

**Success Trade Securities
Trading API
Version 1.1**

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Please register with Success Trade Securities in order to receive updates of the documentation.

Table of Contents

Introduction.....	3
Getting Support.....	3
Program Testing.....	3
Description of a Typical Trading Session.....	4
Important Notes:	4
Message Format	4
Connecting To The Authentication Server	5
Client Request.....	5
Server Response.....	5
Connecting to The Trade Server	6
Client Request.....	6
Server Response.....	6
Messages From The Client to the Trade Server.....	8
New Order.....	8
Cancel Order	8
Heartbeat Request	8
Messages From The Trade Server to the Client.....	8
New Order Accepted.....	9
New Order Rejected.....	9
Order Execution	9
Acceptance of Cancel Request.....	9
Cancel Order Rejected	9
Order Cancel Confirmation.....	10
Balance Update	10
Position Update.....	10
Heartbeat Response.....	10
Appendix 1 - Tag Reference	12
Appendix 2 – Change Log	15

Introduction

This document presents a reference for connecting to and sending trades to the Success Trade Securities API server. This server services individual clients who already have funded accounts with any of Success Trade subsidiary brokerage firms (Success Trade, Lowtrades, or Just2Trade).

The audience for this document are customers who have a knowledge of computer programming and wish to create their own trading interface. The api provides these customers a venue through which to execute the trades. A knowledge of programming with sockets is assumed.

Note that there are no quote services provided through this api.

The Success Trade API is based on a subset of the FIX messaging protocol. Additional tags have been defined to accommodate trading within the Success Trade environment. A full explanation of the FIX protocol can be found at www.fixprotocol.org.

NOTE: This API is only a subset of the FIX protocol. 3rd party FIX processing engines are not supported, since the SuccessTrade API does not require Administrative messages and the normal required headers of the FIX protocol.

Getting Support

Support is available via email only at apisupport@just2trade.com. We attempt to provide 24 hour turnaround on email support requests.

Please make your questions as specific as possible when emailing for support. This will allow us to answer your questions in the shortest possible timeframe.

Program Testing

A test server is located at ip address : 64.34.242.18
Port: 23005

To arrange for an account for testing your programs, please contact Success Trade.

Description of a Typical Trading Session

In a typical trading session, the flow of information follows the following pattern:

1. Client connects to authentication server. This server verifies that the client is allowed to use the api and is a valid account holder. If both conditions are met, the server sends back an authentication confirmation, including a session key and further information about the ip and port to connect to the actual trade server.
2. Client logs in to the trade server at the ip and port returned in (1) . At login, the trade server will respond with information about the client's account, including current positions and buying power as well as currently open orders. Also returned will be a summary of completed trades (both executed and cancelled) for the current day.
3. While logged in, the client sends order or order cancellation requests to the server. All message requests must be accompanied by the session key provided to the client in (1) The server sends back order or cancel confirmations, or execution or cancellation reports to the client. Order execution or cancellation reports are accompanied by update messages that update the client's buying power and positions held.
4. Client disconnects when finished trading.

Important Notes:

Orders remain open if the client disconnects. All orders must be cancelled by specific cancellation request messages sent to the server, except day orders, which of course will expire at the end of the day's trading.

Only one login per client to the API is allowed. Multiple logins by the same client are not permitted.

If your program disconnects from the trading server at any time, you will be required to obtain a new server key by re-authenticating with the authentication server.

Message Format

The general format of messages between client and server consists of a series of tag-value sets in the following format:

<SOH>tag=value

Where <SOH> is the start of header character (0x01)

The end of message is denoted by the <EOT> character (0x04)

Thus, a full message is formatted as follows:

<SOH>tag=value<SOH>tag=value....<SOH>tag=value<SOH>tag=value<EOT>

The tags which are to be used depend on the particular message being sent. Appendix 1 presents a list of all tags supported by the API.

Messages are not encrypted.

