EPO - Munich
36

13. Jan. 2006

Notice of Opposition to a European Patent

To the
European Patent Office

Tabulation marks

for EPO use only

I. Patent opposed

Zur Kasse
U 6610r

	Opp. No.	OPPO (1)
Patent No.	EP 1,319,211B1	
Application No.	01920183.9	
Date of mention of the grant in the European Patent Bulletin (Art. 97(4), 99(1) EPC)	13 April 2005	

Title of the invention:

Click Based Trading with Intuitive Grid Display of Market Depth

II. Proprietor of the Patent first named in the patent specification

Trading Technologies International, Inc

Opponent's or representative's reference (max. 15 spaces) | OREF

III. Opponent OPPO (2)

Name Address	Eccoware Limited One America Square London EC3N 2LS
State of residence or of principal place of business	United Kingdom
Telephone/Telex/Fax	
Multiple opponents	☐ further opponents see additional sheet

IV. Authorisation

1. Representative (Name only one representative to whom notification is to be made) Name Address of place of business	OPPO (9) Perkins, David Charles Langrigge Milbank, Tweed, Hadley & McCLoy LLP Dashwood House 69 Old Broad Street London EC2M 1QS United Kingdom
Telephone/Telex/Fax	+44 207 448 3000 / +44 207 448 3029
Additional representative(s)	☐ (on additional sheet/see authorisation) OPPO (5)
2. Employee(s) of the opponent authorised for these opposition proceedings under Art. 133(3) EPC	Name(s):
Authorisation(s) To 1./2.	☐ not considered necessary ☐ has/have been registered under No. ☒ is/are enclosed

EPO Form 2300.1 04.93 (int. ad. 12/97)

for EPO use only

V. Opposition is filed against

— the patent as a whole [X]

— claim(s) No(s).

VI. Grounds for opposition:

Opposition is based on the following grounds:

(a) the subject-matter of the European patent opposed is not patentable (Art. 100(a) EPC) because:

— it is not new (Art. 52(1); 54 EPC) [X]

— it does not involve an inventive step (Art. 52(1); 56 EPC) [X]

— patentability is excluded on other grounds, i. e. Art. 52(2)(c) and (d) [X]

(b) the patent opposed does not disclose the invention in a manner sufficiently clear and complete for it to be carried out by a person skilled in the art (Art. 100(b) EPC; see Art. 83 EPC). [ ]

(c) the subject-matter of the patent opposed extends beyond the content of the application/ of the earlier application as filed (Art. 100(c) EPC, see Art. 123(2) EPC). [X]

VII. Facts and arguments

(Rule 55(c) EPC)
presented in support of the opposition are submitted herewith on a separate sheet (annex 1) [X]

VIII. Other requests:

IX. Evidence presented

Enclosed = [X]

will be filed at a later date = [ ]

for EPO use only

A. **Publications:** — Publication date

1

Particular relevance (page, column, line, fig.):

2

Particular relevance (page, column, line, fig.):

3

Particular relevance (page, column, line, fig.):

4

Particular relevance (page, column, line, fig.):

5

Particular relevance (page, column, line, fig.):

6

Particular relevance (page, column, line, fig.):

7

Particular relevance (page, column, line, fig.):

Continued on additional sheet [ ]

B. **Other evidence**

Continued on additional sheet [ ]

X. Payment of the opposition fee is made — for EPO use only

- ☐ as indicated in the enclosed voucher for payment of fees and costs (EPO Form 1010)
- ☒ Already paid (see enclosed bank transfer form)

XI. List of documents

Enclosure No.		No. of copies	
0	☒ Form for notice of opposition	2 (min. 2)	
1	☒ Facts and arguments (see VII.)	2 (min. 2)	
2	Copies of documents presented as evidence (see IX.)		
2a	☒ — Publications	2 (min. 2 of each)	
2b	☐ — Other documents	(min. 2 of each)	
3	☒ Signed authorisation(s) (see IV.)		
4	☐ Voucher for payment of fees and costs (see X.)		
5	☐ Cheque		
6	☐ Additional sheet(s)	(min. 2 of each)	
7	☒ Other (please specify here): Additional representatives		

XII. Signature of opponent or representative

Place London, UK

Date 13 January 2006

Perkins, David Charles Langrigge
Solicitor of the Supreme Court of England and Wales (Reg. No. 155960)
Authorised Representative of the Opponent

Please type name under signature. In the case of legal persons, the position which the person signing holds within the company should also be typed.

EPO Form 2300.4 04.93 (int. ed. 12/97)

4

European Patent No. 1,319,211 B1 (Trading Technologies International, Inc.)

Opposition thereto by Eccoware Limited

GROUNDS OF OPPOSITION

I. Request

The Opponent requests that the Patent is revoked in full. In the event that the Opposition Division is not prepared to revoke the Patent in its entirety, oral proceedings under Art 116 EPC are requested.

II. Grounds For Opposition

This Opposition is made on the following grounds:

- Art 100(c) EPC (added subject-matter); and
- Art 100(a) EPC (non-patentable subject-matter, including Art 52(2)(c) and (d); Art 54; and Art 56 EPC

III. The Opposed Patent

III.1 The invention claimed is directed to the electronic trading of commodities [0001] and is said to overcome drawbacks in the existing trading systems and to dramatically reduce the time it takes for a trader to place a trade when electronically trading on an exchange [0010].

III.2 The claims are directed to

- A device for receiving commands relating to a commodity being traded on an electronic exchange (claims 1 to 28);
- A method of operating such a device (claims 29 to 52); and
- A computer program product with program code adapted for execution of the claimed method (claim 53).

III.3 The commercial embodiment of the claimed invention is the "Mercury" display and trading method [0013]. Specifically the Patent is directed to a graphical user interface ["GUI"] for displaying the market depth of the commodity being traded, including a plurality of bids and a plurality of asks along with their corresponding prices [0014].

