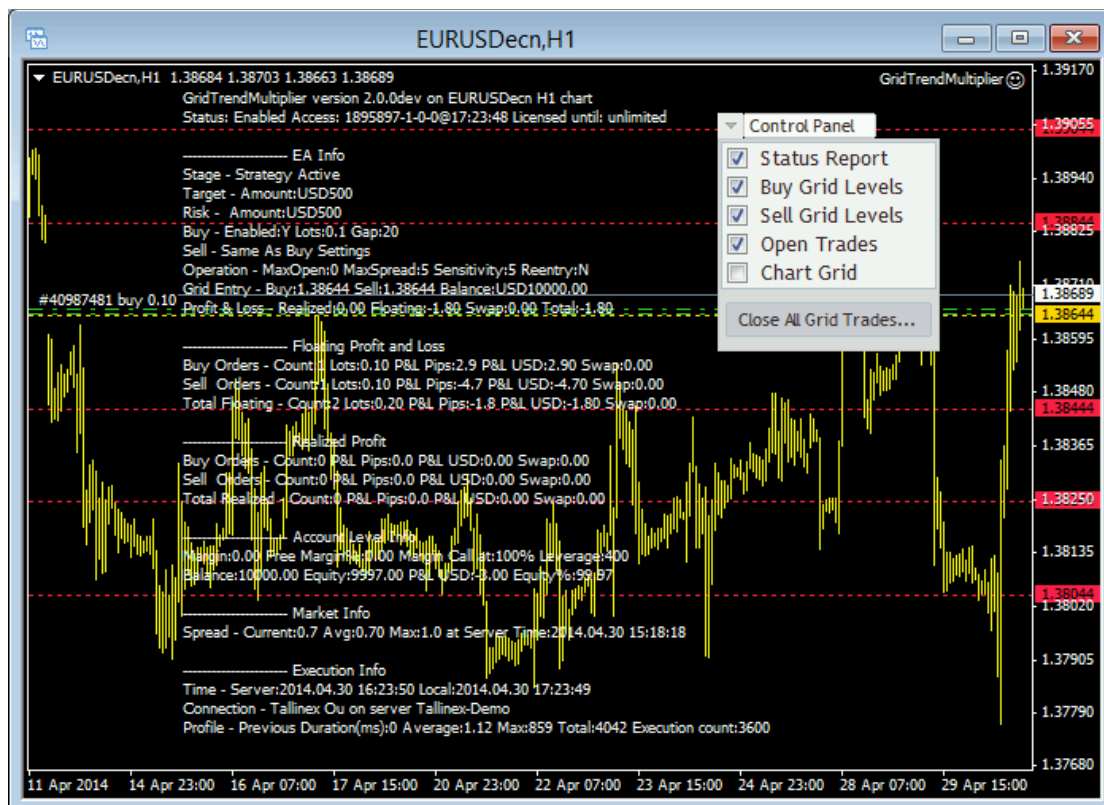


# Expert4x.com

Recommendations that will change your life

## GridTrendMultiplier Expert Advisor User's Guide

April 30, 2014



## Table of Contents

1 System Requirements.....	<a href="#">3</a>
1.1 Operating System Requirements.....	<a href="#">3</a>
1.2 Hardware Requirements.....	<a href="#">3</a>
1.3 MetaTrader (MT4) Requirements and Settings.....	<a href="#">3</a>
1.4 Forex Broker Requirements.....	<a href="#">3</a>
1.4.1 Hedging Support Requirements.....	<a href="#">4</a>
1.4.2 Non-FIFO Support Requirements.....	<a href="#">4</a>
1.5 ECN/STP Broker Accounts.....	<a href="#">4</a>
1.6 Full Trade History Must Be Enabled.....	<a href="#">4</a>
2 GridTrendMultiplier EA Installation Instructions.....	<a href="#">6</a>
3 GridTrendMultiplier EA First Time Activation.....	<a href="#">10</a>
4 GridTrendMultiplier EA Configuration Guide.....	<a href="#">13</a>
4.1 Configuration and Operation Principles.....	<a href="#">13</a>
4.2 GridTrendMultiplier EA Parameter Descriptions.....	<a href="#">14</a>
5 Control Panel.....	<a href="#">21</a>
6 Troubleshooting.....	<a href="#">22</a>
6.1 Sad Face Instead of Smiley After Attach.....	<a href="#">22</a>
6.2 EA Is Not Starting Up After Attach to Chart.....	<a href="#">22</a>
6.3 No Updates to Chart.....	<a href="#">23</a>
6.4 Access ID at Service Access Settings.....	<a href="#">24</a>
7 Support.....	<a href="#">26</a>

## **1 System Requirements**

Please pay attention to the following system requirements.

### **1.1 Operating System Requirements**

In order to operate the GridTrendMultiplier EA a Microsoft Windows operating system is required which supports MetaQuotes MetaTrader version 4.0 platform.

Note that the MetaQuotes MetaTrader software is also known and often referred to as MT4.

### **1.2 Hardware Requirements**

The minimum Random Access Memory (RAM) requirement is 384MB, however 512MB RAM is recommended to avoid extended virtual memory usage. Note that this memory requirement is for MetaTrader application only, excluding other applications running at the same time (e.g. MS Office). If other applications are running parallel with MetaTrader application please increase the RAM requirement accordingly.

### **1.3 MetaTrader (MT4) Requirements and Settings**

The GridTrendMultiplier EA is compatible with MetaQuotes MetaTrader platform version 4.0 build 600 or higher. In general this is referred to as MT4 terminal, build 600 or newer.

### **1.4 Forex Broker Requirements**

The GridTrendMultiplier EA is compatible with both 4 and 5-digit data feeds based brokers. The GridTrendMultiplier EA automatically detects the type of the feed and adjusts the EA parameter pip values if and when necessary.

Both fixed and variable spread broker platforms are supported.

The selected MetaTrader based broker should allow keeping open orders on the account for long period of time, i.e. the broker should not close and re-open orders over night for swap calculation, or should not merge open orders for any reason.

**IMPORTANT:** For smooth trade management the MetaTrader application and the EA should be on-line, up and running during all market open hours (usually Sunday to Friday).

## **1.4.1 Hedging Support Requirements**

The GridTrendMultiplier EA can be configured to open BUY as well as SELL positions at the same time on the same market. In this situation the broker account must support the hedging of trades.

## **1.4.2 Non-FIFO Support Requirements**

The GridTrendMultiplier EA may open and close positions out of order of the first-in-first-out (FIFO) sequence. Therefore the broker account must support the order handling in non-FIFO manner.

## **1.5 ECN/STP Broker Accounts**

Many brokers offer Electronic Communications Network (ECN) or Straight Through Processing (STP) accounts. Common behaviour for these accounts is the variable spread and market orders where no initial stop loss and take profit targets can be specified. In this case the market order must be submitted with no SL and TP values, and these values are to be set in the second step using an additional order to the opened ticket.

The GridTrendMultiplier EA is compatible with the above ECN/STP broker accounts and needs no additional settings to operate on them.

