TSR TRADING GUIDES

HOW TO TRADE WITH VOLUME

GALEN WOODS

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Galen Woods

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About TSR Trading Guides

The articles in this series of trading guides were first published on Trading Setups Review, where they are available for free reading.

In this series of guides, we have organized selected articles into common trading topics with an exclusive introduction from Galen Woods. The objective is to present a better learning experience for serious readers.

You can find out more about Galen Woods by clicking here.

1. Introduction

In the technical analysis of financial markets, there are three important dimensions: price, volume, and time.

Time-based price charts, like the 5-minute bar chart, are common. As a result, most analysis takes into account price and time, but volume is left out. Moreover, for the uninitiated, volume signals adds complication without value.

For these reasons, volume is often neglected, despite its potential value to price analysis.

In this book, I try to present volume trading in an accessible manner. I've included basic concepts from Volume Spread Analysis (VSA), and volume indicators that are more intuitive.

Most of the volume trading methods revolve around extremes. Looking at volume is not always easy or useful. However, when volume is exceptionally low or high, it usually pays to take a closer look.

High volume represents that big players are participating. The key is to find out what they are up to. Are they covering their short positions? Or are they selling rapidly to push the market further down?

Low volume is a sign that the market is reluctant to participate. Why? Are they missing something big that is brewing at the moment? Or are they waiting for a critical break?

To read volume effectively, ground your perspective with extremes.

A final note of caution. As volume analysis seems elusive, it offers an opportunity for some vendors to claim that it is the Holy Grail.

Volume-based trading systems and indicators are often sold as black boxes.

Beware! Volume is nothing more than just another trading tool.

2. Anchor Zones Trading Strategy

L. A. Little wrote two excellent books on trend trading. In his books, he explained a key timing concept called anchor zones, which is a very useful tool for price action traders.

In our review, we will find anchor zones and design a trading strategy around them. However, bear in mind that anchor zones are just a part of L. A. Little's trading framework. To apply anchor zones in L. A. Little's trend framework. you must refer to his books.

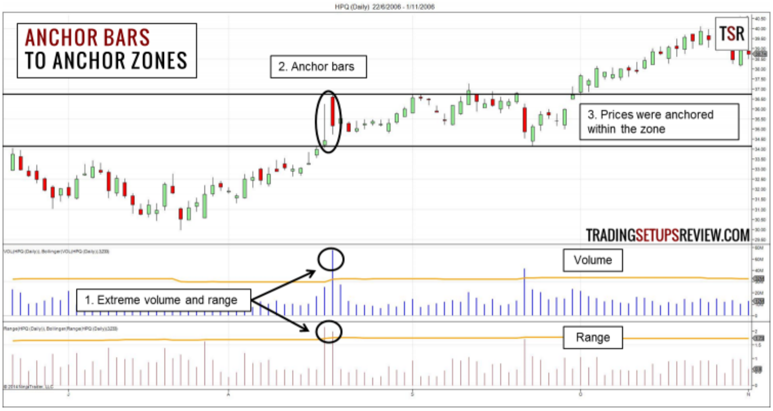
- Trend Trading Set-Ups: Entering and Exiting Trends for Maximum Profit (Wiley Trading)
- Trend Qualification and Trading: Techniques To Identify the Best Trends to Trade (Wiley Trading)

2.1 Anchor Zones

To mark out anchor zones, we must first find anchor bars. Anchor bars have one or more of the following signs of extreme price activity:

- Wide range
- Gaps
- High volume

Once you find the anchors bars, you can draw the anchor zones by marking the limits of the bars. The chart below shows how to do it.



The steps are simple.

1. Find bars with extreme volume, range, or gaps.
2. These are the anchors bars.
3. Draw zones along the limits of the anchor bars and expect price to stay within the zone.

For the examples below, we marked out the anchor zones using the same method.

2.2 Trading Rules - Anchor Zones

Long Trading Setup

1. A bullish reversal bar that tests the support anchor zone
2. Buy on break of high of reversal bar

Short Trading Setup

1. A bearish reversal bar that tests the resistance anchor zone
2. Sell on break of low of reversal bar

2.3 Anchor Zones Trading Examples

Winning Trade - Bullish Trade

The examples in L. A. Little's books are mostly from the stock market and in the daily time-frame. However, in this trade, we used the anchor zones method on a 20-minute chart of the 6J futures on CME.

1. The extreme range and volume highlighted the anchors bars which guided us to mark out the support and resistance zones.
2. The bullish reversal bar that poked slightly below the anchor support zone is our trading signal. We placed a buy stop order on its high. Prices rose and stopped just short of the resistance zone, giving us a enough room for profit.
3. This anchor zone was very successful in containing the price movement. The red and green circles highlight other potential anchor zone trades.

Losing Trade - Bullish Trade

This is a daily chart of EBAY. It shows anchor zones that provided some support and resistance but did not lead to a profitable trade.

1. Taking our cue from the volume and range plots, we marked out the anchor zones.
2. Prices fell quickly to the support zone. It held up with a bullish outside bar and inside bar. However, neither bullish patterns had follow-through.
3. Finally, a bullish reversal bar formed on the support zone, and we bought as price broke above it. However, the trade failed swiftly as price fell through the anchor zone to test an earlier swing low.

2.4 Review - Anchor Zones Trading Strategy

Price action often exhaust themselves with climatic moves. Anchors bars include gaps, wide range, and high volume. These are also signs of climatic moves. Hence, anchor bars are exhaustive moves.

Marking out support and resistance zones with anchor bars is a superb trading method. It integrates price and volume to find key price ranges that work well to contain prices.

This concept of anchoring prices with exhaustive moves also work in day trading. The high and/or low of the each trading session is often formed within the first trading hour. The first hour of the trading day usually has wide range and high volume. Hence, it serves as an anchor for the rest of the trading session. Morning reversal trades and opening range break-out trades work on the same premise.

Our trading rules focus on reversal bars as entry signals for simplicity. In fact, you can look out for any candlestick pattern to time the trade.

More experienced traders can even enter with limit orders slightly beyond the anchor zones. Using limit orders will result in minimal adverse price movement in successful trades. The stop-loss is tight and the reward to risk ratio is excellent. However, you must have ironclad discipline to exit without hesitation.

Read: Trading Ranges with Gimmee Bars

If you find this anchor zone concept effective, you should see how it works with L. A. Little's trading framework in his highly reviewed books.

