Knowing when to step back from the market

By Cynthia Kase

All traders would like to make money without risking too much.

Unfortunately, the level of risk in trading a given market at a given time is dictated by the market, not by personal preference. Traders can still assess market risk and adjust their style to fit their appetite for risk.

Many traders set stops at levels based on what they can afford. To make sense, stops must be set outside the level of market "noise," which is proportional to volatility.

The most common estimate of volatility, close-to-close volatility, is not the only method of evaluation. The "average true range" is a much clearer and simpler way for futures traders to get a feel for volatility.

The true range is considered the greater of today's high and low, high and previous day's close or low and previous day's close. The average true range (ATR) is the average of those ranges over "x" number of periods.

Assume anything less than about 2 to 2.5 times the ATR of the market is noise. Thus, if you are trading a market, you must be able to sit through reversals of that level, on the average.

If trading the nearby crude oil futures contract daily the last few years, you should have been used to an ATR of 45¢, plus or minus 15¢, by Aug. 3, when Iraq invaded Kuwait. That means to take advantage of a trending market in crude — and sit through the noise — you must have been able to afford reversals of 90¢ to $1.25 per barrel, on the average.

This was the case during the downtrend in the first half of 1990.

Wild whipsaws

After the invasion, the ATR of the first nearby crude contract roughly quadrupled (see graph below). This means reversals of $4 to $5 occurred without breaching the overall trend.

The volatility-risk approach is a good one for determining market risk. Start by calculating the ATR using the time bars you normally trade. Time frame "x" should be roughly equal to twice the maximum number of periods used in any indicators. The reason: Indicator periods are usually half a market's cycle length. Using double that number yields an ATR covering a full cycle. If you use a 30-period moving average, use about 60 for the ATR.

If the risk level you find is too high, modify your trading style either of two ways. First, you can trade the second nearby rather than the nearby contract. When February crude oil was the first nearby, its ATR was $2.40 per barrel. At the same time, the March crude oil ATR ran $1.60.

Second, you can lower your time frame. If you trade short-term technicals, you might use three-minute rather than 15-minute bars. If you position trade, you might trade 160-minute bars instead of daily.

If the level of risk over the smallest time frame you want to trade is more than you can bear, make vacation plans and stay out of the market. If you cannot stand overnight gap reversals, you need to day-trade, closing out positions at the end of every day, or stand aside.

In the converse situation, with little or no trend, there are just as many

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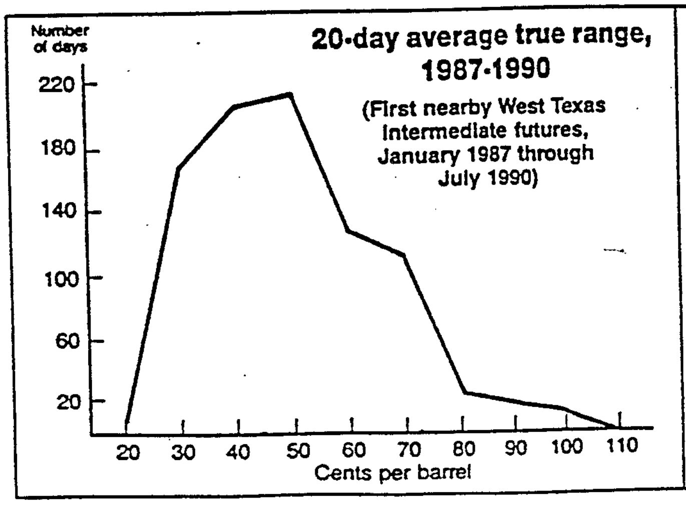