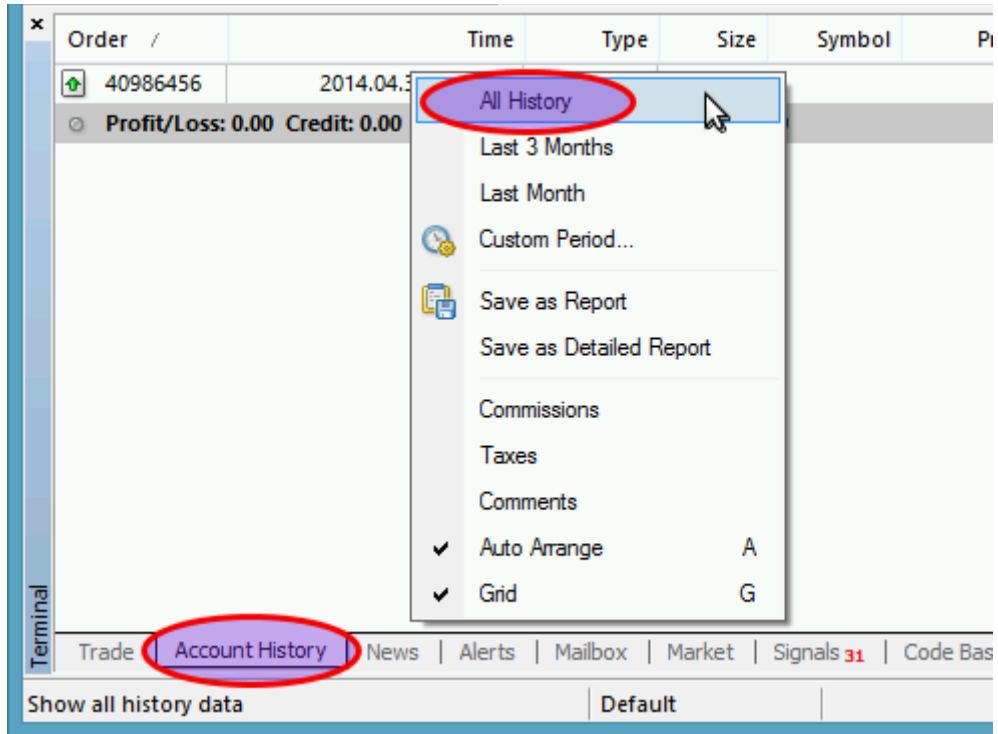
## **1.6 Full Trade History Must Be Enabled**

The GridTrendMultiplier EA tracks ongoing grid trade cycle's profit and loss since the start up of the grid cycle. For this the EA needs to have visibility to past closed tickets listed in the Account History tab of the MT4 Terminal window. Please ensure that this tab lists all past tickets, the full history, otherwise the EA may not be able to operate:

1. Go to Terminal window (Ctrl+T)
2. Select 'Account History' tab
3. Right click on any ticket or the empty window area
4. Select 'All History' in the context menu

# Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

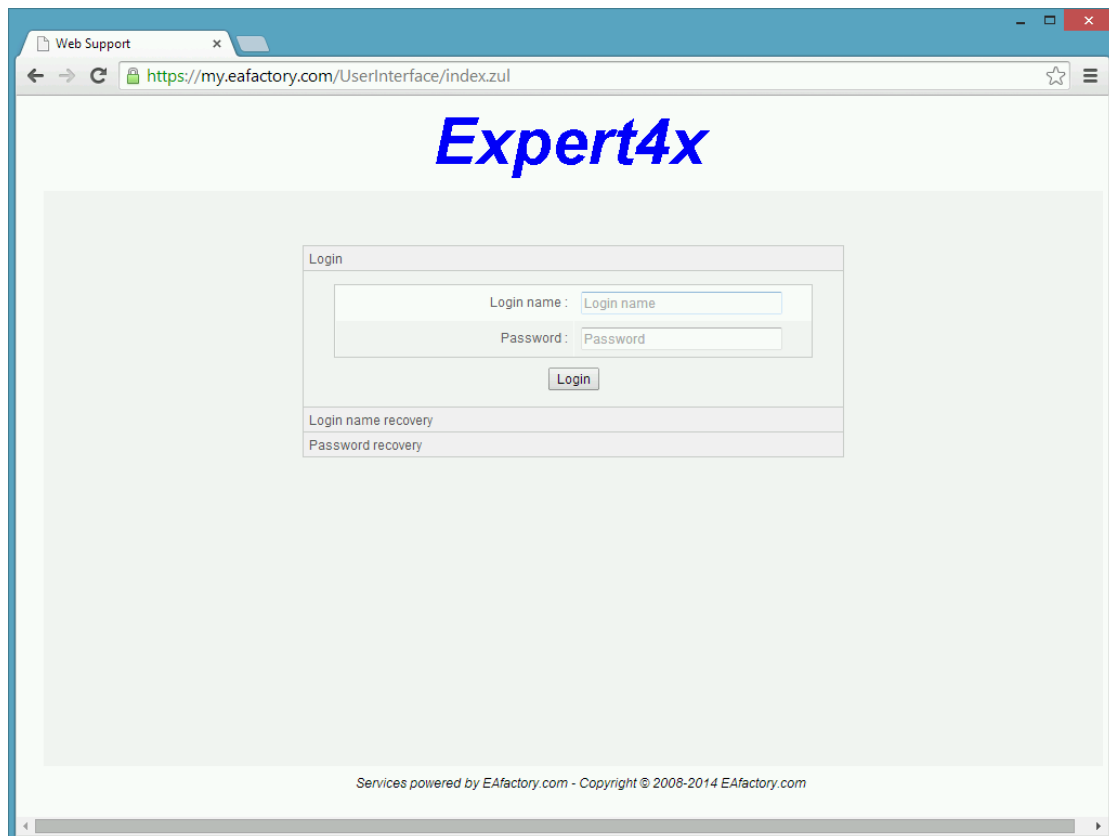
April 30, 2014



## 2 GridTrendMultiplier EA Installation Instructions

Please follow these steps to get the GridTrendMultiplier EA installed on your system:

1. Exit MT4 if it was running (File/Exit)
2. Log in to web support area at <https://my.eafactory.com/expert4x>

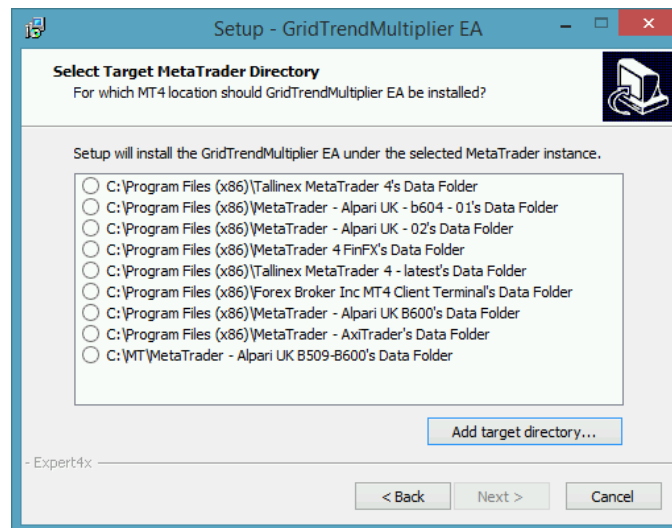
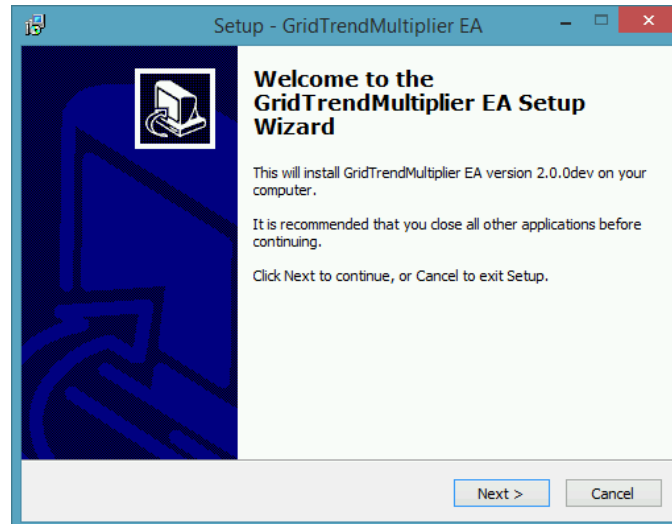


3. Select the desired service and download the latest version's setup application.
4. Run the setup application. Select the MT4 instance during setup to where you want the service installed.
5. When setup completes start up MT4. 'GridTrendMultiplier' entry should appear under the 'Expert Advisors' node in the Navigator window (View/Navigator)

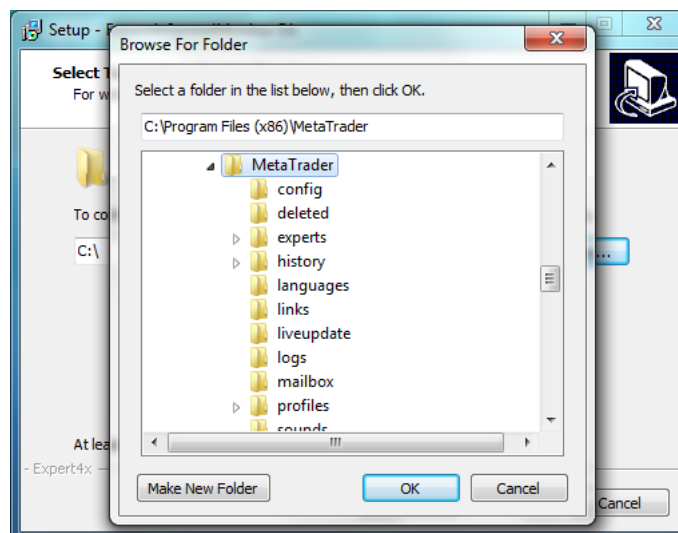
These pictures highlight the steps how to install the Expert Advisor.

# Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014



The setup application lists the available MT4 instances. Select one of them for installation target and click Next.



## Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014

Note: For some earlier Windows versions the list may not contain all the MT4 instances. In this case use the 'Add target directory...' button to navigate to and pick up the desired folder. For earlier Windows versions the typical MetaTrader installation location could be

C:\Program Files\<BrokerSpecificName>\

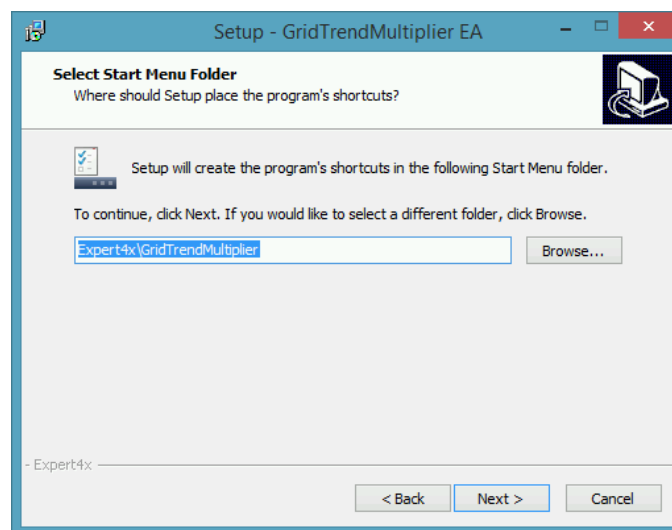
but you may have selected something else while performing the MetaTrader installation. As a hint, the following shows you the default path to the main MT4 directory for some brokers:

IBFX broker: C:\Program Files\Interbank FX Trader\experts

Alpari UK broker: C:\Program Files\MetaTrader - Alpari UK\experts

ODL UK broker: C:\Program Files\ODL MetaTrader 4\experts

Always select the main MT4 folder itself for installation target, not any of its sub-directories.

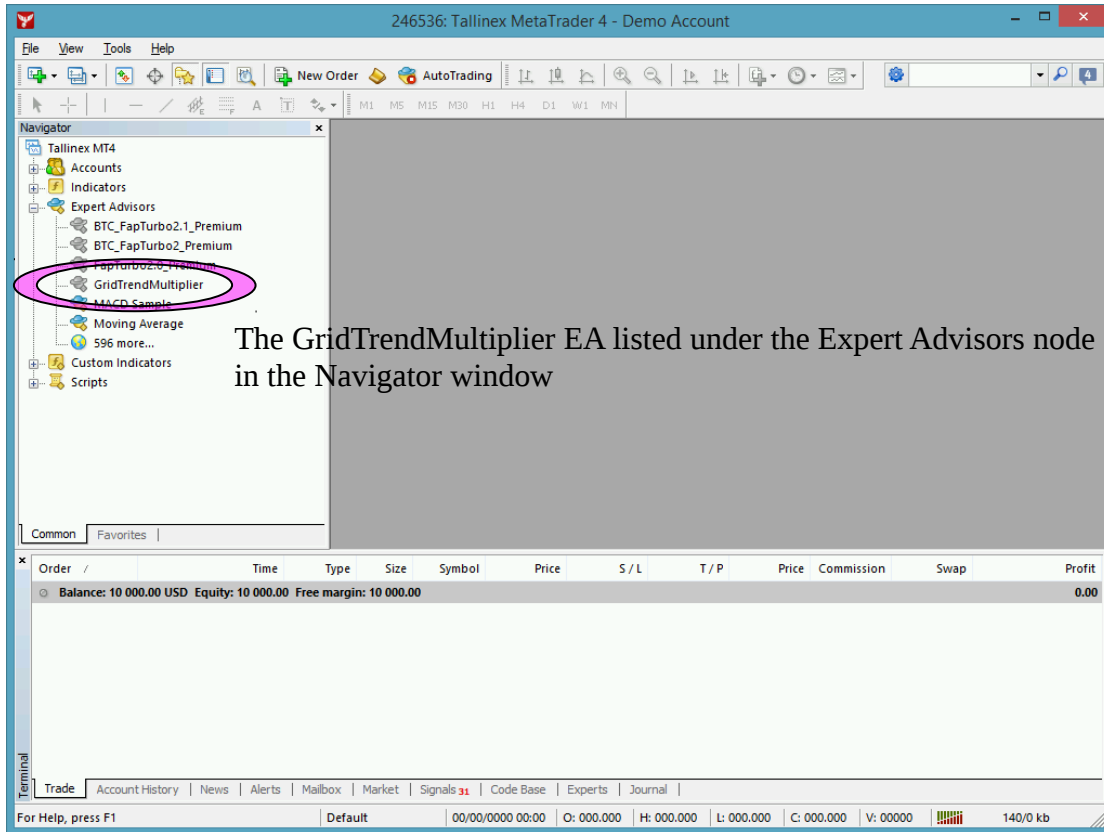


When the installation is complete, start up MT4 and check that the Expert Advisor appears in the Navigator window:



# Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014

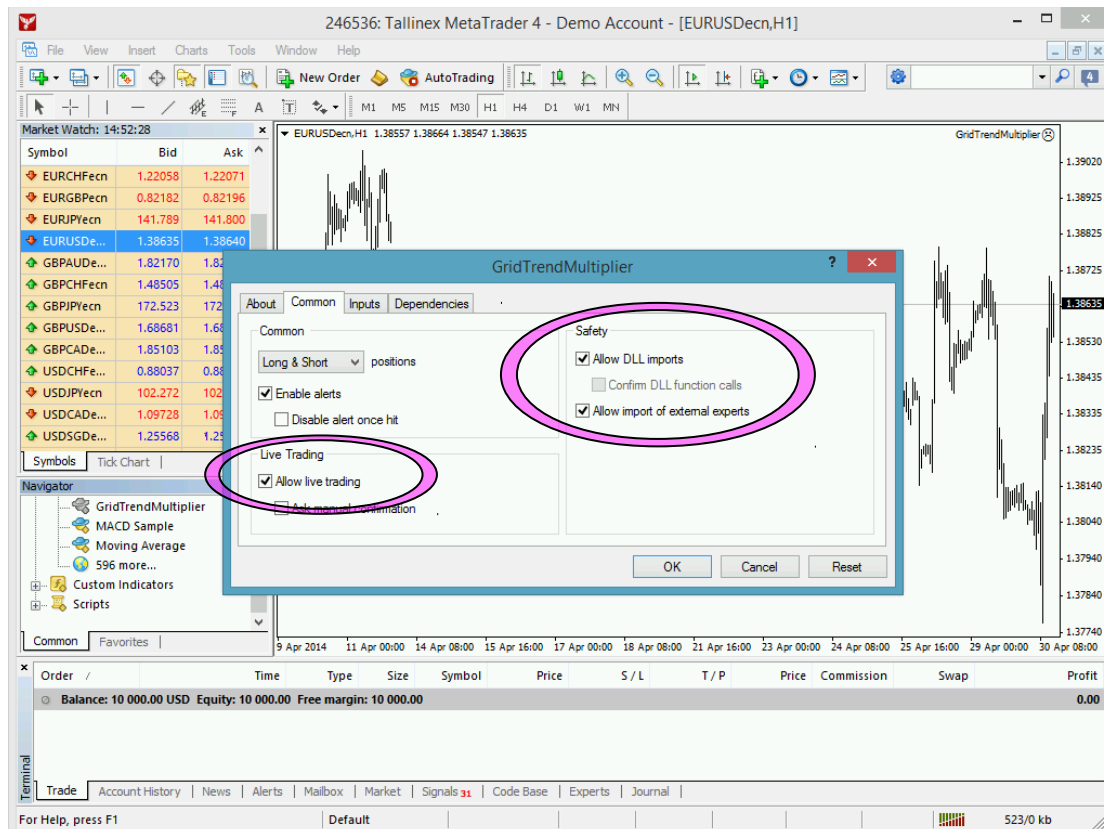


So everything is set up for the first activation of the GridTrendMultiplier Expert Advisor.