3. Reliable Support and Resistance Zones with High Volume Signals

Price never moves in a straight line. Price action bounces up and down between support and resistance levels. In fact, when skilled price action traders analyse a chart, they are just looking for support and resistance zones.

We look at major support and resistance for market bias. We also make use of minor support and resistance for timing purposes.

Support and resistance is a key price action trading concept. Hence, it is not surprising to find a myriad of techniques for projecting support and resistance.

Traders seem to buy in areas of support and sell in areas of resistance. But they do not react to support and resistance because of magic. They do because they are interested in those price levels.

The best way to gauge market interest is by observing volume. When a price zone gets the interest of the market, the market trades. Volume surges.

Hence, by paying attention to volume clues, we can find reliable support and resistance areas. The easiest way to find volume-based support and resistance is to focus on climatic volume signals. While they do not occur often, you cannot miss them when they do.

What are climatic volume signals? How high is high?

Here, I will use the volume benchmark that I applied to find Anchor Bars in the previous chapter.

The benchmark is the upper Bollinger Band with a look-back setting of 233 and a displacement of 3 standard deviations. If a price bar shows volume higher than this benchmark, we will zoom in and analyse it as a potential support or resistance area.

First, find a high volume price bar, Then, mark its high and low prices. The area between is the potential support or resistance area.

Let's take a look at the two examples below.

3.1 High Volume Support/Resistance - SPY ETF

The top panel shows the daily price bars of SPY. The lower panel shows the volume of each day. The orange line is the Bollinger Band benchmark as described above. Look out for instances when the volume rises above the orange line.

1. These two consecutive high volume bars caught our attention.
2. Using the highest and lowest traded price of these two days, we drew a price zone.

3. As the market rose, the price zone became a potential support zone.
4. At the end of the first deep pullback down, the price zone offered perfect support to halt the market descent.

This is a textbook example. Buying when the market dipped into the support zone was a great trade with almost no adverse movement.

The next example will show that price action around a support zone is not always as neat.

3.2 High Volume Support/Resistance - LEN

This chart shows the daily price bars of Lennar Corporation (LEN on NYSE).

1. We spotted this clear surge in volume.
2. Using the high and low of the high volume bar, we marked out a potential support/resistance zone.

3. After rising above the price zone, the market tested the support zone for five times before leaving it alone. The fourth test was the strongest and shook most weak bulls out of their positions.

The tests of the support zone were of varying strengths. Such market movement made it difficult to make use of the support zone for trade entries. Thus, blindly buying a bounce off the support zone was not ideal. It was essential to use more specific trading setups to define our risk and reward.

3.3 Trading with High Volume Support and Resistance Zones

When trading with any form of support/resistance, always look out for support/resistance zones that have failed.

Generally, if the market falls sharply through a support area, it becomes invalid as a support. (You can still observe it for flip trades as the support switches into a potential resistance zone.) The same logic applies for a market rising through a resistance area with clear momentum.

A tip for day traders: fine tune your support and resistance levels with range bars instead of time-based charts. Range bars with high volume are effective intraday support and resistance levels.

High volume price zones are potential support and resistance areas. Potential is the key word here. They do not always work. Hence, you must not trade them blindly.

While looking out for high volume price zones is great for mapping the market structure, it is not a complete trading method. You should always use other trading methods to time your entry.

4. The Low Volume Hint to Explosive Moves

Stocks with high volume get all the attention. Volume means participation. It means action. It is no wonder that traders like high-volume stocks and neglect the low-volume ones. But this approach misses the potential of low-volume stocks to find explosive moves.

By low-volume stocks, I am not referring to thinly traded penny stocks. A prudent trader should ignore such stocks. Instead, focus on liquid stocks showing unusually low volume. (For e.g. a constituent of the S&P 500 index)

While the market is always right, its participants are mostly wrong.

Most traders enter as a trend ends, explaining why trends end with climatic volume. On the other hand, few traders manage to get in before a trend starts. Thus, low volume may hint at the beginning of a trend.

To find low-volume days, I look for days with the lowest volume in the past 233 trading days. For those familiar with the NR7 pattern, this is like the NV233 pattern. Instead of the narrowest bar range in the past 7 bars, I look for the lowest volume in the past 233 days.

In the charts below, the NV233 trading days have a yellow background.

4.1 Low-Volume Chart Examples

1. Low-Volume Days Preceding Explosive Moves

This chart shows the daily prices of Regions Financial Corporation (RF).

1. The two low-volume days showed a sustained lack of interest in RF. Soon after, it shot upwards with increasing volume.
2. This is a recent low-volume day. It preceded a price plunge with great timing.

2. Low-Volume Days As Reversal Signals

This chart shows the daily prices of Yahoo! Inc (YHOO) starting with a healthy bull trend.

However, the low-volume day at the high of the bull trend was not expected. It was clear that the market's interest in the bull trend was dwindling. Prices started falling a week later.

3. Low-Volume Days Caught in a Range

Low-volume trading days are not always great for market timing. This example, also from YHOO, is messier.

1. Multiple low-volume days hinted at explosive moves. Yet, the market whipsawed within a price range, foiling any directional trade.
2. Eventually, the market broke out into a bullish trend.

Although low-volume days precede explosive moves, the low volume/volatility can last for an indefinite period. Hence, it is tough to take advantage of it.

4.2 Trading Suggestions for Low-Volume Days

As you can see from the examples, low-volume days are not the perfect timing tool. Like all other trading signals, they work within the right context, at times.

When you expect low-volume signals to work, use these ways to profit from them.

Technical Break-Out Trade

Low volume tends to coincide with low price volatility. Hence, a break-out trade setup like the Bollinger Squeeze is ideal.

Position yourself with stop orders to enter as the market volatility picks up.

Straddle Options Strategy

It is often challenging to guess the break-out direction. What we are more certain of is an increase in volatility. In such cases, the straddle trading strategy is useful.

A call option is profitable if the break-out is bullish. A put option is profitable when the market breaks downwards. A straddle includes buying both calls and puts with limited risk. Hence, it is positioned to profit from a break-out in any direction. In this sense, it is a direction-neutral strategy.

However, if the break-out is not significant, a straddle strategy suffers on both fronts. Learn more about the straddle strategy here.

Fundamental Trade Trigger

Many fundamental traders combine their analysis with technical triggers. If you already have a directional bias for a stock, use a low-volume day as your trigger.

A low-volume day can get you in before other traders. As the market pans out according to your analysis, you stand to gain from the early entry.

4.3 Don't Neglect Low Volume

The main lesson is to pay attention to the quiet guys.