In this documentation, values which are user specific are shown in bold italic.

Definitions of special characters used in the API

<SOH>	char 0x01	start of header
<EOT>	char 0x04	end of transmission

Connecting To The Authentication Server

Client Request

To connect to the API, the client first sends a connection request to the authentication server. The message should be formatted as follows:

<SOH>35=A<SOH>50=***loginid***<SOH>96=***password***<SOH>76=***brokerageid***<EOT>

Where loginid and password are the login id and password used to log in to your trading account.

Brokerageid is a 4 letter code identifying the firm your trading account is held with. See Appendix 1 for possible values.

SuccessTrade will provide ip and port information for connecting to the authentication server.

Server Response

On a successful login, the server will respond with:

<SOH>35=A<SOH>926=status <SOH>11999=serverkey<SOH>12000=trade server ip<SOH>12001=trade server port<SOH>12002=backup trade server ip<SOH>12003=backup trade server port<EOT>

Note tags 12002 and 12003 are optional, depending on the state of state of the system at the time the login is attempted.

Tag 926 indicates status of the login attempt. See Appendix 1 for possible values.

Connecting to The Trade Server

Once the client is validated on the authentication server, it may now connect to the actual trade server. Note that if you disconnect at any time during your session, you will need to re-login through the authentication server to get a new server key.

Client Request

<SOH>35=A<SOH>11999=serverkey<SOH>50=loginid<SOH>76=brokerageid<EOT>

Server Response

On success the server will respond as follows:

First, a login confirmation will be sent as follows:

<SOH>35=A<SOH>926=1<SOH>58=LOGIN SUCCESS<EOT>

The server will then send a list of trading destinations that are available to this client:

<SOH>35=dr<SOH>13000=ISLD;ARCA;DEFAULT;DOMS;<EOT>

Next the server will send balance and position information for all accounts held by that client. The account balance information (one for each account) message will be sent back as follows:

<SOH>35=br<SOH>1=account<SOH>13002=cashtradebalance<SOH>13003=margint radebalance<EOT>

One position report message will be sent back for each position held by the user.

```
<SOH>35=yr<SOH>1=account<SOH>55=symbol<SOH>38=quantity<SOH>31=price<SOH>167=securitytype<SOH>13001=accounttype<EOT>
```

Finally, the server will send a summary of all completed trades for the current day, as well as all open orders for all accounts held by the client. Note that the trade summaries only show aggregated totals for positions bought and sold and prices. That is, if an order was executed in more than one fill, only the total quantity executed and average price of all executions will be shown.

Example:

Client requested one trade, a buy of 100 shares of DELL. The trade was executed and the 100 shares were filled at a price of 10.49 each.

```
<SOH>35=8<SOH>1=77777777<SOH>11=AABF8494<SOH>38=100<SOH>31=10.49<SOH>39=2<SOH>14=100<SOH>13001=1<SOH>55=DELL<SOH>60=2007-01-15 12:22:06<SOH>40=2<SOH>44=10.49<SOH>54=1<SOH>59=1<EOT>
```

Explanation of fields:

35=8	message type is execution report
1=77777777	account
11=AABF8494	sequence code of order
38=100	original quantity requested
31=10.49	average fill price
39=2	status of order
14=100	total number of shares executed for this order
13001=1	account type
55=DELL	stock symbol
60=2007-01-15 12:22:06	time of execution. In the case of multiple fills, this field shows the last(most recent) fill
40=2	order type was a limit
44=price	limit price specified by the client
54=1	side of order
59=1	time in force for order

The client is now fully logged in and able to send additional requests to the server.