## 3 GridTrendMultiplier EA First Time Activation

The following pictures demonstrate the first time activation of the GridTrendMultiplier EA in a few steps.

Drag & drop the GridTrendMultiplier Expert Advisor from the Navigator window (View/Navigator) to a chart window and select the 'Common' tab:



Ensure that the

- 'Allow live trading',
- 'Allow DLL import' and
- 'Allow import of external experts'

are **checked**,

and

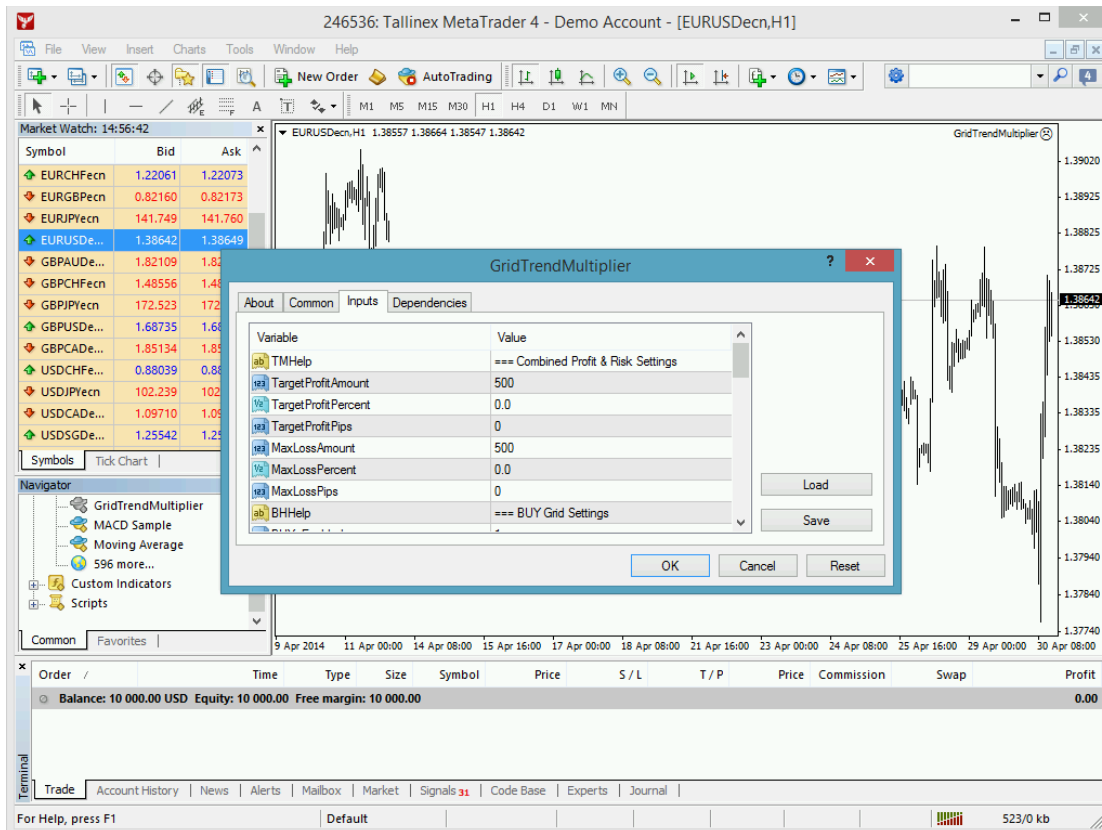
- 'Confirm DLL function calls'

is **unchecked**.

Select the 'Inputs' tab:

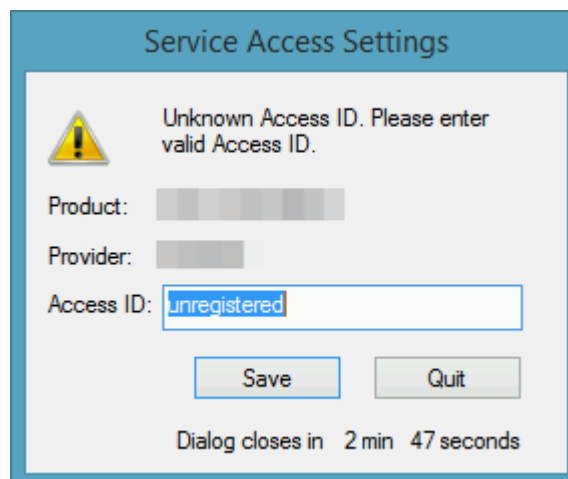
# Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014



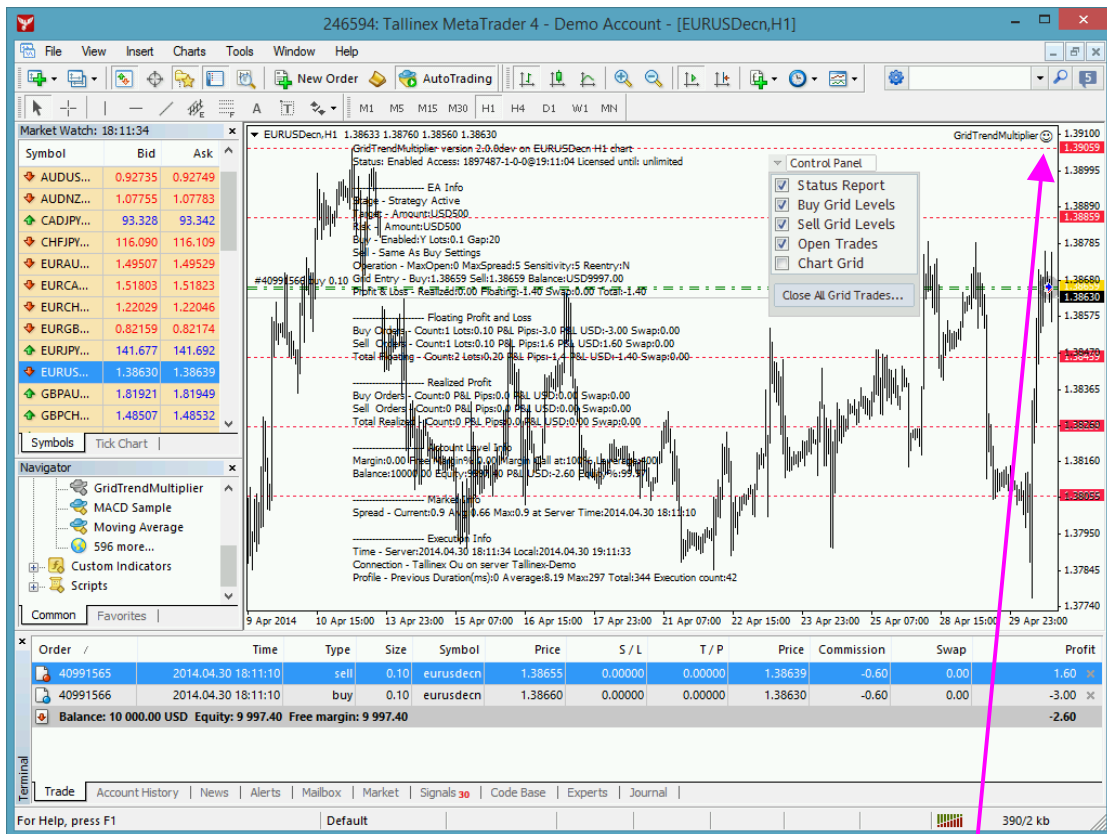
This lists the parameters of the EA where the operational aspect of the GridTrendMultiplier can be set up. For more details see GridTrendMultiplier EA Configuration Guide below - for now click OK and let the EA start up with default settings.