When a stock shows exceptionally low volume, it means something. If you can decipher what it means, it becomes a unique weapon in your trading toolbox.

(In case you are wondering, there is nothing magical about the look-back period of 233. I chose the number 233 from the Fibonacci series as a convenient random number. You just need a large parameter to find significant low-volume days.)

5. Capture High Profits with Low Volume Pullback Trading Strategy

Dow Theory relies on volume as a secondary indicator to confirm price action. Nonetheless, interpreting market volume has developed into a whole branch of technical analysis (volume spread analysis) and spurred many traders to create volume indicators. In this review, we will focus on trading low volume pullbacks in trends.

Like everything else in trading, absolute values are useless. Rather than “low”, we actually mean “lower”. We look at changes in volume.

When volume increases, traders are interested. When volume decreases, traders are not keen. The market does not move when traders are not interested. **So, the idea is to fade low volume moves**.

5.1 Trading Rules - Low Volume Pullback

Long Trading Setup

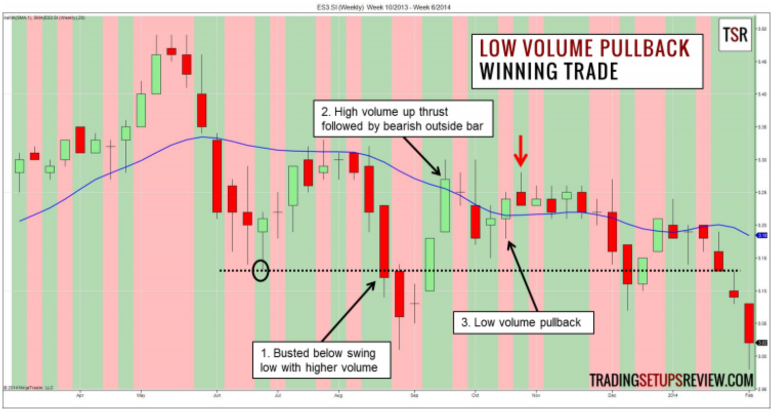
1. Price is above the 20-period simple moving average (SMA)
2. Price breaks above the last swing high with higher volume
3. Price falls with lower volume
4. Buy a tick above the next bullish bar

Short Trading Setup

1. Price is below the 20-period SMA
2. Price breaks below the last swing low with higher volume
3. Price rises with lower volume
4. Sell a tick below the next bearish bar

5.2 Low Volume Pullback Trading Examples

Winning Trade - Short Setup



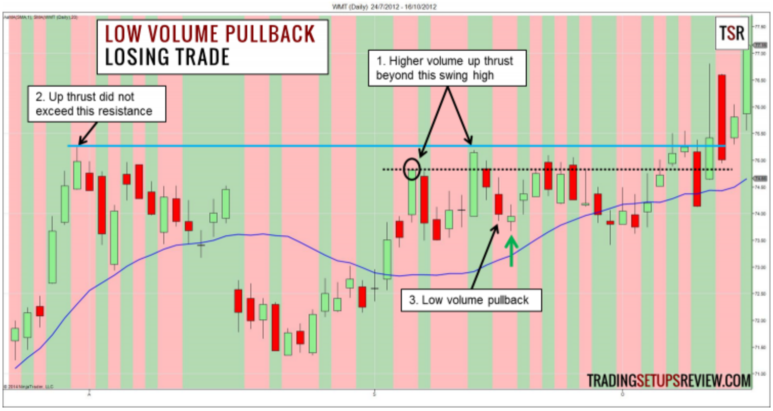
This is a weekly chart of SPDR Straits Times Index ETF (ES3.SI on SGX). It seeks to replicate the performance of the STI which is the main gauge of Singapore's equity markets.

Volume overlays are great trading tools. They allow you to keep tabs on volume while you look at price action. They mitigate the risk of ignoring price action and focusing only on volume. In this case, green means higher volume than the previous bar, and red means lower volume.

1. After moving up to test the SMA, price plunged down below the earlier swing low with higher volume (as shown by the green background). It confirmed that bearish momentum was still in place.
2. As prices pulled back up, it seemed as though we would not have a low volume trading setup. The pullback bars rose up sharply with higher volume. However, the bearish outside bar halted the up thrust and signaled the return of the bears.
3. Two bars later, we got an up bar with lower volume. It verified the lack of market interest in pushing prices higher. The next bar was a solid bearish reversal bar. We sold a tick below its low.

It took 15 weeks, but this trade proved profitable as the ETF fell to its earlier extreme low.

Losing Trade - Long Setup



This is a daily chart of Walmart.

1. Shortly after price moved above the SMA, it made a new high with higher volume.

2. However, if we extended our perspective, we would have noticed that price failed to rise above a key resistance that sent prices down below the SMA earlier. This failure made the picture less rosy.
3. We had a low volume pullback followed by a bullish reversal bar. We entered a tick above the reversal bar.

The trade's maximum profit potential is larger than the amount we risked. However, the trend did not resume until it moved below our signal bar to test our stop-loss level.

5.3 Review - Low Volume Pullback Trading Strategy

We used basic volume trading principles directly to create this simple low volume pullback trading strategy.

We looked for increasing volume during break-outs to confirm the market momentum. Then, we took advantage of low volume pullbacks to time when we enter the momentum.

(Like the idea of using volume to confirm trend break-outs? Check out the Yum Yum continuation pattern.)

This trading strategy is extremely useful for clarifying price action. When you can't tell what price is trying to do, volume might shed some light.

Paying attention to low volume pullbacks also improves other retracement trading strategies. Combine this low volume approach with the following setups.

- The Holy Grail
- Two-Legged Pullbacks
- 9/30 Trading Setup

6. Low Volume Pullback Strategy (Expanded)

Technically, a healthy trend should advance with increasing market interest. When a trend retraces temporarily, the market interest falters.

The question is how do we gauge market interest?

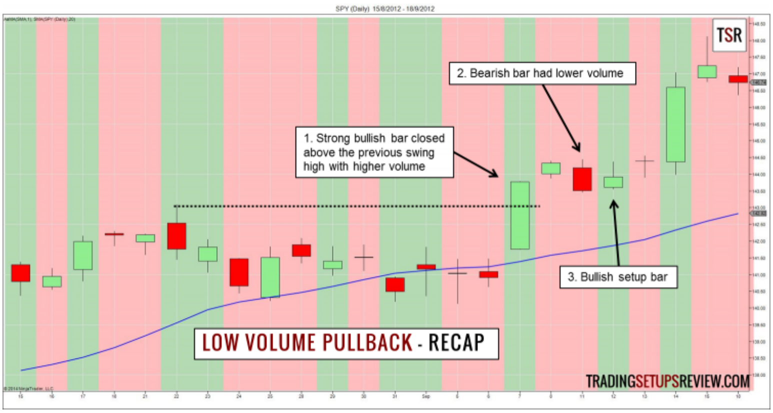
The best information we have to assess market interest is volume. High volume indicates strong market interest; low volume shows weak participation.

