whose specifications must remain fixed.

A chicken-and-egg problem develops. If the underlying cash market changes, the existing open interest on long-dated futures contracts by definition reflects the older specifications. As those contracts represent property rights, they cannot be extinguished by the exchange and as they are more liquid, they present formidable competition for newer contracts based on different specifications.

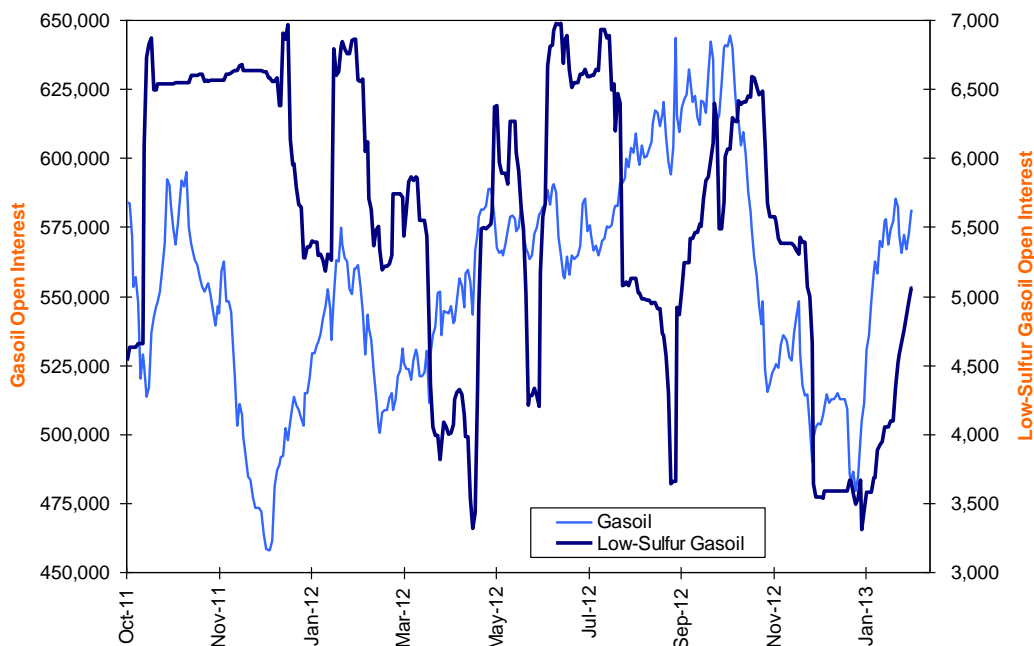
One example of this occurred in the early 1990s with the introduction of crude oil futures based on high-sulfur or “sour” crude oil. Trading remained centered on the low-sulfur West Texas Intermediate contract and its surrounding ecosystem of differentials and sweet-sour spreads. The WTI contract eventually faced its stiffest competition two decades later from another sweet crude oil futures contract, Brent, when rising North American production of crude oil led to a dislocation between WTI at Cushing, Oklahoma, and waterborne crude oil markets.

Ultra Low-Sulfur Diesel

Another example of an existing contract blocking a new contract when the cash market shifts has been occurring with gasoil. The New York Mercantile Exchange (NYMEX) announced in 2011 it would delist its venerable heating oil futures contract, introduced in 1978 and the first successful energy futures contract traded in the U.S., with the expiration of the April 2013 contract and replace it with a contract based on ultra-low sulfur diesel fuel. This simultaneously solved the problem created by the side-by-side trading of a longstanding successful contract and a new contract and satisfied the cruel Silicon Valley maxim noted above.

An alternative approach was tried by the Intercontinental Exchange (ICE) in September 2011 with the introduction of a 10 parts per million or 0.001% low-sulfur gasoil contract. The results were predictable. After more than fifteen months of trading, the aggregate open interest for the original, 0.1%, gasoil contract is 115 times that of the low-sulfur contract.

Comparable Open Interest



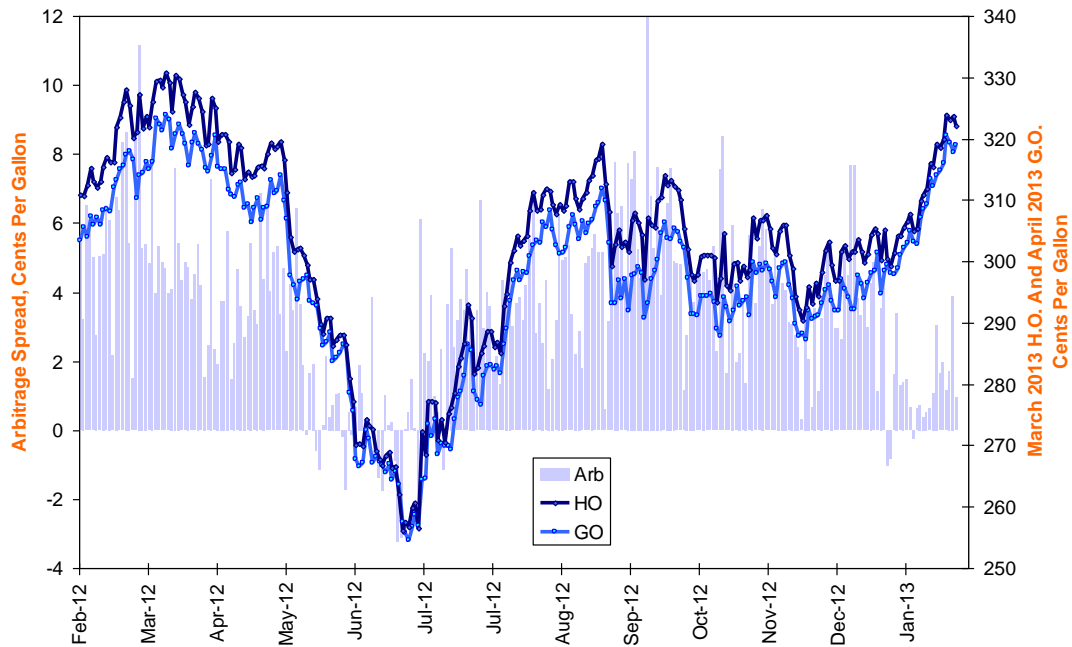
As the original gasoil contract will continue trading through the expiration of the January 2015 contract and as many refineries in the Amsterdam-Rotterdam-Antwerp (ARA) market are phasing production of 0.1% sulfur gasoil out, the next two years of trading could be marked by a mismatch between declining physical supply and the existing but diminishing open interest in 0.1% sulfur gasoil futures.