Messages From The Client to the Trade Server

New Order

```
<SOH>35=D<SOH>11999=serverkey<SOH>1=account<SOH>76=brokercode<SOH>55=symbol<SOH>44=limitprice<SOH>54=side<SOH>38=qty<SOH>40=ordertype<SOH>59=tif<SOH>13001=accounttype<SOH>99=stopprice<SOH>100=destination<EOT>
```

Note :

Field 99 is only required for a stop or stop-limit order

Example:

```
<SOH>35=D<SOH>11999=key152367<SOH>1=99999999<SOH>76=STSS<SOH>55=DELL<SOH>40=2<SOH>44=10.49<SOH>54=1<SOH>38=100<SOH>59=0<SOH>100=DEFAULT<SOH>13001=1<EOT>
```

Cancel Order

```
<SOH>35=F<SOH>41=orderid<SOH>11999=serverkey<EOT>
```

Note: tag 41 contains the unique order identifier assigned by the API server. This instruction will be a request to cancel all remaining unfilled shares of the order. There is no support for partial cancels.

Heartbeat Request

```
<SOH>35=0<SOH>11999=API200885131519<SOH>1=account<EOT>
```

Messages From The Trade Server to the Client

New Order Accepted

<SOH>35=8<SOH>11=*orderid*<SOH>1=*account*<SOH>39=0<SOH>76=*brokerageid*<SOH>55=*symbol*<SOH>40=*ordertype*<SOH>54=*side*<SOH>44=*limitprice*<SOH>38=*quantity*<SOH>59=*tif*<SOH>99=*stopprice*<SOH>59=*timeinforce*<EOT>

Tag 39 denotes the status of the order.

Example

<SOH>35=8<SOH>1=99999999<SOH>11=AAAA4463<SOH>44=10.49<SOH>40=2<SOH>54=1<SOH>55=DELL<SOH>59=0<SOH>38=100<SOH>100=DEFAULT<SOH>>60=2007-11-21 09:46:23<SOH>39=A<EOT>

New Order Rejected

A new order request could be rejected if the system does not allow the trade to be placed. Possible reasons for the rejection are (but not limited to) the following:

- the cost of the trade would exceed the available buying power in the account
- the user does not own sufficient positions in the stock to sell
- a particular security is halted from trading
- the destination chosen does not accept the order parameters that have been specified.

Field 58 will normally contain a text description of the reason for rejection of the order.

Order Execution

<SOH>35=8<SOH>1=99999999<SOH>11=AAALE4400<SOH>44=34.9<SOH>55=PBI<SOH>59=0<SOH>40=2<SOH>54=5<SOH>38=1000<SOH>100=CGMI<SOH>32=200<SOH>31=34.93<SOH>60=2008-08-05 13:19:02<SOH>14=1000<SOH>12=2<SOH>39=2<EOT>

Acceptance of Cancel Request

<SOH>35=8<SOH>11=*orderid*<SOH>1=*account*<SOH>39=6<SOH>76=*brokerageid*<SOH>55=*symbol*<SOH>40=*type*<SOH>54=*side*<SOH>38=*quantity*<SOH>59=*tif*<SOH>>99=*stopprice*<EOT>

Cancel Order Rejected

A request to cancel an order may be rejected. Examples of situations where this may occur are (but are not limited to) the following:

- the order has been filled and it is too late to cancel
- the connectivity to the market where the order was sent has been lost due to technical reasons and the cancel request can not be forwarded on.

If you receive one of these cancel reject messages when attempting to cancel an order, we strongly advise that you contact Success Trade by telephone to get clarification on the status of the order.

Order Cancel Confirmation

```
<SOH>35=8<SOH>11=orderid<SOH>1=account<SOH>39=4<SOH>76=brokerageid<SOH>55=symbol<SOH>40=type<SOH>54=side<SOH>38=quantity<SOH>59=tif<SOH>99=stopprice<SOH>14=qtyexec<EOT>
```

Balance Update

Balance updates are sent at login. As well, the trade server will send a balance update after each trade execution.

```
<SOH>35=br<SOH>1=account<SOH>13002=100000<SOH>13003=200000<EOT>
```