IV. Claims of the Opposed Patent

IV.1 ***Claim*** 29 claims

> "A method of operating a client device (110 – 116) for receiving commands relating to a commodity to be traded on an electronic exchange (101 – 103)..."

IV.2 The method comprises six features which will be referred to herein by the letters (a) to (f):

(a) receiving data relating to said commodity from the electronic exchange, the data comprising a current highest bid price and a current lowest ask price (1020, 1101) available for said commodity;

(b) setting a trade order parameter;

(c) displaying a first indicator at a first area aligned with a first price level in a field of static prices (1005, 1203), the first indicator being associated with the current highest bid price for said commodity;

(d) displaying a second indicator at a second area aligned with a second price level in the field of static prices, the second indicator being associated with the current lowest ask price for the commodity;

(e) displaying an order entry region (1003, 1004, 1201, 1202) comprising a plurality of areas, each area being aligned with a price level in the field of static prices and each area being selectable by a user input means so as to receive a command to send an order message based on the trade order parameter and the price level that is aligned with the selected area to the electronic exchange and

(f) updating the display of the first and second indicators such that at least one of the first and second indicators is moved relative to the field of static prices to a different area aligned with a different price level within the field of static prices in response to the receipt of new data representing a different current highest bid price and/or current lowest ask price of the commodity.

IV.3 ***Claim*** 1 is directed to a device for use in the method of claim 29 which recites the "means" features using language that tracks claim 29 very closely. However, the order of the features directed to the "order entry region" and "updating the display" are reversed.

IV.4 The Opponent has taken the approach of presenting its Grounds of Opposition primarily in the context of claim 29, because the documents relied upon (in the case of D1 and D2) are essentially manuals which are directed to the *use* of systems, rather than the physical means of implementation. Whereas this simplifies the analysis, it does not detract from the conclusions to be drawn with respect to the apparatus claims.

V. Priority

V.1 In considering patentable subject-matter, it is noted that the Patent claims two separate priority dates. These are:

- 2 March, 2000 from US Provisional Application 186322 P ["Priority 1"]; and
- 9 June, 2000 from US Application 590692 ["Priority 2"]

V.2 Priority 1 and Priority 2 matured into U.S. 6,772,132 ("the '132 Patent") and its divisional U.S. 6,766,304 ("the '304 Patent")

V.3 A person may claim a right of priority from a prior application provided it is for the **same invention**. By reason of the generalisations, deletions and additions made to the subject-matter of the systems described in Priority 1 (there are no claims in that application) and those described and claimed in Priority 2, the Patent is not entitled to either claimed priority date. In particular, it is clear that Priority 1 and Priority 2 describe a system wherein the apparent benefit resides in utilising a display of market depth (see pages 12-13 and 23 of Priority 1) and a "one click" trading system (see page 30 of Priority 1). In this connection it is notable that every single claim of Priority 2 is directed to a display of market depth. The claims of the Patent are not directed to this invention.

V.4 Art 88(4) EPC provides that

> "If certain elements of the invention for which priority is claimed do not appear among the claims formulated in the previous application, priority may nonetheless be granted, provided that the documents of the previous application as a whole ***specifically*** disclose such elements." (emphasis added)

V.5 In the Patent, the claims comprise many features including "single action", "first indicator", "second indicator", "middle mouse button on a three button mouse" which are *not* specifically disclosed in Priority 1. These are yet further reasons that the Patent is not sufficiently closely related to the Priority 1 to retain the 2 March, 2000 priority date claimed.

VI. The Patent contains subject-matter which extends beyond the content of the application as filed

VI.1. The summary of the invention in the Description of the application as filed provides as follows:

> "The "Mercury" display and trading method of the present invention ensure fast and accurate execution of trades ***by displaying market depth*** on a vertical or horizontal plane, which fluctuates logically up or down, left or right across the

plane as the market prices fluctuates. ***This allows the trader to trade quickly and efficiently***.

Specifically, the present invention is directed to a graphical user interface for ***displaying the market depth*** of a commodity traded in a market, including a dynamic display for a ***plurality*** of bids and for a ***plurality*** of asks in the market for the commodity and a static display of prices corresponding to the plurality of bids and asks. In this embodiment the pluralities of bids and asks are dynamically displayed in alignment with the prices corresponding thereto. Also described herein is a method and system for place trade orders ***using such displays***." (pp.5-6, emphasis added)

The display of market depth is clearly an essential feature of the invention. This is reflected in the presence of this feature in each and every claim of the application as filed.

However the Patent places almost no significance on the display of market depth. This is an impermissible extension of subject matter by deletion. Only claims 27 and 37 are directed to subject matter that comes close to introducing market depth. Even then, there is still no limitation that the "plurality of indicators" are numbers that display the quantities for each price. The market depth is never described in any other way throughout the application as filed.

For this reason, all claims should be revoked under Art 100(c) EPC.

The Patent has moreover adopted a range of generalisations over the language of the application as filed. These include: "means for setting a trade order parameter", "first indicator", "second indicator", "*field* of static prices", "order entry region comprising a plurality of areas" and "user input means". These generalisations add subject-matter beyond the content of the application as filed. At least the above impermissible generalisations are present in the features of each and every claim. All claims should therefore be revoked under Art 100(c) EPC.

VII. Non-Patentable Subject-Matter

VII.1 A European Patent shall be granted where the claimed subject-matter is an invention and the invention is new, non-obvious and industrially applicable (Art 52 EPC). The established case law of the Boards of Appeal provides that "invention" shall be understood to mean "subject-matter having technical character".

VII.2 The overall effect of the method of claim 29 is to trade a commodity on an exchange. As a whole, it is not, therefore, directed to a technical effect, but rather an end that is not regarded as subject-matter susceptible of being an invention under Art 52 EPC. This aside, claim 29 and its counterpart apparatus claim, claim 1, do make reference to

elements that may be technical as such. For example, "an interface for receiving data ... from the electronic exchange" in claim 1 and the "user input means" in both claims 1 and 29.