At the very first time the EA may prompt for the Access ID to verify that the usage of product is licensed. The Access ID is pre-configured and is the same as the login name to the web support site. Feel free to change your Access ID at <https://my.eafactory.com/expert4x> and ensure not to share it with anyone else. Enter the Access ID and click 'Save':



# Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014



The GridTrendMultiplier EA has been attached to the chart. The smiley face in the top-right corner shows that the initialisation of the GridTrendMultiplier EA was successful and the EA is now looking for trading opportunities.

See the smiley face in the corner:



In case of a problem getting the expert advisor up and running please refer to the Troubleshooting section below.

## 4 GridTrendMultiplier EA Configuration Guide

In order to activate the GridTrendMultiplier EA attach it to a chart window – for more details see section GridTrendMultiplier EA First Time Activation above.

### 4.1 Configuration and Operation Principles

The GridTrendMultiplier EA manages only those tickets (a.k.a positions) on the account which belong to the GridTrendMultiplier EA: every order submitted to the account is marked with the 'MagicNumber' and, in return, only those tickets on the account will be considered by the GridTrendMultiplier EA which are marked with this 'MagicNumber'.

In general it is recommended to run on an account one EA at a time. This helps understanding the ongoing trades and troubleshoot situation if and when needed. While this maybe feasible for demo accounts this may not be feasible for live accounts where there could be the need to execute multiple expert advisors on the same account at the same time. Using multiple expert advisors on the same account is only viable if each and all expert advisor will follow the above MagicNumber principle and they manage only their own tickets on the account.

**IMPORTANT: If you plan to use multiple expert advisors (other than the GridTrendMultiplier EA) on the same account please ensure upfront with the expert advisor providers that their EA's are suitable for that as per the above.**

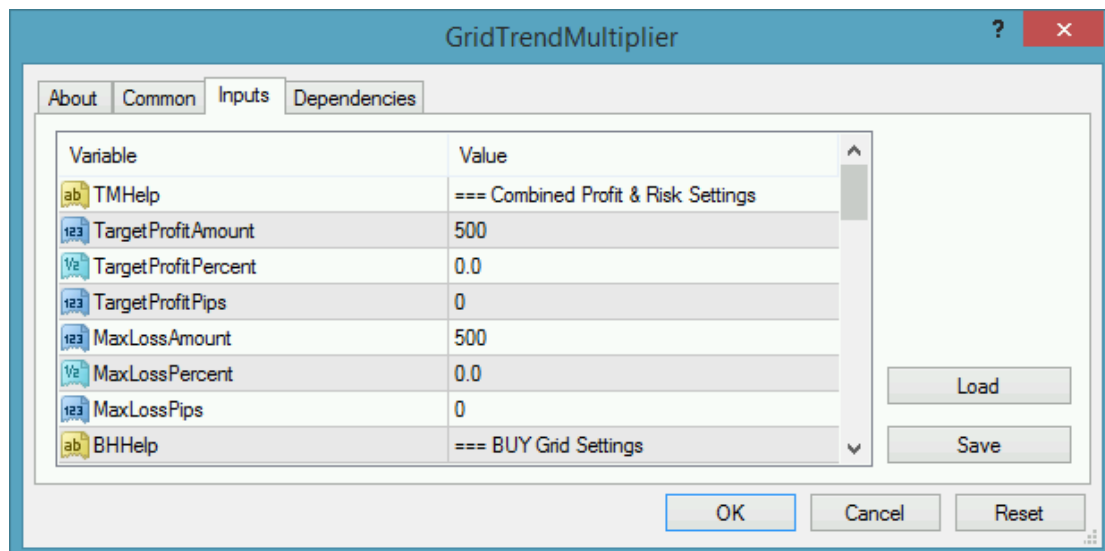
If you plan to use multiple GridTrendMultiplier EA's on the same account at the same time please ensure that the 'MagicNumber' is set to different and unique number for each chart of the same market.

Here are few examples:

Market	MagicNumber
EURUSD chart 1	1000
EURUSD chart 2	1010
EURUSD chart 3	1020
GBPUSD chart 1	2000
GBPUSD chart 2	2010
GBPUSD chart 3	2020
USDCAD single chart	Any or the default
USDCHF single chart	Any or the default

## 4.2 GridTrendMultiplier EA Parameter Descriptions

Below is the description of the GridTrendMultiplier EA parameters.



**TargetProfitAmount** - combined buy and sell profit target as an amount of balance increase by the EA trades. The EA will keep trading the buy and sell grids, cash-in at grid levels, until the overall profit of cashed-in and floating buy and sell trades reaches the value of TargetProfitAmount. When this combined target is reached then all open buy and sell trades get closed off and (if ReentryAllowed is set to true) a new cycle of grid trades is started off.

Example:

- TargetProfitAmount is set to 100
- Account balance is 5000

The EA trades buy and sell grids until the sum of the closed and floating tickets' profit reaches 100.

**TargetProfitPercent** - combined buy and sell profit target as a percentage of balance increase by the EA trades. The EA will keep trading the buy and sell grids, cash-in at grid levels, until the overall profit of cashed-in and floating buy and sell trades reaches the percent growth of account balance. When this combined target is reached then all open buy and sell trades get closed off and (if ReentryAllowed is set to true) a new cycle of grid trades is started off.

Example:

- TargetProfitPercent is set to 2
- Account balance is 5000

The EA trades buy and sell grids until the sum of the closed and floating tickets' profit reaches  $5000 \times 2\% = 100$ .

**TargetProfitPips** - combined buy and sell profit target in pips by the EA trades. The EA will keep trading the buy and sell grids, cash-

## Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014

in at grid levels, until the overall profit of cashed-in and floating buy and sell trades reaches this number of pips. When this combined target is reached then all open buy and sell trades get closed off and (if ReentryAllowed is set to true) a new cycle of grid trades is started off.

Example:

- TargetProfitPips is set to 100

The EA trades buy and sell grids until the sum of the closed and floating tickets' profit reaches 100 pips.

Note: In the case of 5-digit data feed (a.k.a fractional pips) 1 pips is equal to 10 points. The EA expects this input in pips, not in points.

Note: One or multiple of the above targets can be configured at the same time. The EA will track each of them independently and will trigger the close-out when the first target is reached.

**MaxLossAmount** - combined buy and sell maximum loss as an amount of balance decrease by the EA trades. The EA will keep trading the buy and sell grids, cash-in at grid levels, until the overall loss of cashed-in and floating buy and sell trades reaches the value of MaxLossAmount. When this combined loss is reached then all open buy and sell trades get closed off and (if ReentryAllowed is set to true) a new cycle of grid trades is started off.

Example:

- MaxLossAmount is set to 100
- Account balance is 5000

The EA trades buy and sell grids until the sum of the closed and floating tickets' loss reaches 100.

**MaxLossPercent** - combined buy and sell maximum loss as a percentage of balance decrease by the EA trades. The EA will keep trading the buy and sell grids, cash-in at grid levels, until the overall loss of cashed-in and floating buy and sell trades reaches the percent drop of account balance. When this combined loss is reached then all open buy and sell trades get closed off and (if ReentryAllowed is set to true) a new cycle of grid trades is started off.

Example:

- TargetProfitPercent is set to 2
- Account balance is 5000

The EA trades buy and sell grids until the sum of the closed and floating tickets' loss reaches  $5000 \times 2\% = 100$ .

**MaxLossPips** - combined buy and sell maximum loss in pips by the EA trades. The EA will keep trading the buy and sell grids, cash-in at grid levels, until the overall loss of cashed-in and floating buy and sell trades reaches this number of pips. When this combined loss is

## Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014

reached then all open buy and sell trades get closed off and (if ReentryAllowed is set to true) a new cycle of grid trades is started off.

