

# Introduction to StrategyQuant

Imagine you have a tool that can build you a portfolio of new trading strategies.

Imagine that it can generate complete robots (EAs) ready for automatic trading on MetaTrader4.

StrategyQuant is a powerful strategy development platform that uses machine learning techniques and genetic programming to automatically generate new automated trading systems for any market or timeframe.



With StrategyQuant you can:

- ✓ Build unlimited number of trading strategies
- ✓ Develop strategies for any market or timeframe
- ✓ Run Robustness Tests to reduce the risk of curve-fitting
- ✓ Save your strategies as a MT4 EA with full source code!
- ✓ Improve existing strategies by altering the trading rules
- ✓ Optimize your strategy using Walk-Forward optimization

In StrategyQuant you don't need to define the trading rules of your new trading system. It uses machine learning techniques to generate new, unique trading strategies.

**No programming or trading knowledge is required.**

It is able to create strategies that you as a trader wouldn't think of, and it is able to do it quickly and test the generated strategies right away.

**StrategyQuant can generate you hundreds of new trading strategies** - each unique, backtested on multiple data/timeframes to ensure maximum robustness.

The resulting strategies can be saved as a MetaTrader 4 Expert Advisor with complete source code.

## Developing a trading strategy

Development of a new trading strategy manually is a slow process. It starts with trader using his experience and knowledge to pick up the elements of the trading strategy like technical indicators, price patterns, entry and exit order types and general strategy design.

Then the prototype is tested on the historical data to prove its profitability. The backtest often reveals that the results are not acceptable.

So the trader has to alter it, add or change some indicators, try different ideas or parameters and then test it again.

**It is a long trial-and-error process with numerous iterations, revisions and testing until the strategy hopefully achieves acceptable results.**

## How can StrategyQuant speed up the process?

Let's say you want to create a new trading strategy for EURUSD. You'll choose the EURUSD data source, choose timeframe and time range.

Define which blocks the strategy should consist of (indicators, price data, operators, etc.).

Define what should be the parameters of resulting strategy - for example, total Net Profit must be above \$ 5000, % Drawdown must be lower than 20%, Return/DD ratio must be above 4, it must produce at least 300 trades.

Then just hit the **Start** button and StrategyQuant will do the work.

It will randomly generate new trading strategies using building blocks you selected, tests them right away and stores the ones that fit your requirements for your review.

To see an example how strategy development process could look like check the article [Getting started with StrategyQuant – practical example](#)

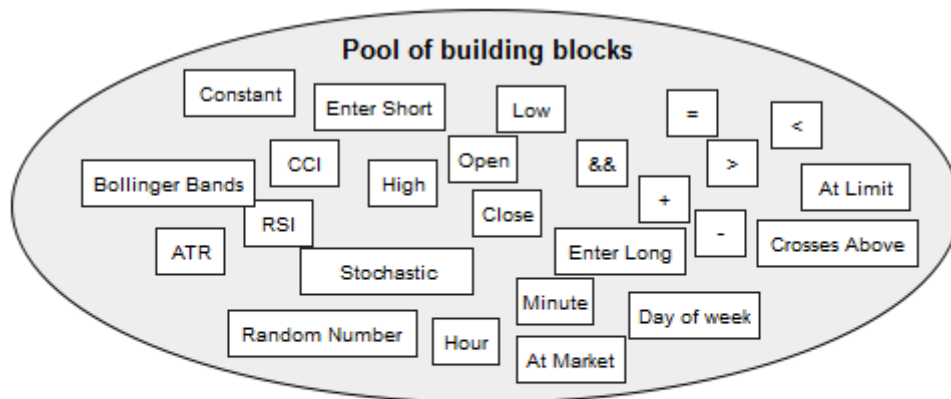
## Strategy construction

A trading strategy in StrategyQuant is constructed using a random combination of price patterns, technical indicators and order types to form the entry and exit rules.

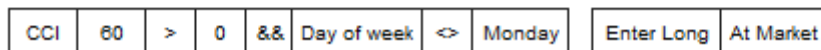
StrategyQuant can use all standard technical indicators and oscillators (like CCI, RSI, Stochastic, etc.), time values (time of day, day of week) and price patterns. These building blocks are then combined using logical and equality operators (and, or, >, <, etc.) to form an entry or exit rule.

In addition, it supports different order and exit types (market order, limit order, fixed profit target, exit after X bars, etc.).

With all the possible combinations of rules and orders, StrategyQuant is capable of generating literally trillions of different possible trading strategies.



