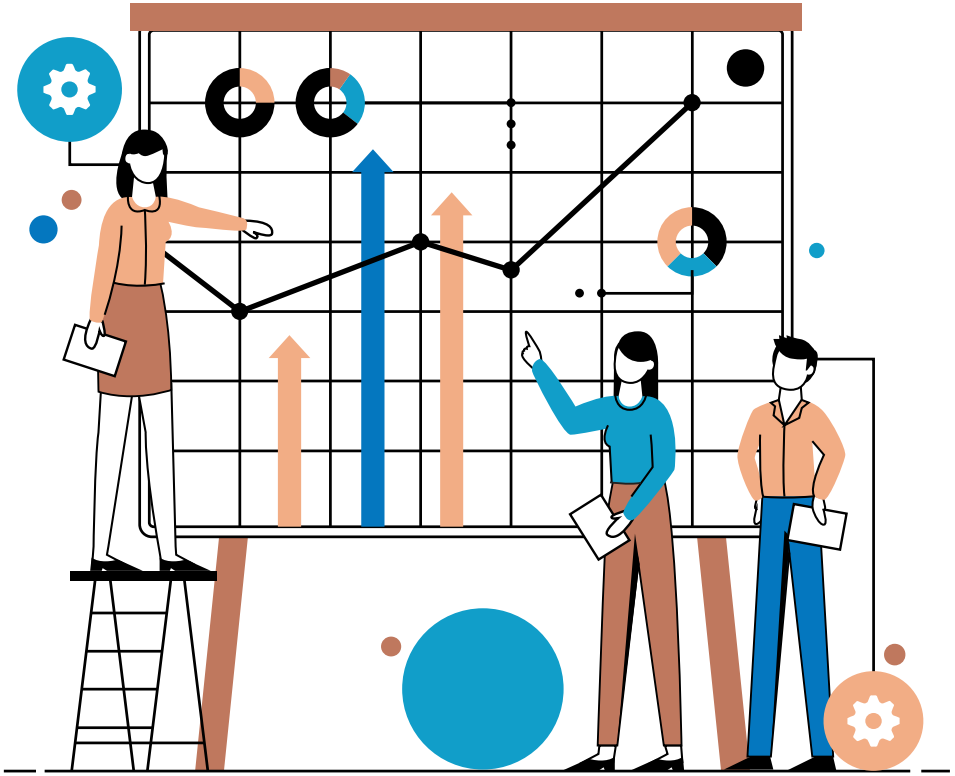
marketXLS

Decoding the MarketXLS Stock Rank Algorithm



The MarketXLS Algorithm

Brief Summary

Stock Rank Algorithm

Strong Balance Sheets
High-Quality Companies
Reasonable Valuations
Fundamentally & Technically Solid

Value

Comparison of stock's intrinsic value to the market value

Quality

Focussed on quality metrics like business model, corporate governance etc

Timeliness

Entering and exiting at the right time based on statistical trends

Understanding Value

Stock's intrinsic value vs the stock's current market price
Undervalued vs overvalued

P/E Ratio	Price to Earnings Ratio	A high P/E ratio could mean that a company's stock is overvalued, or else that investors are expecting high growth rates in the future.
P/B Ratio	Price to Book Ratio	The price-to-book ratio compares a company's market value to its book value. A P/B ratio of less than 1 is considered a solid investment.
EV/EBITDA	Enterprise Value/EBITDA	Compares the value of a company, debt included, to the company's cash earnings less non-cash expenses. Helps to compare companies within the same industry.
Dividend/ Price	Dividend Yield	Shows how much a company pays out in dividends each year relative to its stock price.

Each of these metrics is then compared with their respective industry metrics to arrive at a Value score.

Understanding Quality

During times of turmoil or external macro shocks, there is intense selling which results in negative returns over the short term. However, in the long run, the stocks that are high quality prevail.

Altman Z Score

Predicts whether a company has a high probability of becoming insolvent.

Beneish M Score

Identifies if a company has manipulated its profits

Piotroski F Score

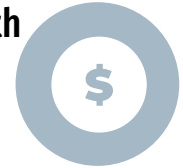
Assess the strength of a company's financials to find value stocks

5-year Revenue Growth

Comparison of the revenue growth of the stock vs the sector over a period of 5 years.

5-year Profitability Growth

Comparison of the growth in profitability of the stock vs the sector over a period of 5 years.



5-year FCF Growth

Comparison of the growth in free cash flow of the stock vs the sector over a period of 5 years.

Each of these metrics is then compared with their respective metrics to arrive at a Quality score.

Quality

Metric	Comparison Value		Value	Sector Value	Rank
Altman Z score	2.99	Higher the better	1.81	2.99	3
Beneish M Score	-2.22	Lower the better	-2.429818	-2.22	5
Pitrioski F Score	7	Higher the better - (max 9)	8	7	5
Stock Return	Sector or with S&P 500	Higher the better	0.013098	0.05	1
Growth in revenue in past 5 years	if 5 out of 5 - rank is 5	Higher the better			5
Growth in profitability in past 5 years	if 5 out of 5 - rank is 5	Higher the better			5
Growth in free cash flow in past 5 years	if 5 out of 5 - rank is 5	Higher the better			5
					76.32

Understanding Timeliness

Timeliness is a technique that can be used to enter and exit a stock at the right time.

Volume

Volume > 20 day average

3 points

Measures how much a given financial asset has traded in a period of time

Moving Averages

MA > 20 EMA/DMA

4 points

Smoothens the price data over a specified period of time

RSI

RSI > 70

4 points

Evaluates overbought or oversold conditions in the price of a stock

MACD

MACD > 0

1 point

Shows the relationship between two moving averages of a security's price.

ADX

ADX > 20
DI+ve > DI-ve

2 points

The average directional index (ADX) is used to quantify trend strength.

Each of these metrics is then compared with their respective comparison values to arrive at a Timeliness score.