VII.3 According to the case law of the Boards of Appeal (see T 258/03 (*Hitachi*)), a claim cannot be completely excluded from patentability under Art 52(2) and (3) EPC *per se* where there are at least some features with technical character. At Reasons 4.5 of the same case, the Board stated

> "What matters having regard to the concept of "invention" within the meaning of Article 52(1) EPC is the presence of technical character which *may* be implied by the physical features of an entity or the nature of an activity, or *may* be conferred to a non-technical activity by the use of technical means." (emphasis added)

VII.4 The Board provided a very general conclusion at Reasons 4.7 about technical means and inventions, but it is clear from other parts of the Decision that technical means are necessary *but not sufficient* indicia of technical character. At the third paragraph of Reasons 5.4, the Board states:

> "Features (d) to (l) are conditions using the stored information to arrive a the successful bidder. The conditions concern only prices and have, except possibly for feature (h) ... no technical character. It is true that they are performed in a computer and that the overall state of the computer will change for each instruction performed. This is however not regarded as a technical effect but rather as a mere manifestation of the information contained in the prices and conditions."

VII.5 The Opponent submits that any technical character in the claims of the Patent is entirely peripheral to the features that are actually claimed. Claim 29 is directed to presentation of information and methods of doing business. Claim 1 is directed to means for implementing such methods and Claim 53 to programs for computers. The dependent claims do not add any features which provide more technical character. All of the claims are therefore excluded from patentability under Art 52(2).

VIII. References in support of the Opposition

D1 Futures/Options Trading System—Guidelines for Operating the Trading Terminals, Tokyo Stock Exchange [TSE], Business Systems Department (August 1998)

This document was made available to the public in August 1998 when it was distributed by the TSE to around 200 companies. These companies were all the participants able to conduct futures or options trades on the TSE. D1 was made available without any restrictions on the use to which the document could be put. Further evidence pertaining to the TSE system will be provided by the Opponent in due course.

D2 GL Trade User Guide V4.51, GL Trade (June 1999)

This document was made available by distribution to those GL customers who used the GL system for trading on LIFFE. D2 is dated June 1999. Further evidence pertaining to the GL Trade system will be provided in due course.

D3 U.S. Patent 5,960,411 issued 28 September 1999

D4 WO 99/19821 published 22 April 1999

D5 Memorandum Opinion and Order of Senior Judge James B. Moran in Action No. 04 C 5312 in The U.S. District Court for the Northern District of Illinois between Trading Technologies International, Inc. (Plaintiff) and eSpeed, Inc. (Defendant)

D6 Article "Trading Technologies Upgrades Software for its Platform" (Securities Industry News) 28 August 2000

IX. Lack of Novelty

IX.1 *Claim 29*

This is the primary method claim. Each and every feature of the invention claimed by the proprietor in claim 29 is anticipated by the following:

(A) the method of operating the system described in D1 [TSE]

(B) the method of operating the system described in D2 [GL Trade]

Both of the systems disclosed in D1 and D2 were operational prior to 2 March, 2000. The Opponent is continuing to investigate the public nature or otherwise and features of these systems. Whilst the Proprietor's case on novelty and inventiveness over D1 and D2, for the reasons given below, is already very weak, the Opponent gives notice that it may supplement its facts and arguments in relation to the prior uses of these systems.

IX.2 ***Lack of Novelty over D1***

IX.2.1 Taking each of the features of claim 29 in turn:

> "A method of operating a client device (110 – 116) for receiving commands relating to a commodity to be traded on an electronic exchange (101 – 103)..."

D1 discloses a client connected to a "central system" (see figure in Section 2-1). The following functionality for a client is described at Section 9-2:

> "*Entering New Orders*
>
> It is possible to participate in trading of specified issues by entering new orders. Efforts have been made to simplify placement of new orders. For example, automatic input of items such as order prices can be set in the new order entry window by double clicking with the mouse on the board/quotation screen."

IX.2.2 ***Feature (a)***

Page 7-17 of D1 illustrates a "Board Screen". The features of the Board Screen are described in more detail over the subsequent pages of D1. In particular, at page 7-22, item (12) is described as "Order Quantities". The associated text in the table states "The number of orders ... will be displayed for each order price." It is therefore implicit that the client described in D1 has received order and price data in relation to a particular trading product (see feature (2) described at page 7-19) from the central system. The data includes a highest bid price and a lowest ask price. At page 7-1, D1 states that "The board/quotation information is updated automatically at three second intervals". It is submitted that this is sufficiently "current" to meet this feature of claim 29.

It is noted that claim 29 differs from the apparatus claim 1 in that in the latter the words "at least" are not present in relation to the current highest bid and lowest ask prices. It is submitted that these words do not add anything to the requirement that the data "comprises" these prices.

IX.2.3 ***Feature (b)***

Examples of trade order parameters are provided in the Description of the Patent at paragraph [0006]; the name of the commodity, quantity, restrictions and price. The claim does not place any limitation on the "trade order parameter" other than that the message sent in feature (e) is based on the trade order parameter and a price level.

At page 9-6 of D1 is a description of how the TSE client populates a "new order". In particular: "Issue name, sell or buy, order price, and execution conditions can be set automatically, according to the position of the cursor displayed on the board/quotation screen." Moreover, page 6-7 of D1 shows how the "control item" parameter of a new order is set. In addition, it is clear that the "quantity"

parameter may be set in the New Order Entry Window (see page 9-5). D1 thereby describes the setting of at least one trade order parameter.

It is well established in the case law of the EPO that unless an order is specified in a method claim, the steps need not be performed in any particular order. Therefore, the fact that feature (b) is listed before feature (e) does not exclude the possibility that the trade order parameter is set during the step described in feature (e) as opposed to beforehand. In any event, some parameters may be set in the D1 system prior to the command to send an order (e.g. the name of the commodity) and others (e.g. buy or sell) may be set as the command to trade is made.