This idea forms the basis of the Low Volume Pullback Strategy we discussed in the previous chapter.

6.1 Recap - Low Volume Pullback Trading Setup

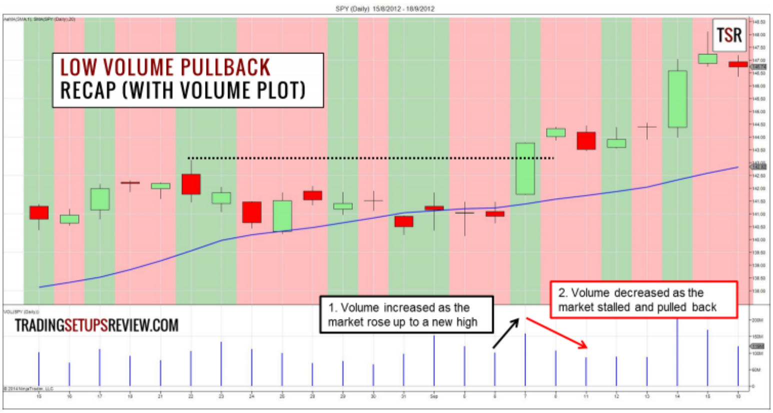
In all the charts that follow, if a bar has green background, its volume is higher than that of the preceding bar. If a bar has red background, its volume is lower than that of the preceding bar.

Let's recap our basic formula for this strategy before expanding on it. (For simplicity, we will stick to the context of a bull trend.)



1. We want to see market interest (volume) at new trend highs. Increased volume at a new swing high confirms a healthy bull trend.
2. We want to see a lack of market interest as the market falls. Trend reversal needs renewed market interest in the opposing direction. When such interest is not forthcoming, the price drop is more likely to be a pullback than a trend reversal.
3. With a solid volume context working for the bulls, any bullish bar is a decent setup bar.

To make sure that we are crystal clear on how to interpret the background green and red colors, I have reproduced the chart above with its volume plot.



6.2 Expand - Low Volume Pullback Trading Setup

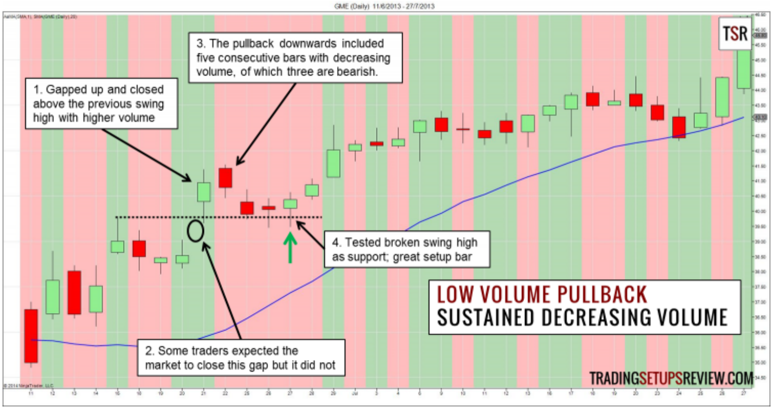
In this sequel, I will focus on three examples. My aim is to show how the best Low Volume Pullback trades look like, and how to avoid trends that are poised to reverse.

The first two examples show high-quality pullback trades with the following characteristics:

- Sustained lower volume (volume decreasing over two to three bars)
- Lower volume bars show counter-trend tendencies. (For e.g. higher bar high in a down trend or bearish bar in an up trend)
- Volume dries up as the market approaches a support/resistance level

Example 1 - Gap Testing with Low Volume

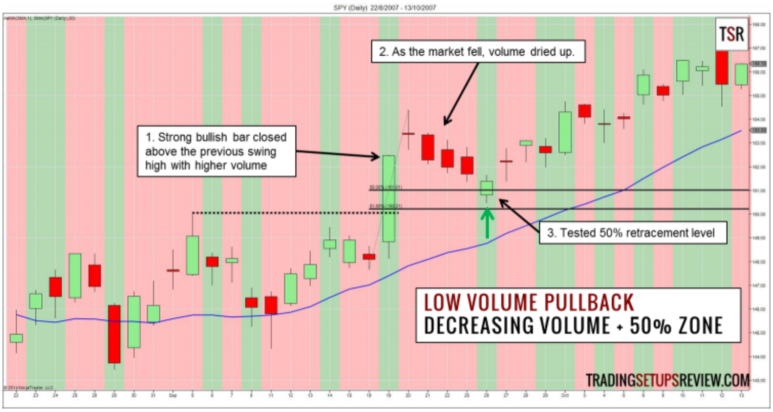
The chart below shows the daily bars of GameStop Corp. (GME)



1. This bar gapped and closed above the last swing high with higher volume (green background). It was a sign of a healthy bull trend.
2. Some traders expected the market to close this gap. The fact that it did not was another bullish sign.
3. The pullback showed sustained lower volume over five consecutive bars (red background) . In particular, the three bearish bars that started the pullback did not seem to generate much interest from the market.
4. Hence, this bullish bar offers a low volume pullback setup. As it was also bouncing off a support level formed by the broken swing high, it was a great setup. (Learn more about the flipping of support and resistance.)

This example shows how observing volume in isolation is not enough for finding top quality trades. We need to combine basic price action analysis to confirm them.

Example 2 - 50% Pullback with Low Volume



This chart shows the S&P 500 ETF (SPY) in its daily time-frame.

1. This strong bullish bar rose above the last extreme high of the trend without resistance. This set the stage for a long pullback trade.
2. This neat bear swing found less and less market interest as it descended.
3. Higher volume returned only with a bullish reversal bar at the 50% retracement level based on the last bull swing. The context implied a great long trade.

(The zone between the 50% and the 61.8% retracement levels is my favourite Fibonacci retracement zone.)

Example 3 - Climatic Moves Reverses (And Do Not Confirm) Trend

We used higher volume at new trend extremes as a sign of a healthy trend. But there is an important exception.