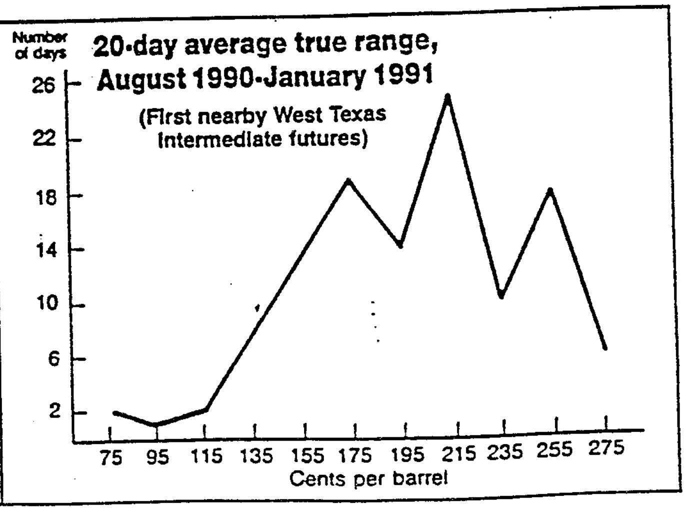

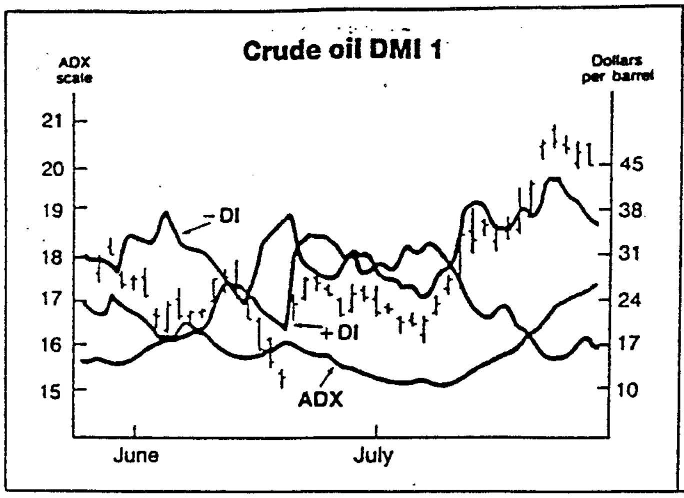

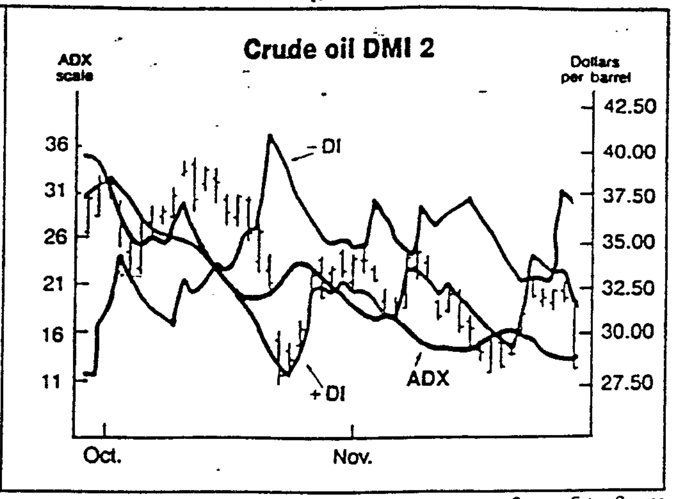

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reasons to stay out of the market. When the ATR is too low, market moves aren't enough to pay for overhead. You can assume a minimum of 5¢ per barrel ($50 per contract) or twice the bid/offer, determined by the average price distance between ticks, as the acceptable minimum.

Based on tick data, the tick value in crude is usually just over 1¢. During the Persian Gulf crisis it was about 6¢. Thus, the ATR must be at least 5¢ to bother with this market.

It's nice to know when the markets are coming back to life again. The Average Directional Movement Index (ADX) can help. Another time traders can feel free to leave the office is when the ADX line — measuring the propensity for the market to trend — is below both the +DI and −DI lines and has a negative slope.

The ADX, coupled with the Directional Movement Index (DMI), are to a trader as x-rays are to a physician. The combination can be very revealing but takes a trained eye to read. Yet, using it only to identify flat or choppy markets is not very difficult.

If your charting service does not offer DMI or tell how to calculate it, refer to J. Welles Wilder's book, *New Concepts in Technical Trading*.

The DMI consists of three lines. The +DI represents the propensity for the market to trade upward, the −DI line just the opposite and the ADX line the propensity for the market to trend. Generally, the +DI crossing over the −DI offers a buy signal. The opposite situation suggests selling. If the slope of the ADX line is negative and is below both the DI lines, it is either a flat or very choppy, sideways market.

A flat market is characterized by the DI lines weaving around each other and creating a "necklace" effect (see first DMI graph on crude oil). The prominent direction before the ADX line dipped below both DI lines was up, so you would have been long going into the flat market.

Those who held no position would stay out of the market as long as the ADX was headed down. The trader would maintain the long position as long as the ADX was falling. If the ADX line suddenly rose while the −DI line was on top, he would be more watchful of his position.

On June 23, the ADX turned up. At this point, a trader could have put on a simple reversal stop on the long position at about 2.5 times the average true range of the market — roughly $1.66 below the maximum profit level. (The position continued to accrue profits while rolling from June to July to August contracts.) On about July 21, the stop would be hit, telling you to reverse the position.

ADX and DMI are to a trader as x-rays are to a physician. Revealing, they require a trained eye.

Those trading as low as one-minute or three-minute bars can use the same procedure to know when it is safe to get a cup of coffee or catch up on paperwork.

On the flip side, a market often will tell a trader when to leave it alone. Such a market is characterized by DI lines weaving around each other in longer envelopes and with one DI line predominantly above the other.

The recent bear market in crude oil (second DMI chart) illustrates this. A valid sell signal would have put you short the market at about $36.50 around Oct. 18. The ADX lines fell below both DI lines at the end of the month and, with the exception of a couple days, has been below them since the crisis.

This has been a hybrid market, both oscillating and trending. Thus, normal reversals will keep getting stopped out and traders will be continually whipsawed: As soon as you exit, the market reverses back into the predominant trend. This sort of market requires you to step back and give it wider room to chop around.

The trader who already is in a position — dictated by which DI line is on top — and who can afford to increase stops by 75% to 100% should let the position stand until an opposing signal comes along or until the stop is hit. Otherwise, the trader must switch to a shorter time frame to find shorter-term trends or take a break from trading altogether.

For those who would choose to stay in, they would set the reversal stops to *double* the normal value for the life of the trade. Since the ATR of the down trend was about $2, you could reasonably expect reversals of $8 to $10 without a complete reversal of the downtrend. In fact, this was the case.

This risk assessment method, combining volatility and propensity to trend, seems to work for all time frames. For intraday traders who start each morning with no position, the rules tell them when to relax and take a break instead of trading. For short-term traders who can afford to increase risk, however, the rules can show when to lengthen their time frame and find better trends. ❑

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