IX.2.4 ***Feature (c)***

At page 7-21 of D1 is a description of feature (11) from the Board Screen figure on page 7-17. Feature (11) is illustrated as a column of figures and is described as "Order Price". The description provides as follows:

> "The designated prices will be displayed in the price units for the issue that is displayed. ...
>
> For the order price display method, one of the following can be selected:
>
> - "Non compressed price display method" (A method that displays all methods [sic prices])
> - "Compressed price display method" (A method that displays only the specified prices, such as the prices for which there are orders."

The Board Screen may be displayed in either of two ways which may be selected as required by the user: the "Basic Board Screen" and the "Scroll Screen". These are described on pages 7-25 and 7-26.

On page 7-25, a method is described of determining the price that will be displayed at the centre of the board display. A floating display area is then described as a feature of the Basic Board Screen in the non-compressed price display method. This section teaches that provided a price identified by the priority sequence does not fall outside a certain number of prices above or below an initial centre price, the range will not be re-compiled. The skilled person would understand that for practical purposes, the price field in the Basic Board Screen is static, since generally re-compilation will only be necessary when the inside market exceeds the initial window.

On page 7-26 it is stated that "Even when scrolling is performed, the board information still updates automatically." However, on page 7-25 it is confirmed that "in the "scroll screen," the display positions for the prices do not change automatically." It is clear from the description of the Patent (at paragraph [0034]) and claims 4, 5, 6, 7, 33, 34, 35 and 36 that the "static price field" can be recentred

by the user. Therefore, the fact that a user may scroll through the price field with the TSE system does not detract from its "static" character.

D1 therefore discloses the display of a field of static prices both in Scroll and Basic Board Screen Modes.

The figure on page 7-17 illustrates a "Basic Board Screen", since it displays the "OVER" and "UNDER" fields as described on page 7-22 in relation to the features (12), (13) and (14) of the figure. However, aside from a red letter "H" which may be clicked to return from "scroll" mode to "basic" mode, this is the only display difference between the two modes.

The column of figures to the right of the price field displays order quantities for bids in the market. The top-most figure indicates the quantity sought at the current highest bid price. In at least "scroll mode", this figure is aligned with a figure in the field of static prices. That figure is the current highest bid price. The top-most figure in the bid quantity column is therefore an indicator associated with the current highest bid price for the commodity, located at an area on the display which is aligned with a price level. D1 therefore discloses feature (c).

IX.2.5 ***Feature (d)***

This feature also contains the element of "a field of static prices." For the reasons given above in relation to feature (c), this element is disclosed by D1.

The column of figures to the left of the price field displays order quantities for asks in the market. The bottom-most figure indicates the quantity available at the current lowest ask price. This figure is aligned with a figure in the field of static prices. That figure is the current lowest ask price. The bottom-most figure in the ask quantity column is therefore an indicator associated with the current lowest ask price for the commodity, located at an area on the display which is aligned with a price level. D1 therefore discloses feature (d).

IX.2.6 ***Feature (e)***

Page 9-5 of D1 describes how a user of the TSE system may make an order. The mouse may be used to double click a "special area"[1] in the Board Screen (there is nothing to suggest that this does to apply in both the basic and the scroll versions of the board screen). The specific area is comprised in an order entry region. The area shown in the example in the figure on page 9-5 is in the buy quantity column. The double click opens up a "new order entry window". The description goes on to state that:

[1] Given the related disclosure on page 3-6, it is apparent that "specific area" would be a more appropriate translation.

> "Depending on the location that has been double clicked, the "issue name," "sell/buy," "order prices," and "execution conditions" will be filled in automatically."

In other words, the parameters of the order are determined by where the user has clicked and the new order is populated with these parameters.

This "filling in" is also illustrated in an example on page 3-6 of D1, where it states as follows:

> "Double clicking in specific areas on the boards/quotation screens
>
> > This will display the new order entry window, and automatically fill in the issue name, sell/buy, and price, etc., from the position that was double clicked."

This extract form D1 teaches that the class of parameters that may be automatically filled is not limited to those listed. In particular the skilled person would understand that if the appropriate specific area was double clicked, the quantity parameter, amongst others, would be set.

The new order entry window has two buttons: "Send" and "Cancel". The order having been pre-filled from the clicking of an appropriate specific area, a simple further click will send the order to market.

For these reasons, feature (e) is disclosed by D1.

IX.2.8 ***Feature (f)***

At page 7-1, D1 states that "The board/quotation information is updated automatically at three second intervals". In "basic board screen" mode, the display of the board information is "constantly" updated (page 7-25). In "scroll mode", "the board information still updates automatically." (page 7-26). Therefore, in the system described in D1, while the price field remains static, new bids and asks may be updated onto the display. Where a new bid relates to a price that is higher than the previous highest bid price, the quantity information will be displayed in the bid quantity column (to the right of the prices field) and aligned with the new higher bid price. In this way, the indicator of the current highest bid price is moved relative to the field of static prices in response to the receipt of new data. The same applies mutatis mutandis for new lower price asks. Feature (f) is therefore disclosed by D1.

In summary, D1 discloses all the features of claim 29.

IX.3 ***Lack of Novelty over D2***

IX.3.1. Taking each of the features of claim 29 in turn, first:

> "A method of operating a client device (110 – 116) for receiving commands relating to a commodity to be traded on an electronic exchange (101 – 103)..."

The Introduction on page 28 (numbered at the foot of the page) of D2 describes the Trading Pad product:

> "[it allows] traders to monitor market information on a given instrument, as well as entering orders very quickly and efficiently."

In particular the TradePad Window incorporates the "Instrument Information Matrix" ["2IM"]:

> "This matrix displays information across all prices available for one given instrument market depth, ..." (page 28)

IX.3.2 ***Feature (a)***

On page 31 of D2, columns 4 and 10 of the display are described:

> "Col 4 (Col 10) – Bid (Ask) Quantities [BidQty] ([AskQty]): these columns display the total quantity at each price of the given instrument. ..."