It is when the volume is unusually high. Climatic price action and volume is a sign of trend exhaustion and might lead to reversal. Hence, under such circumstances, we should not look for pullback trades.

Let's take a look at an example. The chart below shows the daily chart of Staples Inc. (SPLS)

1. This bar closed at a new low with higher volume. The next bar continued to fall with increasing volume.
2. However, as the market continued its free fall, it was clear that volume has reached climatic levels. (I use the Bollinger Bands (233,3) of the volume plot to help find climatic volume. It is the same tool I applied to find Anchor Bars.)
3. The plunge was likely to be exhaustive. Thus, despite this nice upswing with weakening volume, we did not look for short setups.

The scary plunge was also a bullish Anti-Climax pattern. It is a pattern covered in my "Day Trading with Price Action" course.

6.3 Combine Low Volume Pullbacks with Support & Resistance

While low volume on pullback offers windows of opportunity, the best trades do not rely solely on volume analysis. Both the price action of the lower volume bars and the support/resistance around them are also critical.

To find Low Volume Pullback trades, swing traders can scan for stocks with decreasing volume over the past three days. Then, assess the support and resistance surrounding the price action before taking on a position.

I formulated this strategy based on the Dow Theory's tenet that volume should confirm the trend. And it represents just one way to make use of volume in our trading.

If you want to learn everything you can on volume analysis, Anna Coulling's book is the best starting point.

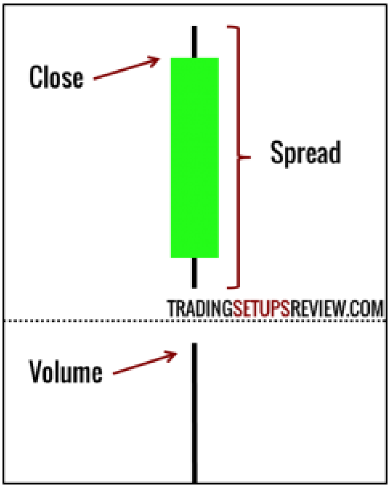
7. Your First Guide to Volume Spread Analysis (VSA)

You have heard of Volume Spread Analysis and the value it might add to your analysis. But it sounds like a convoluted trading method with uncommon terms like "No Demand Bar" and "Stopping Volume". Is VSA really that inaccessible?

Together, let's take the first step to understanding VSA. With this guide, you will find that VSA is an intuitive method after all.

7.1 What is Volume Spread Analysis (VSA)?

VSA is the study of the relationship between volume and price to predict market direction.



Volume Spread Analysis (VSA) Breakdown

In particular, it pays attention to:

- Volume
- Range/Spread (Difference between high and close)
- Closing Price Relative to Range (Is the closing price near the top or the bottom of the price bar?)

7.2 Who invented VSA?

There are three big names in VSA's development.

- Jesse Livermore
- Richard Wyckoff
- Tom Williams

Jesse Livermore spoke of a theory based on market manipulation. He also worked his theory in his legendary trading career. However, he did not pass down concrete trading methods. His legacy is that of a trader and not an educator.

Richard Wyckoff was much more interested in education. To find methods that work in the markets, he interviewed top traders including Jesse Livermore. Wyckoff proposed the idea of a "Composite Trader" that embodies the entire market. He used the "Composite Trader" to explain the market phases of accumulation, markup, distribution, and markdown.

Neither Jesse Livermore nor Richard Wyckoff used the term "Volume Spread Analysis". It was Tom Williams who used the term to describe the methods he built based on the Richard Wyckoff's ideas. Tom Williams' books and software has helped to propel the concepts of VSA among traders.

7.3 Why does VSA work?

The basic idea is that the public can only make money from the markets if we understand what the professional traders are doing. And professional traders are not small players. They play big.

Hence, they leave their footprints in volume data. When the professionals are active, the market shows high trading volume. Conversely, when the market volume is low, the professionals might be holding their horses.

It follows that in order to get a sense of what the big guys are up to, looking at just price action is not enough. We need to look at price together with volume.

7.4 Does VSA work in all markets?

VSA focuses on price and volume and seeks to find the actions of professional traders. Hence, as long as a market has a group of professionals and offers reliable price and volume data, the trading premise of VSA holds.

Almost all financial markets (stocks, futures, forex) seem to fit the bill.

However, in the spot forex market, volume is a tricky concept. You will not get actual traded volume. You get tick volume which measures the times the price ticks up or down. If you intend to use VSA methods for trading spot forex, you need to decide if your source of tick volume is a reliable proxy for actual volume. (Need help deciding? The ForexFactory forum has a discussion on trading forex with VSA.)

7.5 How do we use VSA to trade?

I will not sugar-coat the fact that VSA is difficult to master. This is because traders have interpreted various VSA concepts differently. To trade well with VSA requires years of practice and market observation. (Consider how much time Jesse Livermore, Richard Wyckoff, and Tom Williams spent studying the markets.)

Nonetheless, we can still improve our trading with basic VSA concepts that are easy to understand. Hence, in this first guide, we will look at two simple VSA concepts.

1. No Demand
2. No Selling Pressure

VSA Basic Concepts

(The following definitions are based on Tom Williams' book on VSA - Master the Markets.)

1. No Demand on Up Bar

If the market rises with contracting spread and volume, the market is not showing demand. Without demand, it is not likely to continue rising.

To find "No Demand" bars:

1. Price closed higher than the previous bar.
2. Volume is lower than past two bars.
3. Spreads (Range) are narrow.

2. No Selling Pressure on Down Bar

If the market falls with decreasing spread and volume, the market is not interested in selling. Thus, it is not likely that the market will continue to fall.

To find "No Selling Pressure" bars:

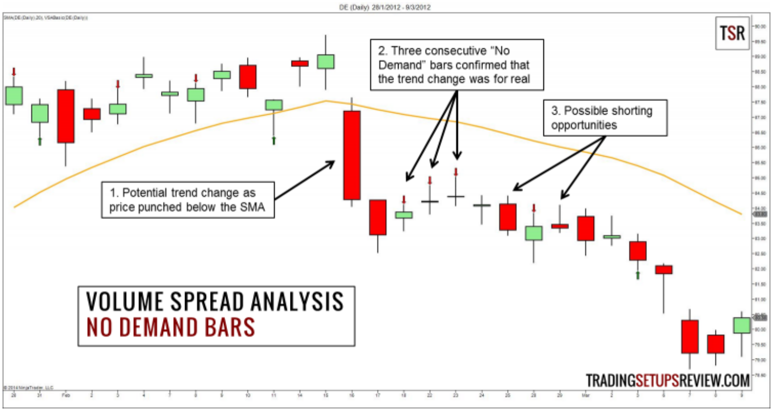
1. Price closed lower than the previous bar.
2. Volume is lower than past two bars.
3. Spreads (Range) are narrow.