Position Update

Position updates are sent at login. As well, the trade server will send a position update after each trade execution. This is the actual positions held by the user, not including open sell orders.

```
<SOH>35=yr<SOH>1=99999999<SOH>55=PBI<SOH>38=-1000.000000<SOH>31=34.930000<SOH>167=1<SOH>13001=3<EOT>
```

Heartbeat Response

<SOH>35=0<SOH>11999=API200885131519<SOH>1=999999999<SOH>52=2008-08-05-13:17:14<EOT>

Appendix 1 - Tag Reference

The following table lists all tags supported by the API. The use of each tag is described in the appropriate section earlier in the document. Also refer to the appropriate section to determine if the tag is mandatory in the message being sent.

Tag	Description		Possible Values
1	Account Number		
11	Order id		Always in the form: AAAANNNN Example: AABF2912
12	Commission		This is a decimal number representing the commission for the order (not including Exchange, ECN or SEC fees)
14	Total quantity of shares executed for the order		
31	Price of last fill. Note in a position update message, this field will be the average price paid for all holdings in this security. At login, this will indicate the average price paid for the number of shares executed so far		
32	Number of shares in last fill		
35	Message type	Y	To server: A = logon request D = new order request F = order cancel request O = heartbeat From server: A = logon response

			0 = heartbeat 3 = order reject 8 = Execution Report 9 = Order Cancel Reject dr = trading destinations report yr = position report br = account report
38	Quantity		Quantity must be greater than 0.
39	Order status		A = pending new 0 = new 1 = partially filled 2 = filled 4 = cancelled 6 = pending cancel 8 = order rejected
40	Order type		1 = market 2 = limit 3 = stop 4 = stop-limit
41	Reference order id		Used to reference orders when a cancel is requested. Same format as tag 11
44	Price		Limit price of order
50	Client login ID. This is the login id used to login to your trading account		
54	Side of order		1 = buy 2 = sell 5 = sell short BC = buy to cover
55	Symbol		
58	Text field		Depends on message type. Free form text.
59	Time in force		0 = good for day

			1 = Good til Cancel 5 = Day+Extended Hours
60	Transaction time		Will always be in the format yyyy-mm-dd hh:mm:ss note time is Eastern time. Transaction specified depends on message
76	Brokerage ID		STSS - for Lowtrades STJT - for Just2Trade TEST - for test server
96	User supplied data		Depends on message type
99	Stop price		
100	Destination for order		Valid value is any one of the destinations returned to the client at login in tag 13000
167	Security type		1 = stock 2 = option
926	User status		1 = Logged In 2 = Not Logged In 3 = No such user 4 = Password Incorrect
11999	Server id key		Returned by the authentication server at successful login. Note this key must be used by the client when connecting to the trade server and when placing trades.
12000	IP Address of primary trade server		
12001	Trading port for connecting to primary trade server		
12002	IP Address of backup		

	trade server		
12003	Trading port on backup trade server		
13000	Order routes that are available to this client		Sent by the server to the client
13001	Account type		1 = cash 2 = margin 3 = short
13002	Cash trade balance		
13003	Margin trade balance		

Appendix 2 – Change Log

Date	Description
Feb 23, 2007	Corrected/added miscellaneous message examples for tags 40 and 44. Also clarified message originator in message types.
Mar 1, 2007	Added documentation for order statuses for A (pending new), 8 (order rejected)
Mar 10, 2007	Added tag 12 (commission amount)
Aug 10, 2007	Added GTC processing. Added documentation for tag 32. Added Day+Ext time in force processing
Oct 10, 2007	Clarified field 31 for a trade message sent back at login
Nov 13, 2007	Version 1.0 final
Nov 14, 2007	Added documentation for order rejects and cancel rejects
Nov 19, 2007	Added additional details to message examples
June 30, 2008	Added market sell and market buy to cover
Aug 4, 2008	Added additional message samples
Aug 13, 2008	Textual content added for connecting to trade server
Aug 14, 2008	Added disclaimer for not supporting 3 rd party FIX engines