It is clear that columns 4 and 10 are populated from data relating to the given instrument obtained from an electronic exchange. This data will include a highest bid price (displayed in the price column on the row aligned with the top-most Buy quantity) and the lowest ask price (displayed in the price column on the row aligned with the bottom-most Ask quantity. D2 therefore discloses feature (a).

IX.3.3 ***Feature (b)***

The "Quantity Matrix" illustrated on page 29 of D2 describes how the "current quantity value" may be set by clicking on the numbers displayed in that matrix. The quantity entered in this matrix is used to populate the Order to the market (see "Order Entry by 2IM" on page 32, first bullet point). Alternatively, the quantity may be input directly by the keyboard (see fourth bullet point). D2 therefore discloses feature (b).

IX.3.4 ***Feature (c)***

Page 29 of D2 illustrates the GL TradePad Window. The columns of the 2IM are described on pages 31-32. In particular, "Col7" is the Price column:

> "this column displays the different prices available for trading on the given instrument. These prices are displayed decreasing from the top to the bottom of the matrix."

D2 discloses that the system provides for up to 22 rows in each column (see first paragraph of page 31). Moreover, despite the fact that the Price column is described as "unsolicited" because "no action from the trader would alterate [sic] the information displayed" (middle of page 31), it is clear that the user is in control of where in the market depth the window of up to 22 rows is placed. The first paragraph of page 31 states:

> "The 2IM will allow the display of 1 to 22 rows. Since the market depth of a given market could go beyond, a scrollable bar on the right hand side of the 2IM will allow the trader to scroll in the given instrument market depth."

There is no indication that the price column will change on the 2IM display unless the user chooses to scroll.

As is described above in relation to feature (a), the display of the quantity in respect of the highest bid price is an indicator of that price to which it is aligned (i.e. in the same row). D2 therefore discloses feature (c).

IX.3.5 ***Feature (d)***

The reasons given above in relation to feature (c) apply equally well to the lowest ask price in feature (d). D2 discloses this feature.

IX.3.6 ***Feature (e)***

Two order entry modes are described at pages 31-32. Under the heading "Trading Columns" it is described how the user may either click on a cell on one of columns 5 or 9, or click on a cell in one of the columns 6 or 8. It appears that the descriptions of the two modes have been mixed up. Columns 5 and 9 are headed "Buy" and "Sell" respectively in the display shown on page 29. However, the first bullet under "Trading Columns" reads:

> "Col 5 (Col 9) – Size of Bid (Ask) Order Prepared [BuyPre] ([SelPre]) ..."

It is clear that it should read:

> "Col 6 (Col 8) - Size of Bid (Ask) Order <u>Prepared</u> [BuyPre] ([SelPre]) ..."

The subsequent bullet point obviously needs reverse amendment to:

> "Col 5 (Col 9) - Size of Bid (Ask) Order <u>Preparation</u> [Buy] ([Sell]) ..."

The difference in the two modes is that selecting a cell in the BuyPre or AskPre columns will completely pre-populate the Order Details Box (ODB), whereas selecting a cell in the Buy or Sell columns will require the further entry of a quantity.

The detail of the ODB population in the Order Prepared mode is given in the bullets at the foot of page 32. The current cell quantity value (clearly the value from the Quantity Matrix) is placed in the ODB quantity field. The current price value is placed in the ODB price field from the price column (clearly referring to the price displayed in the row clicked). Furthermore, the mouse pointer is automatically positioned over the Buy or Sell button (depending on whether column 6 or 8 was clicked).

This last feature produces the particular result that the command to send an order may be completed by the user simply "double clicking" the mouse button. The first click identifies the relevant cell and the second completes the command without the need for any movement of the mouse.

On page 32 of D2, it is described how, following the clicking of the "Buy" or "Sell" buttons, the parameters of the order are confirmed by the system. However, the Confirmation Dialog Box will only appear (and require a further user input) if the relevant box is checked on the Order Defaults Box shown on page 34. Since this step may be effectively switched off, it can be ignored for the purposes of analysing D2.

IX.3.7 *Conclusions on feature (e)*

It is clear that D2 discloses an order entry region as part of the 2IM display. This includes at least the various specific areas in the BuyPre/SelPre and Buy/Sell columns, each aligned with a price. A user of the system described in D2 who wishes to send a command to send an order may identify any one of the various specific cells in the BuyPre/SelPre and Buy/Sell columns with a left click, depending upon the parameters of the order (such as "buy/sell" and "price") that the user requires.

If the BuyPre/SelPre columns are clicked, the order is pre-completed and the user merely clicks again to complete the command because the mouse pointer is automatically positioned over the Buy or Sell button as appropriate.

For these reasons, feature (e) is disclosed by D2.

IX.3.8 ***Feature (f)***

The display of the system described in D2 is updated as new orders are placed. On page 31 it is described how the last traded price will be displayed with a light yellow background. It is clear that if an update changes the current highest bid price or current lowest ask price, then the quantities relating to these new orders will be displayed in the rows aligned with those new highest bid/lowest ask prices. For the reasons given in connection with features (c) and (d) above, the display of those quantities are the indicators for the highest bid/lowest ask price. D2 therefore discloses feature (f).

In summary, D2 discloses all the features of claim 29.

IX.4 *Claim 1*

IX.4.1 Claims 29 and 1 generally differ only by their categories (process and apparatus respectively). As such, the client device for receiving commands, the interface for receiving data, the various setting and display means, and the order entry region are all disclosed by D1 and D2 since they are the physical entities implicated in and implied by the method of claim 29.