VSA Trading Examples

In the two examples below, we will use a 20-period simple moving average as our trend indicator. Our aim is to use the concepts of "No Demand" and "No Selling Pressure" to find trend retracement trades.

In the charts below, I have marked the "No Demand" bars with red arrows and the "No Selling Pressure" bars with green arrows.

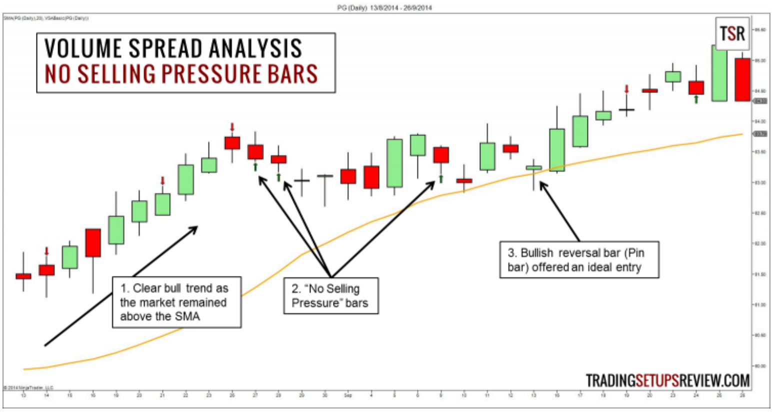
1. No Demand Bar - Potential Short Trade



This chart shows the daily bars of Deere & Company (DE).

1. This bar punched below the SMA and hinted at an impending bear trend.
2. These three consecutive "No Demand" bars confirmed the lack of market interest to resume the bullish run.
3. Hence, we had a great context for considering a short trade.

2. No Selling Pressure - Potential Long Trade



This chart shows the daily bars of The Proctor & Gamble Company (PG).

1. The market was in a strong bull trend and remained above the SMA.
2. In this sideways pullback, we observed three "No Selling Pressure" bars. They hinted that the bears are not forthcoming, and the stage for a bullish retracement trade was set.
3. This bullish Pin Bar offered the ideal setup bar.

7.6 Where can we learn more about VSA?

VSA is gaining in popularity, and there is no lack of resources to advance your understanding.

Books on VSA

- Master the Markets
- Trading In the Shadow of the Smart Money
- Trades About to Happen: A Modern Adaptation of the Wyckoff Method

Forum Discussions on VSA

There are great discussions on VSA on Traders Laboratory and Forex Factory. To find information on VSA in popular trading forums with a click, try our Trading Forums Search Engine.

VSA Trading Software

There are many software that claim to use VSA techniques to help you trade better. I would not comment on their efficacy as I have not used them.

But I am sure that no software will bring you trading success unless you truly understand the VSA principles. Hence, you should definitely learn as much as you can about VSA, before relying on a software for your analysis. This approach will make sure that you do not use the software blindly, if you do buy one.

7.7 Conclusion - VSA

Volume is valuable because it offers another market dimension for analysis. Volume is also dangerous because it confuses those who do not understand it.

Take one step at a time. Pick up VSA concepts steadily and use them in your trading prudently. Once volume starts to make sense to you, you will see progress but improvements will not come overnight.

8. What is Stopping Volume in Volume Spread Analysis (VSA)?

Stopping volume is a concept in volume spread analysis. It refers to an increase in volume that stops the market from falling further.

The assumption here is that the market is falling. Then, it experiences a surge in volume bullish enough to halt the fall. This is the theory.

In practice, how do you look for stopping volume?

8.1 Characteristics of Stopping Volume Day

- Down-day. (closes lower than the day before)
- Very high volume. (I explained my method to find high volume in chapter 2.)
- Closing near the high of the day.

(Based on Tom William's Master the Markets.)

8.2 Stopping Volume and Price Action

At its best, stopping volume catches the exact low of a bear trend (start of a bull trend). This is what attracts Holy Grail seekers to this VSA concept. However, more often, stopping volume just pushes the market into a trading range instead of reversing it.

Stopping volume is not a common sight. When you spot it, it deserves a closer look.

8.3 Three Stopping Volume Examples

Sideways Price Action

The chart above shows the daily price bars of Campbell Soup Company (CPB).

1. The market was in a bear trend.
2. Price was rejected from a new trend low with stopping volume.
3. CPB did not reverse into a bull trend. Instead, prices went into a trading range.
4. After a sharp false break-out upwards, another stopping volume day formed. However, stopping volume makes sense only in the context of falling prices. Thus, this second signal held less weight on our analysis.

Deep Retracement

This is a daily chart of Expedia Inc (EXPE).

1. Again, the price action context was bearish.
2. After a tight trading range, the market moved lower and met with stopping volume.
3. The stopping volume here was more potent than the CPB example. It led to a bullish trend that almost erased the earlier market plunge.
4. Then, the market continued to fall. (I used the label of "deep retracement" with the benefit of hindsight. In real-time, I would have called it a reversal.)

Sharp Reversal

This chart shows the recent price action of the S&P 500 ETF (SPY).

1. The market fell fast and prompted fear.
2. At the end of the sell-off, there were two consecutive days with stopping volume.
3. Immediately after this rare formation, prices reversed and rose sharply.

8.4 Using Stopping Volume to Your Trading Advantage

The last example shows stopping volume catching the exact start of a bull trend. Such textbook examples are not common. So don't try to catch reversals with an isolated signal.

Combine stopping volume with other technical tools for a safer reversal trade.

If you are in a short position, covering when there's stopping volume is a good idea. It may not be the perfect exit. But even if you expect the bear trend to continue, you can likely short again at a higher/better price.

High volume formations are often key turning points or support-/resistance. Hence, expect to find stopping volume with anchor bars and exhaustion gaps. In fact, these concepts are not mutually exclusive.

9. Ease of Movement Trading Strategy

Combining price and volume helps us to decipher demand and supply. But what's the point of understanding demand and supply? We want to find the path of least resistance. For this purpose, Richard Arms' Ease of Movement indicator fits the bill.

While you can check out Ease of Movement's formula here, you don't need to memorize it if you understand the intuition behind it. This is how it works.