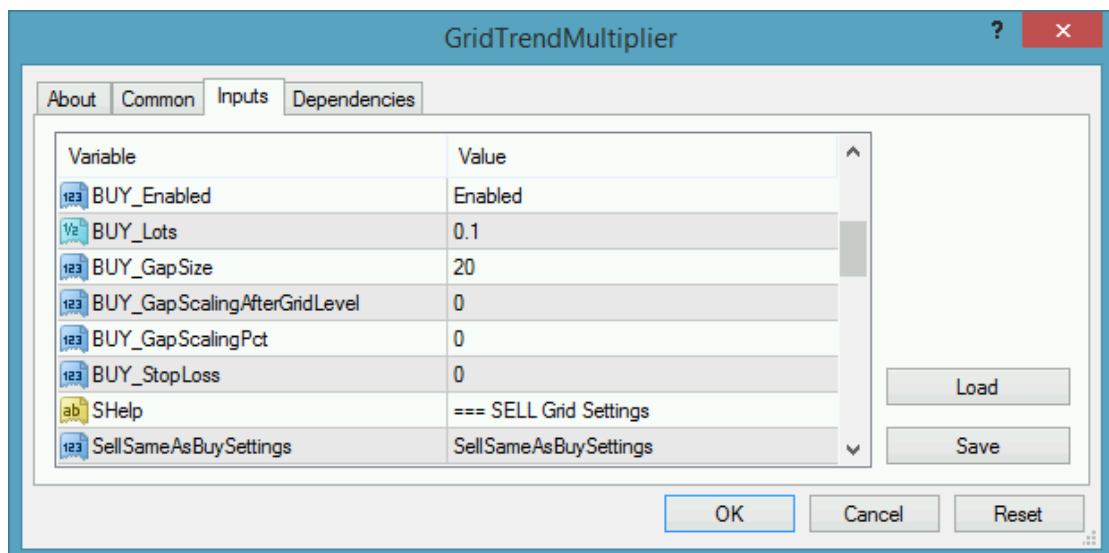
Example:

- TargetProfitPips is set to 100

The EA trades buy and sell grids until the sum of the closed and floating tickets' loss reaches 100 pips.

Note: In the case of 5-digit data feed (a.k.a fractional pips) 1 pips is equal to 10 points. The EA expects this input in pips, not in points.

Note: One or multiple of the above maximum losses can be configured at the same time. The EA will track each of them independently and will trigger the close-out when the first maximum loss is reached.



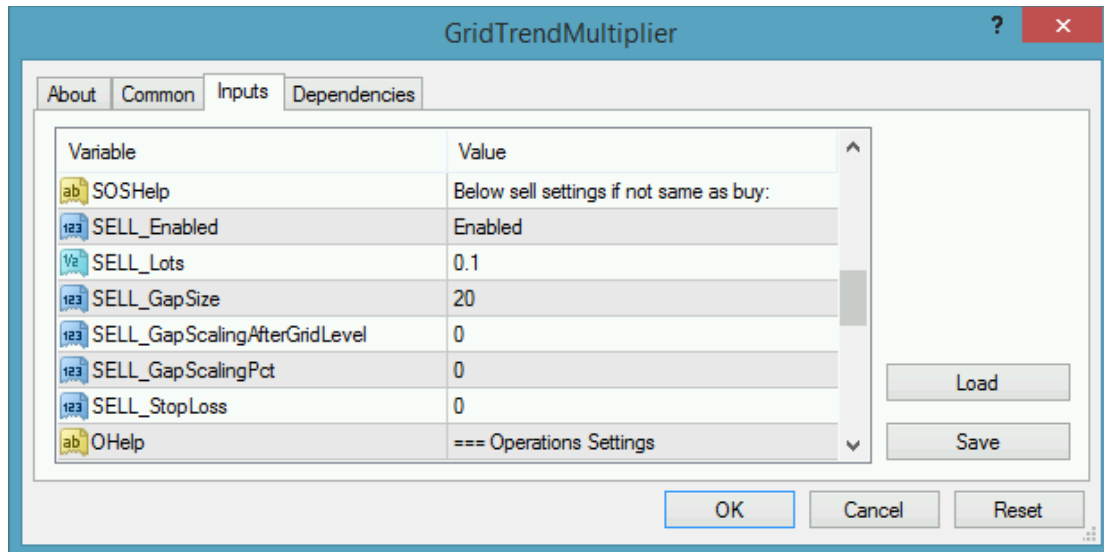
**BUY/SELL\_Enabled** - turns on or off the trade of the grid in the BUY or SELL direction.

**BUY/SELL\_GapSize** - defines the gap between grid levels in pips. The GapSize value should be minimum of 10 pips or more, and no fractional pips should be entered. To avoid confusion the GapSize must always be at least twice of the LevelSensitivity value, or more.



# Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014



**BUY/SELL\_GapScalingAfterGridLevel** - when market price goes against the direction of the grid trades the BUY/SELL\_GapSize is scaled up by the EA for levels specified by the GapScalingAfterGridLevel value. Value zero (0) turns off gap scaling feature of the EA. See below an example at BUY/SELL\_GapScalingPct.

**BUY/SELL\_GapScalingPct** - when market price goes against the direction of the grid trades the BUY/SELL\_GapSize is scaled up by BUY/SELL\_GapScalingPct factor for levels specified by the BUY/SELL\_GapScalingAfterGridLevel value.

Below shows the gaps to be used for a BUY grid trading direction when

- BUY\_GapSize is 80 pips
- BUY\_GapScalingAfterGridLevel is set to 2
- BUY\_GapScalingPct is 50%

Grid Level	Gap Pips
Up 4	80
Up 3	80
Up 2	80
Up 1	80
Start	80
Down 1	80
Down 2	80
Down 3	120
Down 4	180
Down 5	270

**BUY/SELL\_StopLoss** - stop loss in pips for new buy or sell orders. No fractional pip value to be entered, e.g. for 200 pips stop loss this

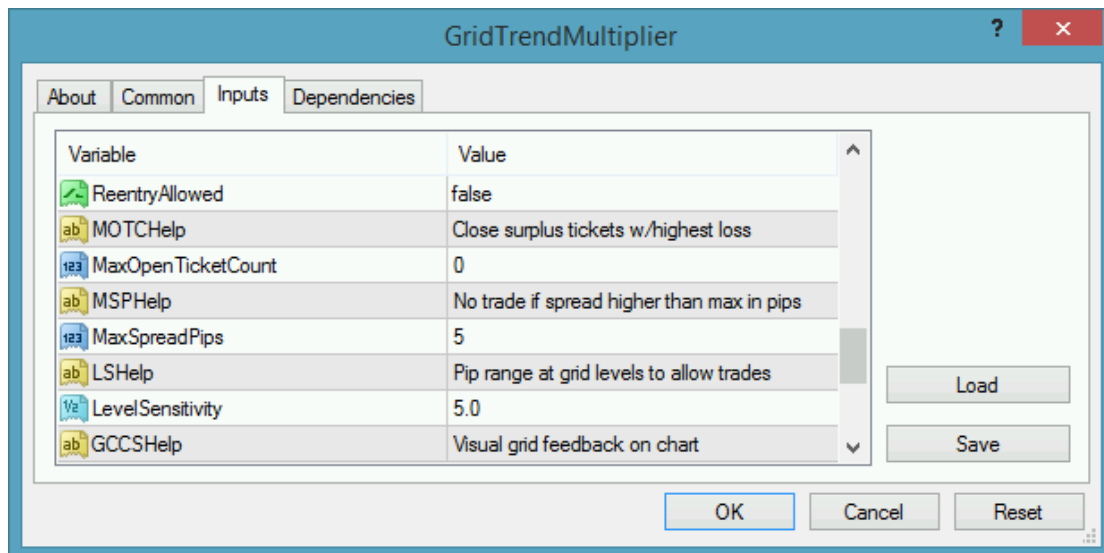
# Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014

parameter value should be set to 200 regardless of 4 or 5-digit broker feed. Value 0 (zero) turns off stop loss for new orders.

Note: this BUY/SELL\_StopLoss facility is provided for safety purposes. Should the connection to the broker go down, or during power outage the server side can have this stop loss set up to limit potential losses until normal EA operation resumes.