IX.4.2 For completeness, there is a difference in the wording of the "order entry region" feature of claim 1 from its counterpart in claim 29. The feature in claim 1 reads:

> "an order entry region (1003, 1004, 1201, 1202) comprising a plurality of areas, each area being aligned with a price level in the field of static prices and each area being selectable by a user input means, *the order entry region being configured such that selection of one of the plurality of areas* sends an order message to the electronic exchange based on the trade order parameter and the price level that is aligned with the selected area." (emphasis added)

There is no reference to "receiving a command" and the "selection" language (emphasised above) only adds the limitation that an order message is sent when one of the plurality of areas is selected. This does not affect the analysis already provided in relation to claim 29.

IX.5 *Claim 30*

The language of claim 30 adds a further step to the claim 29 method of "selecting one of the plurality of areas of the order entry region by a single action of the user input means." The scope of the term "Single action" is explained at paragraph [0018] of the Patent:

> "... the specification refers to a single click of a mouse as a means for user input and interaction with the terminal display as an example of a single action of the user. While this describes a preferred mode of interaction, the scope of the present invention is not limited to the use of a mouse as the input device or to the click of a mouse button as the user's single action. Rather, any action by a user within a short period of time, whether comprising one or more clicks of a mouse button or other input device, is considered a single action of the user for the purposes of the present invention."

The term "single action" is therefore broad enough to encompass the selection processes disclosed in both D1 and D2. This claim is therefore anticipated.

IX.6 *Claims 2 and 31*

These claims relate to means for and the setting of a "plurality of parameters for the order message". Both D1 and D2 disclose the population of an order with more than one parameter in response to the selection of one of the areas of the order entry region.

IX.7 *Claim 3*

This claim is dependent on claim 2 and adds the further limitation that the plurality of parameters include the price and order type (by which is understood "buy" or "sell"). Both D1 and D2 particularly disclose the setting of these parameters in a message order in response to the selection of an area in the order entry region.

IX.8 *Claims 4 and 33*

These claims are dependent on any of the preceding apparatus or method claims respectively. The claim feature relates to the re-centering of the price levels in the field of static prices about an inside market in response to receipt of a re-centering command.

No limitation is placed on the nature of the re-centering command.

D1 discloses two types of re-centering command. Firstly, in "scroll" mode, clicking on the red "H" will revert to "basic board screen" mode wherein the price column is re-centered according to the "priority" system described in at page 7-25 (e.g. around the last traded price). Secondly, in "scroll" mode, the user may simply execute a series of scrolls until the inside market is visible.

Similarly, in the D2 system, the display may also be re-centered on the inside market by the user requesting the system to execute sufficient scrolling of the price field.

The claims are anticipated by D1 and D2.

IX.9 *Claims 5, 6, 34 and 35*

These claims are directed to particular embodiments of the re-centering feature. The limitations relating to predetermined actions and a predetermined area are met by both the "H" button feature in D1 and the scrolling feature in both D1 and D2.

IX.10 *Claims 8 to 12, 24 to 28, 37, and 46 to 52*

These claims relate to the generation and presentation of the price field, bid display region and ask display region on the client device. The presentations claimed cover those disclosed by both D1 and D2. Each of these claims is therefore anticipated.

IX.11 *Claims 14 and 15*

These claims, directed to overlapping order entry regions and order display regions are anticipated by the disclosure in D1. See in particular page 7-23:

"The cursor is displayed in the order price space, the order volume space, the space for the number of orders, the space for orders at conditional closing prices, and unfulfilled order volume total space when the operations are to be carried out in the relevant screen."

IX.12 ***Claims 16, 17 and 32.***

These claims add limitations to claim 1/31 relating to the presentation of the order entry region and to the type of order message generated subsequent to the selection of a specific area within the order entry region respectively. They are both anticipated by the disclosures of D1 and D2.

IX.13 ***Claims 22, 23 and 44***

These claims are directed to a "last trade indicator" which is disclosed by D1 (at page 7-22: "The last contract price ... will be displayed in yellow") and by D2 (page 31: "The last traded price will be displayed with a light yellow default background colour ...."). The additional feature of a "last trade region" is met by the price field displayed in both the disclosures. These claims are anticipated by D1 and D2.

IX.14 ***Claim 38***

This claim is directed to the feature of setting a fixed quantity to be traded prior to selecting one of the plurality of areas of the order entry region. This is anticipated by D1 and D2.

IX.15 ***Claim 53***

This final claim is directed to a "computer program product" for execution of the steps in any of the preceding method claims. It is clearly implicit that there is such a product executing the steps in each of the systems described in D1 and D2. This claim is therefore anticipated.

Of the further claims, it is not presently known whether the details of the systems of D1 and D2 are anticipatory. The Opponent continues to make investigations and will provide further evidence and argument in due course.

IX.16 ***Lack of Novelty over WO 99/19821 (D4)***

This Application was published on 22 April, 1999. The invention relates to systems, methods and computer program products for electronic trading of financial instruments. The disclosure provides for an interface (see for example figure 3) for the user to interact with a series of screen displays. This includes, in particular, a screen shown at figure 15. The price level of the lowest ask price is indicated in the lowest row on the "ask" side of the screen. The highest bid price is similarly indicated on the highest row on the "bid" side.

Orders may be entered on the screen. In particular, pp.63-65 describe the use of HIT and LIFT buttons (selected with a mouse click) which result in the pre-population of

an order (see figure 14B). The order may be submitted with a single further mouse click.

As such, the features of at least claims 1, 29 and 53 lack novelty.

IX.17 ***Proprietor's own Prior Use***

IX.17.1 Before the earliest claimed priority date (March 2, 2000) of the Patent, the prior public use of the MERCURY display and trading method disclosed the invention claimed in the Patent. The undisputed facts are that one of the named inventors of the Patent, Harris Brumfield, entered into an Agreement with the Proprietor, Trading Technologies, for the development of the software program, that a computer with software related to that program was installed in Brumfield's office in January 1999, and that a faster computer with related software was substituted for the first computer in February 1999. In a publication entitled Security Industries News dated 28 August 2000 (**D6**), Mr. Brumfield is quoted as saying that he "made a killing" on trading with use of the computer incorporating the graphical user interface to which the Patent is directed for over a year prior to 28 August 2000. Mr. Brumfield's trading records apparently confirm that he did indeed "make a killing" in July and August, 1999.