For a market to rise, it must overcome overhanging supply. Hence, if a price increase showed heavy volume, it means that supply was abundant. The market had to overcome the supply before rising. In conclusion, the market rise was difficult.

What if the market rose with light volume? This means that there was little overhanging supply that the market had to overcome to rise. Hence, the market rose easily.

Of course, we can also apply the same logic to falling markets. And the result is the Ease of Movement indicator.

The Ease of Movement indicator has a zero line. Positive values imply that the market is moving higher with ease. Negative values point to an easy decline. The chart below shows an example.

9.1 Trading Rules - Ease of Movement

In this strategy, we are looking for trapped traders in a trend. Hence, we will use the Ease of Movement indicator for two purposes.

The first is to confirm a trend. For a bullish trend, we want a sustained positive Ease of Movement together with a rising market. For a bearish trend, we want to see negative Ease of Movement values. (Refer to Trading Rule 1 below.)

Then, we will wait for a pullback against the trend as indicated by the Ease of Movement indicator. This will help us find pockets of trapped counter-trend traders. (Refer to Trading Rule 2 below.)

We are using the common default Ease of Movement settings of 14-period.

Bullish Trend Rules

1. Ease of Movement forms a swing low above the zero line.
2. Ease of Movement falls below the zero line.
3. Buy when price rises above any bullish bar.

Bearish Trend Rules

1. Ease of Movement forms a swing high below the zero line.
2. Ease of Movement rises above the zero line.
3. Sell when price falls below any bearish bar.

9.2 Ease of Movement Trading Examples

Winning Trade - CAH Daily

This is a daily chart of Cardinal Health (CAH on NYSE). The lower panel shows the Ease of Movement indicator in blue. Its zero line is in black.

1. The Ease of Movement indicator formed a swing low above the zero line, confirming a bullish trend. Note that we were not looking for price swing lows. We were looking for swing lows formed by the Ease of Movement plot.
2. As the Ease of Movement became negative, it was a sign that at least some counter-trend traders have taken short positions.

3. Assuming that the bullish trend was intact, we wanted to fade the counter-trend traders. Hence, we bought above this bullish bar.
4. Although the Ease of Movement indicator turned positive after our long entry, its values remained low. It implied difficulty in the market's attempt to resume the bullish trend. Hence, it was wise to keep our target conservative.

Losing Trade - AA Daily

The chart above shows the daily price bars of Alcoa Inc (AA on NYSE).

1. The Ease of Movement indicator formed a swing low, sustaining its positive drift. Bullish mode on.
2. As the Ease of Movement indicator fell below the zero line, it was time to look for long entries.
3. This bullish inside bar was a solid entry bar.
4. However, the market continued to fall right after our entry.

Focus on the price action in both examples. The retracement in the winning trade was around half of the earlier bullish swing. In the losing example, the retracement reversed the entire last bull swing.

In the latter, it was likely that the bullish market structure has already been compromised. Hence, the long trade seemed like a bad idea once we take price action into account.

9.3 Review - Ease of Movement Trading Strategy

The Ease of Movement is a nifty indicator that accounts for the interaction between price action and volume. If you agree with the logic that links ease of price movement to trading volume, this is indicator is for you.

This trading rules above represent a simple trading setup for educational purpose. Thus, we used the Ease of Movement indicator for both trend identification and entry timing.

However, in fact, Richard Arms did not design this indicator as a complete trading solution. Most traders combine it with other methods or indicators for a more robust analysis. Its greatest value is in confirming other indicators with its intuitive price volume dynamics.

Richard Arms has done extensive research on the relationship between market movement and volume. He is also the pioneer of the unique Equivolume charts. To learn more about his tools and trading methods, refer to his book, Trading Without Fear: Eliminating Emotional Decisions with Arms Trading Strategies.

10. On-Balance Volume Trading Strategy For Fading Dumb Money

What's the second most important market data after price?

One of the key tenet of Dow Theory is that volume confirms the trend. Volume increases when the market moves along with the true market trend. Volume decreases when the market is moving against the trend.

Joseph Granville recognized how important volume is for confirming trends and created the on-balance volume indicator. Joseph Granville's track record was controversial but his influence of the stock market was extraordinary for a technical analyst. There was a time when Joseph Granville could send the market plummeting by issuing a bearish outlook. Read this Bloomberg article on him.

The **on-balance volume** indicator is a cumulative sum of volume. If the bar closes up, add the volume of that bar to the indicator. If the bar closes down, minus the volume of that bar.

The value of on-balance volume is irrelevant as it depends on when you started calculating the indicator. Its direction is the key to effective analysis. Most of the time, the on-balance volume matches price movement. When they diverge, look out for opportunities to fade 'dumb money' that does not have the support of volume.

(Read: 4 Trading Strategies that Profit from Trapped Traders)

10.1 On-Balance Volume Trading Rules

In our on-balance volume (OBV) trading strategy, we use the OBV indicator to fade the weak hands on trend pullbacks with the help of a weighted moving average.

Long Strategy

1. 233-period WMA of price is sloping up
2. 233-period WMA of OBV is sloping up
3. Slope of price WMA turns negative but slope of OBV WMA stays positive (divergence)
4. Go long when price WMA turns positive again

Short Strategy

1. 233-period WMA of price is sloping down
2. 233-period WMA of OBV is sloping down
3. Slope of price WMA turns positive but slope of OBV WMA stays negative (divergence)
4. Go long when price WMA turns negative again

10.2 On-Balance Volume Trading Examples

Winning Trade - Long Trade

This is a daily chart of CVS Caremark Corporation (CVS on NYSE). The lower panel below the blue line shows the OBV indicator. Both panels have a 233-period WMA. The background color of the panels shows if the WMA slope is positive or negative.

1. Both WMAs had positive slope. Volume confirmed trend.
2. Price fell to test a previous swing high and went sideways.
3. The slope of the price WMA turned negative (note red background), but the slope of OBV WMA stayed positive. It showed that the price pullback did not have the support of volume. The 'dumb money' was pushing their luck. Once the price WMA slope reverted to positive, we bought into a strong bullish move.

Look at the black circle on the chart. The test of the same support level showed another pullback that did not have volume support.

Another winning trade from our on-balance volume trading strategy.

Losing Trade - Short Trade

This daily chart of Walgreen Company (WAG on NYSE) shows a flat market.