**SellSameAsBuySettings** – if sell grid settings should be the same as already configured for buy leg then set this to 'SellSameAsBuySettings'. If the sell grid would have different settings compared to the buy grid then set this to 'SellUseOwnSettings' and use the subsequent SELL\_xxx parameters to configure the sell grid.

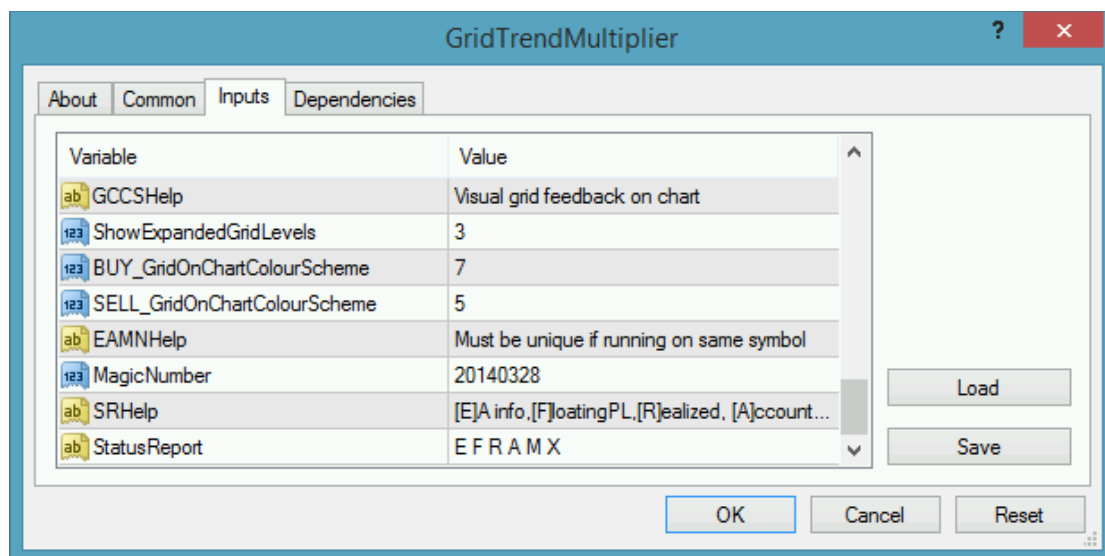


**ReentryAllowed** – the EA performs the buy and sell grid trades until either the combined profit target or maximum losses reached. Upon that the EA closes off all ongoing trades. A new grid trading cycle is started off only if this ReentryAllowed parameter is set to true.

**MaxOpenTicketCount** – when the combined open buy and sell ticket count reaches or exceeds this parameter value the EA will close off the open trade (regardless of buy or sell) with the highest loss at that moment. For long grid trade cycles this feature offers pruning of open orders and limits carry on losses. Set this parameter to 0 (zero) to turn off this feature.

**MaxSpreadPips** – during market periods when the spread goes up beyond this MaxSpreadPips value the EA stops trading activity, i.e. no new order is submitted nor existing order gets closed off. When spread falls below the MaxSpreadPips value the EA resumes trading operations as normal.

**LevelSensitivity** - allocates a pip range at the grid levels the price action must fall within to trigger order management actions. If the price crosses the grid level and falls within this range beyond the level then the EA will close off appropriate open tickets and open new tickets for the level. However if the price crosses the grid level and jumps over the range (e.g. price gapping at news announcements) then the EA will suppress any level specific order actions. This is to avoid unwanted effects of quick price movements that would put the integrity of the grid at risk. Next time when the price crosses the grid level “appropriately” the order management actions will be performed.



**ShowExpandedGridLevels** - the number of grid levels to be displayed on the chart above and below the current active grid levels. Controls how many grid levels get visualized on the chart marking future trade activities.

**BUY/SELL\_GridOnChartColourScheme** - offers various grid level visualization profiles on the chart in terms of colours to be used for grid levels. Value zero (0) turns off grid visualization on the chart, other value in the range of 1 to 7 provides different colour scheme for the grid levels.

**MagicNumber** - ensure this parameter gets a unique value on each chart the GridTrendMultiplier EA gets attached to, i.e. GridTrendMultiplier EA on different EURUSD charts shall have different MagicNumber values. See section 4.1 for more explanation and setup examples.

**StatusReport** - controls the status information displayed on the chart. Each section of the status report is represented by a single character and the StatusReport value lists the characters of the

## Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014

desired sections to be displayed on the chart. Space character on the list represents a separator between the sections. The list of sections and their single character representation is as follows:

<b>Single Character</b>	<b>Section Displayed</b>
E	EA Info
F	Floating Profit & Loss
R	Realized Profit & Loss
A	Account Info
M	Market Info
X	Execution Info
' '	Separator

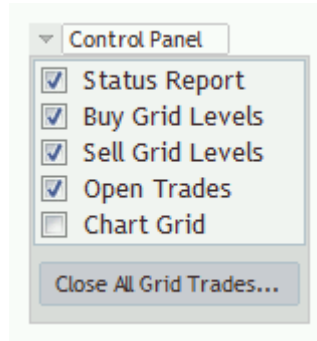
In order to display a full status on the chart the StatusReport should be set to "E F R A M X".

To reduce the status on the chart only to the EA Info the StatusReport should be set to "E".

The order of the characters in the list determines the order of the sections to be displayed. Showing market info first followed by EA Info and then Account Info the StatusReport should be set to "M E A".

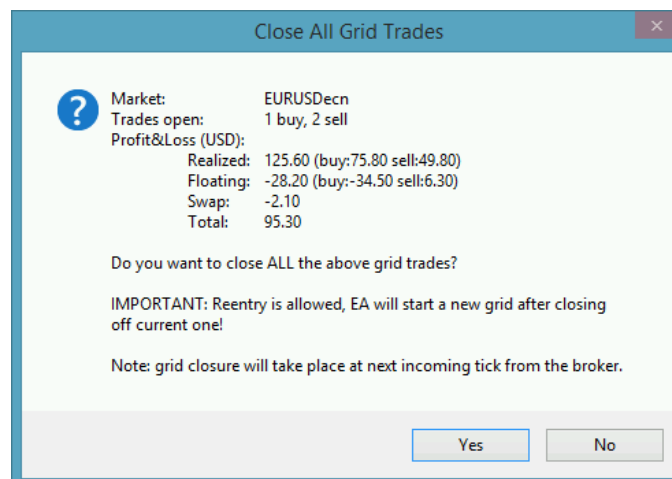
## 5 Control Panel

The Control Panel offers quick and easy access to features often or commonly used during EA operations.



Control Panel operations:

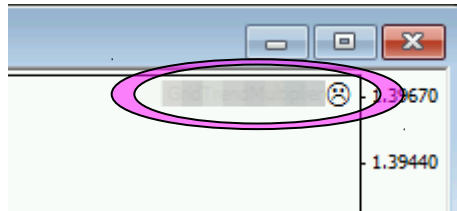
1. Roll-up/down Control Panel body: click the triangle at the top
2. Move Control Panel: drag the heading 'Control Panel' with mouse
3. Show/hide on-chart EA status report: click the 'Status Report' checkbox
4. Show/hide grid levels for buy grid: click the 'Buy Grid Levels' checkbox
5. Show/hide grid levels for the sell grid: click the 'Sell Grid Levels' checkbox
6. Show/hide lines representing open tickets on chart: click the 'OpenTrades' checkbox
7. Show/hide chart grid lines: click the 'Chart Grid' checkbox
8. Manually trigger closure of all open buy and sell grid trades: click the 'Close All Grid Trades...' button. A confirmation window appears with summary information, click Yes to execute closure at next incoming tick from the broker:



## 6 Troubleshooting

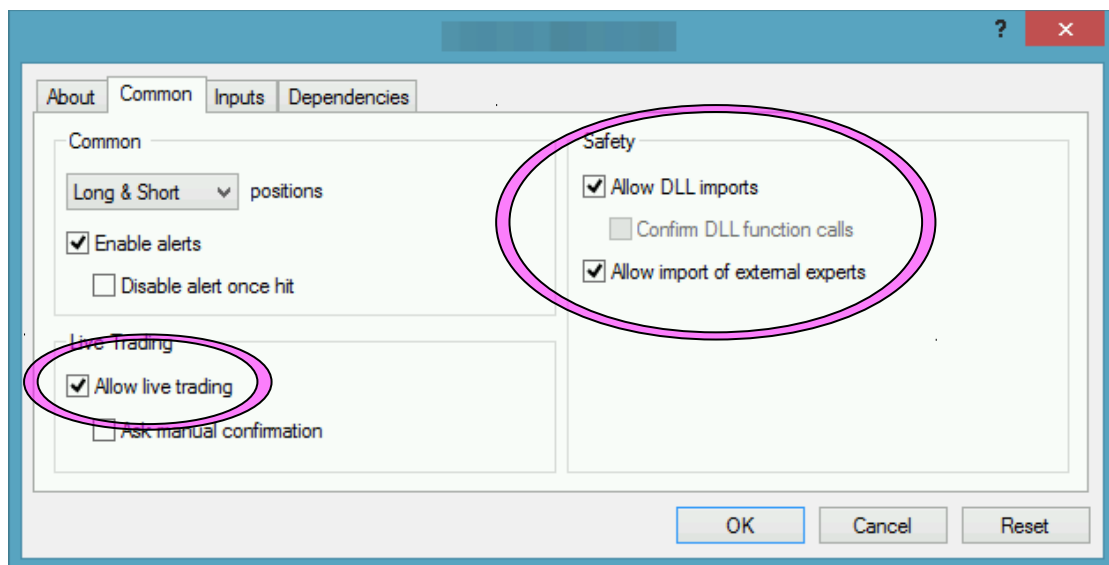
### 6.1 Sad Face Instead of Smiley After Attach

Issue: After attaching to chart the EA is not managing trades, a 'sad' face appears in the top right corner of the chart.



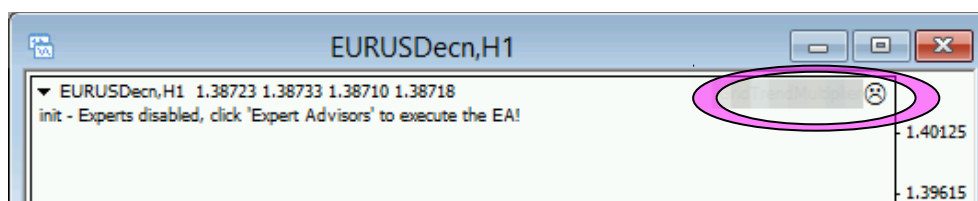
Checklist:

- Verify that the 'Allow live trading', 'Allow DLL imports' and 'Allow import of external experts' are checked and 'Confirm DLL function calls' is unchecked in the EA property dialog (F7).



### 6.2 EA Is Not Starting Up After Attach to Chart

Issue: The GridTrendMultiplier EA reports successful initialisation and advises about disabled Expert Advisors.



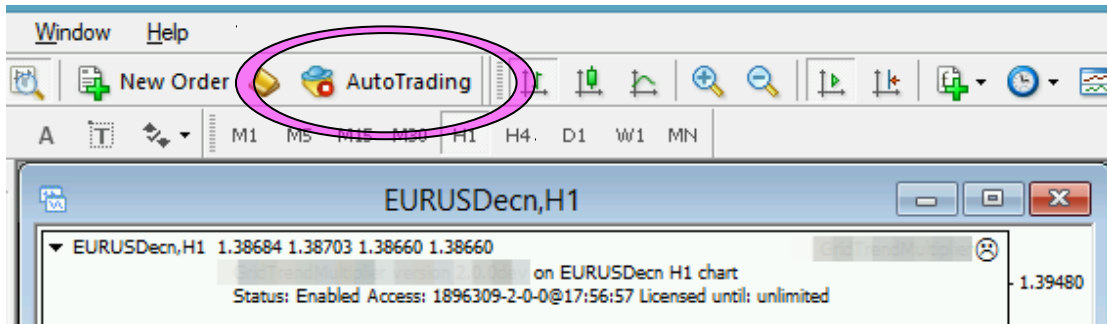
# Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014

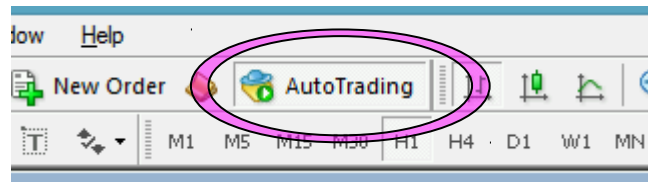
Checklist:

- Verify that the toolbar button 'AutoTrading' is pressed.

Toolbar button when Expert Advisors disabled:



Click to enable:

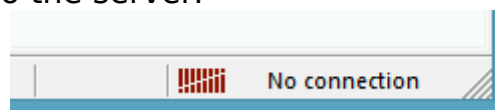


## 6.3 No Updates to Chart

Issue: The GridTrendMultiplier EA does not update information on the chart for several minutes.

Checklist:

- MetaTrader should be connected to the broker's server. Check the bottom right corner of MetaTrader, this is when it has lost connection to the server:

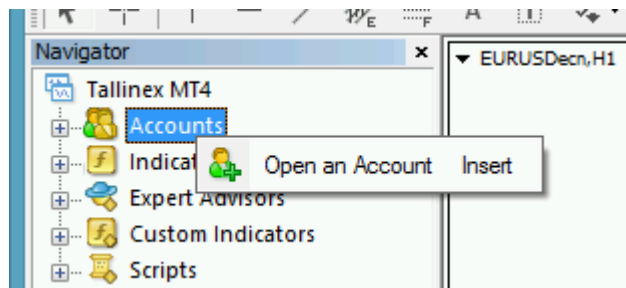


If connection is lost then login again or restart MT to force reconnection. Try again activating the GridTrendMultiplier EA when connection is back.

- MT4 will not be able to connect to the demo account if it's expired. In this case MT4 will keep asking for the login details and fail all login attempt. When this happens open a new demo account (right click Accounts in Navigator window and select 'Open an Account').

## Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014

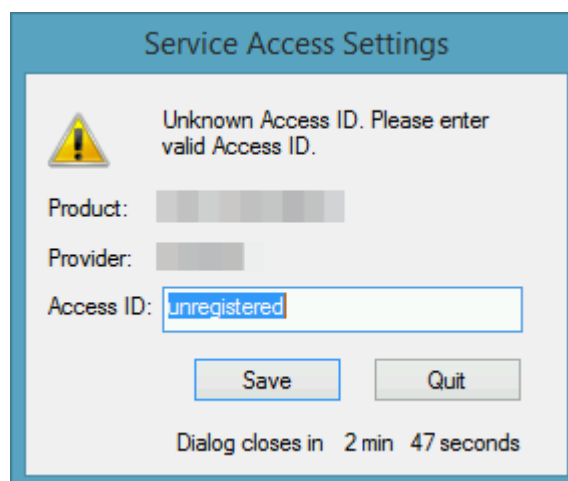


- New tick information and updates to chart happens when markets are open. Double check that markets are meant to be open currently.
- There should be at least 50MB free disk space available on the drive MetaTrader is installed on. If the free disk space is lower then free up space.

### 6.4 Access ID at Service Access Settings

The GridTrendMultiplier EA checks that the usage of product is appropriately licensed. After product purchase a user profile is created on our web support site and the product can be downloaded from that web site. The support site allows to set up an Access ID which is required by the EA to validate the product licence. By default this Access ID is configured to be the same as your selected login name to the web support site.

When prompted, please enter your Access ID to the window and click 'Save':



Please do not share out to others your Access ID. That is against the licence agreement terms and conditions and also all 3<sup>rd</sup> party usages will count when checking the number of EA copies being used. Sharing out your Access ID can result in licence check failure and the EA may stop functioning.



# Expert4x:- GridTrendMultiplier Expert Advisor Users Guide

April 30, 2014

Keep your Access ID secure, change it away from the its default value at any time on the web support site at:

<https://my.eafactory.com/expert4x>

## **7 Support**

Please contact [easupport@expert4x.com](mailto:easupport@expert4x.com) if you require any further assistance. Please copy [info@expert4x.com](mailto:info@expert4x.com) on your email.