IX.17.2 These facts are derived from an Opinion dated 9 February 2005 of Senior Judge, James B. Moran (**D5**) of the U.S. District Court for the Northern District of Illinois (Eastern Division) in Case No. 04 C5312 between the Proprietor (Trading Technologies International, Inc.) as Plaintiff and eSpeed, Inc as Defendant.[2] That action concerns alleged infringement of the U.S. Counterparts of the Patent under opposition, namely U.S. 6,772,132 and its divisional U.S. 6,766,304. Proceedings for alleged infringement of those U.S. patents have also been brought against a number of other Defendants[3] and the actions have all been assigned to Senior Judge James B. Moran. We refer to these actions as "the Chicago Case".

IX.17.3 In the Chicago Case there is a Protective Order which was entered by the Court on 29 September 2004. This provides that a Disclosing Party has the right to designate certain classes of documents as CONFIDENTIAL or HIGHLY CONFIDENTIAL – ATTORNEYS' EYES ONLY. We understand from the Opponent's U.S. counsel representing them in the Chicago Case that documents relating to use of the MERCURY display and trading method by Mr. Brumfield and others prior to 2 March 2000, including a deposition of Mr. Brumfield, have been designated CONFIDENTIAL under the Protective Order. Consequently, neither that deposition

[2] The Opponent is a wholly owned subsidiary of eSpeed, Inc. and is now joined as a co-Defendant.

[3] CQG, Inc; CQGT, LLC, REFCO Group Ltd., Man Group PLC, GL Consultants, Inc., Peregrine Financial Group, Inc. and future Path Trading LLC

nor the documents relating to prior use are available for production in this Opposition.

IX.17.4 Accordingly, at the present time the Opponent cannot provide additional particulars *of where, when, how and by whom* in relation to the prior use. The Opponent is, of course, aware that it has the burden of proof of demonstrating that this prior use of the MERCURY display and trading method was made available to the public before the priority date of the Patent.

IX.17.5 However, this prior use is uniquely within the knowledge of the Proprietor of the Patent and the co-inventors, including Mr. Brumfield. The Judge has said that it is *undisputed* that for more than a year before 28 August 2000 (i.e. in a period before the 2 March 2000 priority date of the Patent) Mr. Brumfield was using the MERCURY display and trading method disclosed and claimed in the Patent. Here, the standard of proof for prior public use is the balance of probabilities (**Case T 270/90** at Reasons 2.1) and this is met by the Judge's above finding.

IX.17.6. Accordingly, the burden now moves to the Proprietor (1) to produce all records relating to such use before 2 March 2000 and (2) to bring any evidence to the contrary: see Case **T 743/89** at reason 3.

IX.17.7 The Opposition Division may request information, request the production of documents and hear witnesses if it considers it necessary to do so: Art. 117(3) AND Rule 72(1) EPC. The Opponent respectfully suggests that the appropriate procedure in this case is to consider what (if any) steps may be required to ensure full disclosure of the prior use by Mr. Brumfield and others after the Proprietor's Counterstatement is received.

X. **Obviousness**

X.1 *Subject-matter Excluded from Patentability*

According to the principles set out in **Case T 641/00**, inventive step is to be assessed by taking account of only those features which contribute to a technical character. The shortage and nature of any technical character in the claims of the Patent renders the Patent entirely obvious.

X.2 *Technical character in Claim 29*

X.2.1 Feature (a) is concerned with transmitting non-technical data. Insofar as this feature relates to data transmission, it may have technical character. However, as is clear from the description of the prior art in the Patent (paragraph [0006]), such transmission is entirely standard.

X.2.2 Feature (b) relates to the act of selecting a parameter that the user desires to impact on a trade order. This is not a technical choice, it is part of a business method. Moreover, the content of the parameter has no technical character. Whilst the trade order parameter is set as part of a method of operating a client device and the state of

the client device may change as the parameter is set, this is not a technical effect. By analogy with the reasoning in **T258/03** (Reasons 5.4), the effect on the client device in this case is a mere manifestation of the information contained in the trade order parameter. In any event, data storage in a client device is clearly standard.

X.2.3 The effect in each of the features (c), (d) and (f) in method claim 29 is simply to inform the user of the pricing and quantity information for the commodity that he or she is interested in. This is non-technical information (it does not, for example, relate to the internal operation of either the client device or the electronic exchange). Furthermore, the effect of the information display is merely an "intellectual effect" on a human being. These features do not, therefore, relate to any technical effect. In **Case T 125/04** (*Comparative Visual Assessments* [CVA]), the Board was of the opinion that

> "... in general, the task of designing diagrams is non-technical .... This is so even if the diagrams arguably convey information in way (sic) which a viewer may intuitively regard as particularly appealing, lucid or logical." (Reason 4.5).

This conclusion must be drawn, *a fortiori*, where, as in the present case, the data is not even converted into diagrams, but is itself merely arranged in a display.

X.2.4 It is not sufficient for the proprietor to show that its claimed method relates to the arrangement of information as opposed to the content of that information. It will not do merely to make reference to the Guidelines for examination in the European Patent Office, C-IV, 2.3.7, as it did in its written submission of 28 April 2004 to the Examination Division. The proprietor must identify some technical feature—and there is none.

X.2.5 In any event, features concerned with the mere display generally of data and indicators on a client device are clearly standard. This is admitted at paragraph [0021] of the Description.

X.2.6 The desired effect of feature (e) is a "competitive speed advantage" in placing trade orders. However, the well known goal of being able to trade at greater speed (Patent paragraph [0005]) is not a technical effect. Rather, it is an improvement of a method for doing business.