1. Both WMAs turned down to confirm the downwards trend.
2. Price rose up sharply and turned the WMA slope positive. The slope of the OBV WMA stayed negative and implied that 'smart money' did not take part in that upwards swing. Following the trading rules, we shorted at the red arrow as the WMA turned down. However, price moved against us with another strong bullish move.
3. WAG caught prices within a trading range, and many more bad OBV signals emerged. The WMA was almost flat in this chart.

The retracement mentioned in Point 2 lasted unusually long and was a warning sign that the downwards trend was not longer intact.

This example also highlighted the dangers of using this on-volume balance trading strategy mechanically.

10.3 Review - On-Balance Volume Trading Strategy

In formulating this on-balance volume trading strategy, I used weighted moving averages to help us pinpoint divergences before zooming in for detailed analysis. The rules are effective for picking up potential weak movements to fade.

However, our trade trigger certainly has room for improvement. Our current trade trigger of entering when both WMAs move in the same direction again requires larger stops. Our usual stop placement at the other end of the signal bar is not effective. Place stop at the last swing high/low to avoid whipsaws. Consider using reversal patterns for trade triggers.

The look-back period of 233 is my standard parameter for long-term analysis. It works well on daily time-frames. However, for intraday time-frames, you might want to experiment with shorter periods.

As shown in the first example, in trending markets, this on-balance volume trading strategy coupled with support/resistance levels is a reliable trading approach. Furthermore, the on-balance volume indicator provides another dimension of the market to help us confirm trends.

To avoid bad trades, do not take signals in ranging markets. If the WMA slopes are fluctuating up and down, the market is probably in a trading range. Also, if the WMA slope divergence (Trading Rule 3) lasts too long, do not take the ensuing signal.

Learn more about this classic volume indicator with Joseph Granville's New Key to Stock Market Profits.

11. Volume-Weighted Moving Average (VWMA) - A Simple Volume Tool

Using volume in your trading is a difficult skill to master. Hence, traders might find volume trading indicators useful. But unfortunately, some volume trading indicators have many inputs and are hard to understand. This is why the Volume-Weighted Moving Average (VWMA) is a great choice for new traders.

11.1 What is a Volume-Weighted Moving Average (VWMA)?

Compared to indicators introduced earlier like On-Balance Volume and Ease of Movement, the VWMA is simple.

A Simple Moving Average (SMA) is an average of the past N closing prices. It give the same weight to every closing price.

3-Day SMA = (C1 + C2 + C3) / 3

A Volume-Weighted Moving Average (VWMA) is the same, except that it gives different weight to each closing price. The closing price of a day with high volume will have a greater weight.

3-Day VWMA = (C1*V1 + C2*V2 + C3*V3) / (V1+ V2+ V3)

For e.g., if the volume of day 3 (V3) is higher, its closing price (C3) will have a larger effect.

11.2 Missing the Point - Trading the VWMA like a Normal Moving Average

A moving average is a versatile tool. You can use its slope as a trend filter. You can compare the price to its moving average to decipher momentum. You can also watch the moving average as a support or resistance level.

For a price action trader, these are solid methods to trade a moving average. But they miss the point of the VWMA, because they do not make use of the VWMA's unique volume attribute.

11.3 Effective Use - Combine VWMA with a Benchmark SMA to Highlight Volume Signals

To fully make use of the VWMA, compare it with a SMA that does not include volume.

The SMA is a benchmark. This means that you should choose the same look-back period for both the SMA and the VWMA. The only difference between the two moving averages is volume weighting.

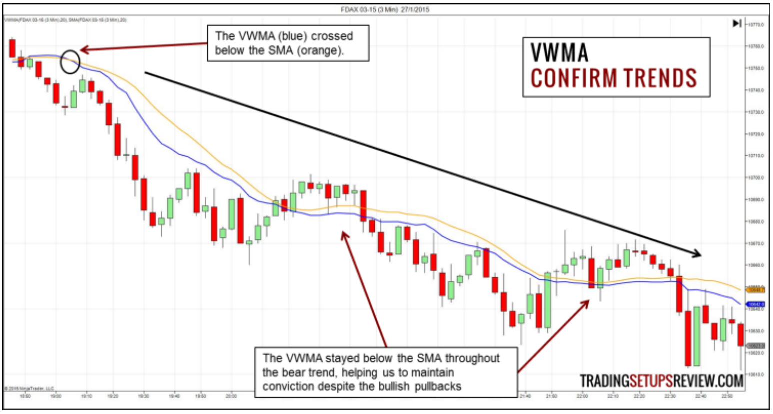
What matters here is the gap between the VWMA and the SMA. Their difference shows the effect of volume weighting.

Generally, volume should increase along with the trend and decrease against it. Hence, generally, if the VWMA is above the SMA, it means that volume has been higher on up days. When the VWMA is below the SMA, it shows that down days had higher volume.

Let's go through a few examples on how to interpret the VWMA using a benchmark SMA. (The VWMA is blue and the SMA is orange.)

11.4 Examples - Interpreting the VWMA

Confirm Trends



The chart above shows the FDAX futures contract in a 3-minute chart. The blue VWMA stayed below the orange SMA and confirmed the bearish trend. This assurance is helpful for traders who are trying to let their profits run.

Find Weakening Trends

This is a daily chart of McDonald's Corporation (MCD on NYSE). It shows the VWMA moving below the SMA. It was a stark warning that the bullish trend lacked volume support.

Most moving averages issue reversal warnings through price crossovers. Hence, they do only after the market has reversed. Here, it is impressive that the VWMA warned us when the market was still bullish.

Trade Divergences

This is a daily chart of Textron Inc (TXT on NYSE). It shows how the divergence between price and volume presents a trading opportunity.

The VWMA is great for tracking the price-volume context. However, it does not trigger a trade. Use other indicators or price patterns as your trade trigger.

11.5 Volume Weighted Moving Average - A Simple Upgrade

If you trade with the SMA, adding the VWMA is simple way to improve your market analysis. I used the 20-period VWMA as it is the common tool for short-term trading. You can apply the same concept using other look-back periods that are consistent with your trading time-frame.

Using a VWMA with a SMA resembles a dual moving average system like the 9/30 trading setup. However, a typical dual moving average system does not feature volume at all. The VWMA adds a new dimension to the SMA, and does not just stretch it along the same dimension.

The size of the space between the VWMA and the SMA reflects the effects of volume-weighting. Thus, when the VWMA is entwined with its benchmark SMA, the market is listless. In such cases, do not draw strong conclusions.

In all, the VWMA offers a simple and effective upgrade for most traders.