A New York Marker

The door is open, therefore, for the NYMEX ultra low-sulfur diesel futures contract to become the price discovery, risk management and pricing basis for the North Atlantic distillate fuels market starting with the May 2013 contract. This long-distance arbitrage is hardly far-fetched; the North American natural gas industry's more distant hubs have used the Henry Hub, Louisiana, contract as a market cornerstone for years, the WTI contract was used as a marker for crude oils of both similar and different grades trading outside of the U.S. mid-continent region and Brent is used as a marker grade for crude oils produced in a swath between Russia and West Africa. Markets can and do gravitate to trading against a futures contract via a system of swaps and contracts for differences.

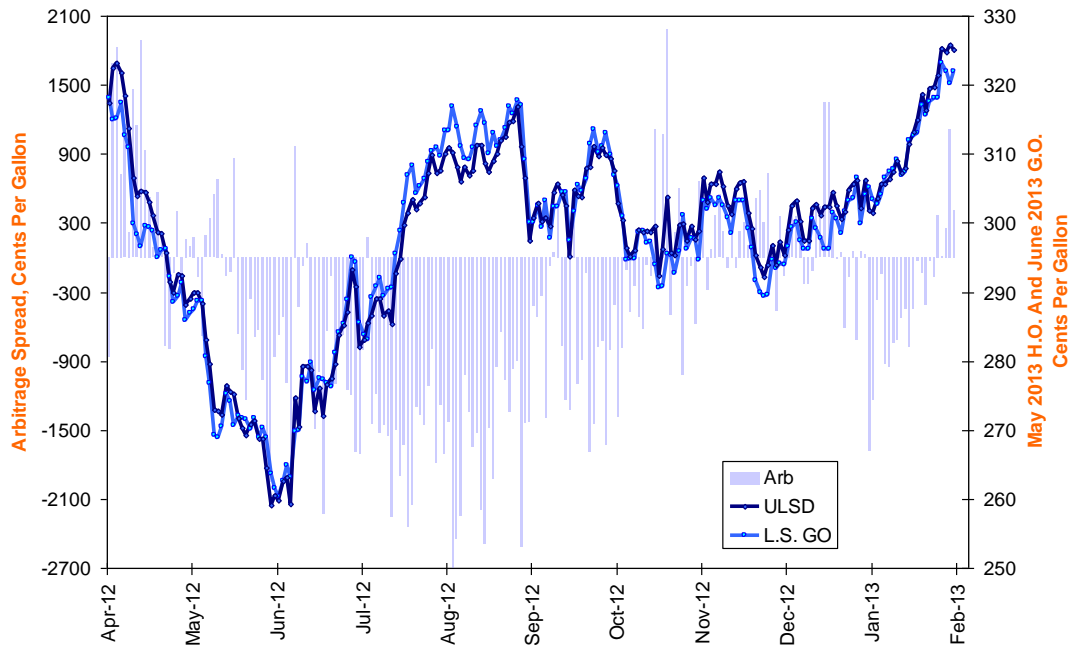
The process can be seen with two of the existing contracts, March 2013 NYMEX heating oil and April 2013 ICE gasoil. The two markets gross arbitrage spread before transportation costs leans toward the direction of New York to ARA transit.

More Expensive ARA Gasoil Links NYH Heating Oil To European Market



That relationship will disappear as the underlying cash market changes and as the NYMEX contract becomes ultra low-sulfur diesel fuel. A comparable gross arbitrage between the May 2013 ULSD contract and the thinly traded ICE June 2013 low-sulfur gasoil contract shows a complete and unsurprising lack of stability. Once the market moves toward ULSD futures-based pricing, a narrower and more stable relationship will develop.

Ultra-Low Sulfur Futures Contracts Not Yet Closely Linked



Note On Refining Margins

The still-evolving nature of the ultra low-sulfur diesel fuel market in the ARA region and the illiquidity of the 0.001% sulfur gasoil futures contract make a detailed hedge efficiency study unreliable at the moment. However, it is worth noting while the ICE 0.1% sulfur May 2013 gasoil futures remain a slightly superior hedge instrument for 0.1% gasoil than are the May 2013 NYMEX ULSD futures, the opposite is true for a comparison between May 2013

0.001% gasoil futures and May 2013 ULSD futures. This suggests the cash market for gasoil, diesel fuel, jet kerosene and other distillates can and will gravitate toward the NYMEX ULSD futures. If so, ULSD futures will become the preferred instrument for trading crack spreads in the ARA region. Once refining margins are priced and hedged with ULSD futures, the entire ecosystem of North Atlantic basis swaps and grade differentials will move to ULSD pricing.