X.2.7 While the feature of a display through which a user can provide an input does have technical character, the actual presentation of the information (alignment etc.) does not. Displaying an order entry region on a client device and providing for user input to select an area therein are completely standard.

X.2.8 Claim 29 is therefore obvious over the prior art described in the Patent and the common general knowledge. The means for implementing such a method (claims 1 and 53) are also therefore obvious.

X.3 Taking D1, D2 or D4 as a starting point

X.3.1 The disclosure in D2 provides a starting point which clearly attempts to "pre-set" as many of the parameters of a trade a possible such that a trade can be ordered with a minimum of input from the user. The user will first have identified an instrument for which the 2IM display provides a matrix of order data. The user may then pre-set a quantity in the Quantity Matrix. The setting of the remaining parameters sufficient to place a valid order—price, whether the trade is a buy or sell and, in effect, the time of the order—are then compressed into a few short interactions via an input device.

X.3.2 Given that the skilled person has the motivation to further compress this last stage to improve the speed of trading, he or she would appreciate that once a user has clicked on a cell in the BuyPre/SelPre columns, the client device has *all* of the parameters required for the trade order. The further clicking on the "Buy" or "Sell" buttons are merely by way of confirmation. The column that has been identified by the user will already have alerted the client device to the type of trade that the user wishes to make.

X.3.3 There is no technical reason deterring the skilled person from removing the buy/sell confirmation button step. This would be simple to implement. In so far as there could have been any prejudice against doing so (and there is nothing to suggest that there was any prejudice at all), this could only relate to a concern that a human user might make an error and the confirmation step would reduce the risk of erroneous orders being placed. The choice about whether such a risk is acceptable is a business method issue, not a technical issue.

X.3.4 A similar analysis applies starting from D1.

Claim 29 is therefore obvious over D1 or D2 combined with Common General Knowledge. The means for implementing the claim 29 method are therefore rendered obvious also.

X.4 D1, D2 or D4 combined with D3

X.4.1 The concept of "one click" in a user interface was a hot topic in the IT community in 1999-2000. Amazon.com's "1-click ordering" well known (and indeed notorious) patent (US 5, 960, 411 at D3) was published on 28 September, 1999.

X.4.2 Claim 1 of the Amazon patent is for:

> "A method of placing an order for an item comprising:
> under control of a client system,
> displaying information identifying the item; and
> in response to only a single action being performed, sending a request to order the item along with an identifier of a purchaser of the item to a server system;
> under control of a single-action ordering component of the server system,

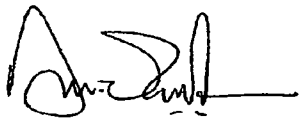
receiving the request;
retrieving additional information previously stored for the purchaser identified by the identifier in the received request; and
generating an order to purchase the requested item for the purchaser identified by the identifier in the received request using the retrieved additional information; and
fulfilling the generated order to complete purchase of the item
whereby the item is ordered without using a shopping cart ordering model."

X.4.3 In essence, the method relates to reducing a command to purchase to a "single-action" by generating the order from (a) the parameters identified at the time of the "single-action" (e.g. in Amazon's case the item chosen by the user along with their identity) and (b) previously stored additional information (e.g. user's payment details). The problem (albeit non-technical) that D3 sought to overcome is closely related to that which the Patent recites. See D3, Col 2:29-44, where it is stated that the user may find it cumbersome to confirm the steps of the ordering process, completing the selection of the item for purchase, when the required information may be "pre-filled" with information that has already been provided by the purchaser.

X.4.4 Combining D1 or D2 with D3, it would be obvious to the skilled person that the command to place a market trade could be reduced to a "single-action" by ensuring that all of the parameters required to make such a trade were either (a) preset by the user or (b) defined by the "single-action". It would also be obvious that *all* of the parameters for a trade could be sent to the exchange as a result of the "single action", since this is the input that the electronic exchange would be expecting (Patent paragraph [0006]).

X.4.5 The claimed invention is therefore obvious in light of the art cited in respect of novelty combined with D3.

X.5. A full analysis of the obviousness of the dependent claims will be deferred until the Proprietor of the Patent has indicated those claims which are independently valid.



D C L Perkins

IN THE MATTER OF The Convention on the Grant of European Patents (The European Patent Convention)

-and-

IN THE MATTER OF European Patent No. 1,319,211 B1 "CLICK BASED TRADING WITH INTUITIVE GRID DISPLAY OF MARKET DEPTH" in the name of Trading Technologies International, Inc.

-and-

IN THE MATTER OF an Opposition thereto by Eccoware Limited

EVIDENCE PRESENTED

D.1	System for Buying and Selling Futures and Options Transaction Terminal Operational Guidelines, Tokyo Stock Exchange	August 1998
D.1(1)	Japanese text numbered TSE 000000 0647 to TSE 000000 0981	
D.1(2)	English translation of the cover page and pages 5-2 to 5-19, 6-3 to 6-10, 6-24 to 6-25, 7-13 to 7-20, 7-23 to 7-24, 9-1 to 9-4, 9-6 to 9-32	
D.1(3)	English translation of the cover page; Table of Contents pages 1 to 4; and pages 2-1, 3-6, 5-1, 7-1, 7-17, 7-21 to 7-22, 7-25 to 7.26, 9.5 and Appendix 4-1	
D.2	GL Trade User Guide V 4.51 LIFFE CONNECT for FUTURES by GL TRADE – comprising the cover page and pages 28 to 29 and 31 to 35	June 1999
D.3	U.S. Patent 5,960,411	28 Sept. 1999
D.4	WO 99/19821	22 April 1999
D.5	Memorandum Opinion and Order of Senior Judge James B. Moran in Action No. 04 C5312 in The United States District Court for The Northern District of Illinois between Trading Technologies International, Inc. (Plaintiff) and eSpeed, Inc. (Defendant)	
D.6	Article "Trading Technologies Upgrades Software for its Platform" (Securities Industry News)	28 August 2000