### Example of randomly generated entry rule:



if (CCI(60) > 0 && Day of week <> Monday) then Enter Long At Market

*Image 1: Random generation of strategy rules from the pool of available building blocks*

The building process itself is completely random - builder randomly picks different building blocks from the available pool and combines them to create entry rule, order type and exit rule.

The result is a completely new trading strategy.

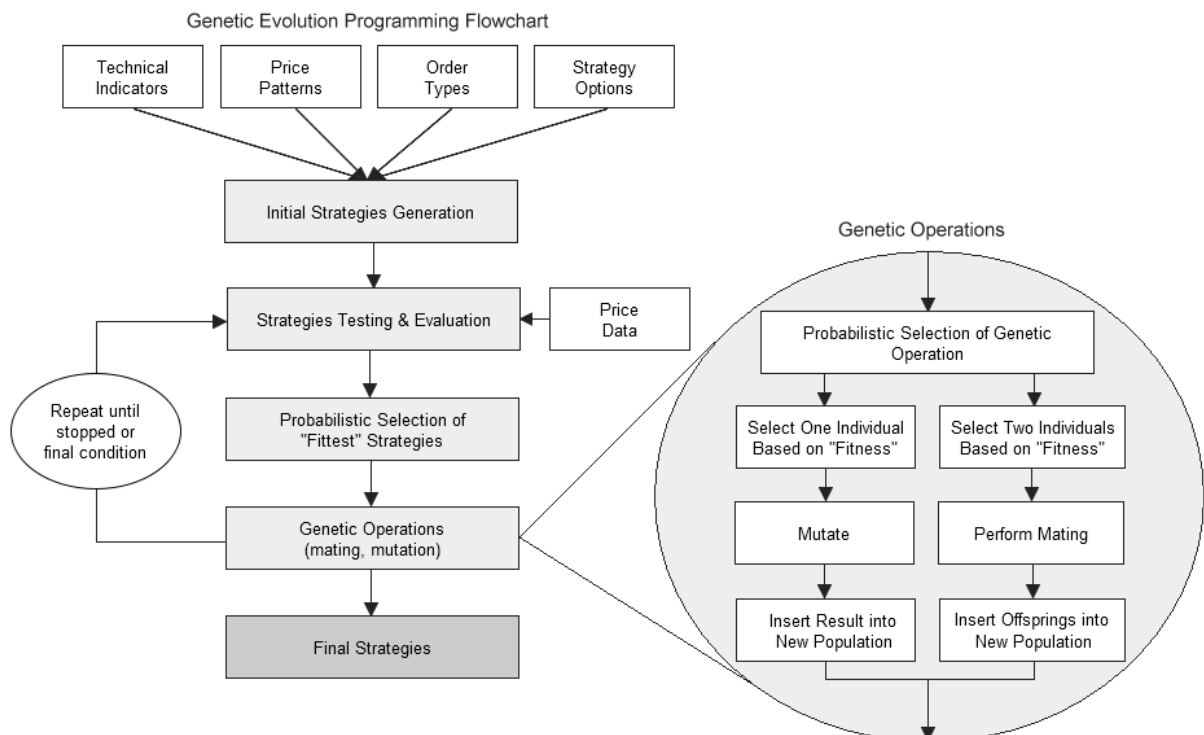
Of course, not every randomly created strategy is profitable, but StrategyQuant can produce and test hundreds of new unique strategies every hour, testing different approaches and different combination of conditions, price data and indicators.

## Employing Genetic Evolution

Genetic Evolution takes the process of finding suitable trading strategies even further.

In this mode StrategyQuant first creates a number of random strategies, which are used as the initial population in the evolution. This initial generation of strategies is then "evolved" over successive generations using genetic programming technology.

This process imitates the evolution - algorithm chooses the fittest strategies (using selected performance criteria) in every generation, and the group of fittest candidates is then used to produce new generation of strategies using genetic operations like crossover and mutation.



**Image 2:** The process of genetic evolution

As in evolution, this should result in better and better candidates, in our case in strategies that are more profitable, more stable, or generally better in the selected performance criteria.

### StrategyQuant

Software to generate new trading strategies, with export to MetaTrader 4 EA code

**Email:** [support@strategyquant.com](mailto:support@strategyquant.com)

**Requirements:** Windows

**www:** <http://www.StrategyQuant.com>

**Price:** \$345 - \$990

Get a free trial at <http://www.StrategyQuant.com/trial>