

REPUBLIC OF SOUTH AFRICA



IN THE COURT OF THE COMMISSIONER OF PATENTS

(1)	REPORTABLE: YES (NO)
(2)	OF INTEREST TO OTHER JUDGES: YES (NO)
(3)	REVISED.
	2012-09-14
	DATE
	<i>Platy</i>
	SIGNATURE

14/9/12
Patent Case No: 2002/2337

In the matter between

3M FUTURE AFRICA (PTY) LTD

Plaintiff

and

THE STANDARD BANK OF SOUTH AFRICA LTD

First Defendant

MTN GROUP LTD

Second Defendant

MTN MOBILE MONEY SA (PTY) LTD

Third Defendant

J U D G M E N T

MAKGOKA J

[1] On 31 August 2012 I made the following order:

1. Claims 17, 18, and 19 of SA Patent No. 2002/2337 (the patent) are valid and were infringed by the 'MTN Money Banking' until the 'on/off' functionality was disabled on 13 January 2012.
2. The defendants' counterclaim is granted and the patent is revoked, subject to paragraph 3 below:
3. The revocation order granted in paragraph 2 above is provisional. It will become fully operative in respect of the patent if the patentee does not within one month file a notice of an application to amend the patent, or having filed such application, the patentee withdraws it. If an application for amendment is made and not withdrawn, it shall be decided at the hearing of such application whether or not the revocation order is to be put in into operation.
4. The defendants are ordered to pay the plaintiff's costs in respect of the infringed claims set out in paragraph 1 above, such costs to include those consequent upon employment of three counsel, to be paid by the first, second and third defendants, jointly and severally, the one paying the others to be absolved.
5. The plaintiff is ordered to pay the defendants' costs in respect of the counterclaim, such costs to include those consequent upon employment of two counsel, respectively in the case of the first defendant on the one hand, and the second and third defendants on the other.

[2] I undertook to furnish reasons at a later stage for the order. The following are the reasons.

[3] This is a patent infringement action brought in terms of s. 65 of the Patents Act, 57 of 1978 (the Act). It concerns the validity and alleged infringement of South African Patent Number 2002/2337 in respect of an invention titled 'Transaction Authorization System' (the patent). The plaintiff, a dormant company, is the proprietor of the patent by virtue of an assignment which was registered on 30 August 2006. The priority date of the patent is 26 March 2001.

[4] The first defendant (Standard Bank) is a leading South African banking institution. The second defendant (MTN) is the holding company of one of Africa's leading cellular phone networks. The third defendant is a wholly-owned subsidiary of MTN Mobile Money Holdings (Pty) Ltd, which in turn is a joint venture between Standard Bank and Mobile Telephone Networks Holdings Ltd. The latter is a subsidiary of MTN.

Overview of the patent

[5] The invention seeks to curb the unauthorized use of bank account details, where such details are used to conduct illegal transactions without the authorisation of an account holder. The object of the patent is said to be an added authorization to the conventional bank authorization, in terms of which the user of the bank card may 'enable' and 'disable' the bank account associated with the card, and only authorize the transaction if the account is designated as 'enabled'.

The patent specification

[6] The invention relates to data processing, more particularly, to a transaction authorisation system, to a computer program on a carrier for causing a computer to execute transaction authorisations, and to a method of authorising a transaction. The unauthorized transactions are said to be particularly prevalent in light of internet-based transactions or other transactions where a physical signature is not required or possible, such as those initiated by personal computers, mobile phones, handheld computers etc, where only the bank account details, such as a credit or debit card number, are required to authorize a transaction. Once such details are acquired in one way or the other, they can be used illegally for any transaction not requiring a physical signature.

The conventional authorization method

[7] It is stated in the specification that conventionally, when a transaction is performed using a bank account in which the account holder purchases goods from a merchant, the merchant checks for authorization from an authorization institution or facility responsible for the account, before completing the transaction. The authorization institution is typically in the form of a bank (e.g the acquiring bank, the bank that manages the merchant's account, the card-issuing bank that manages the account holder's bank account or credit card account), credit card associations and clearing houses (such as Visa™, Master Card International™ or American Express™, or in addition, the merchant itself, or any other authorised institution or facility. The

authorization institution then authorizes the transaction based on the credit limit or available funds or other data or rules associated with the bank account.

The invention claimed

[8] The invention is said to be an added authorization process in that over and above all of these processes mentioned above, the authorizing institution, using the invention, may access and/or interrogate the account status database to determine the status of the bank account, and only authorize the transaction if the account is designated as 'enabled'. Thus, even if there are sufficient funds in the account, the transaction or request from a merchant is only allowed or authorized if the account has been 'enabled'.

[9] In terms of the invention, the status altering facility may be configured to allow an account holder to specify that the account is to change status once a pre-selected condition has been met. That pre-condition may either be:

(a) a specified time interval during which the bank account will be designated as 'enabled' or 'disabled'. As an example, a card holder may enable his or her account for preselected time interval of, say 10 minutes, ½ hour etc to effect a transaction, whereafter the account may automatically revert to 'disabled' status;

(b) a predetermined event, where for example, an account may be configured to allow for one transaction only, whereafter the account will revert to its disabled status, or

(c) an amount for which the account holder intends to designate the account as enabled.

[10] The complete specification of the invention has 25 claims, and it is described by way of examples and with reference to accompanying diagrams.

[11] The complaint by the plaintiff against the defendants is that the defendants have infringed claims 17, 18, 19, 20, 23 and 25 through the provision by 'MTN Banking' of the 'MTN Mobile Money System', in particular the 'on/off' and the 'authorised' function which attaches to the internet transactions. In support of its allegations of infringement the plaintiff relies on: (i) the 'Mobile Money Account Terms and Conditions as illustrated on the 'MTN Banking webpage'; (ii) a transaction performed by Mr. Christo Nel; (iii) screenshots from the MTN Banking website; and (iv) the MTN Banking training manual.

[12] Initially the plaintiff sought an interdict restraining the defendants from infringing the claims of the patent alleged to be infringed, namely claims 17, 17, 19, 20, 23 and 25. It also sought an enquiry into damages and costs. The plaintiff alleges that the (allegedly) infringing conduct of the defendants has caused, and is still causing it damages, which it is unable to quantify, alternatively that the plaintiff is entitled to a reasonable royalty in terms of the provisions of s 65(6) of the Act. The defendants deny these allegations and assert that the 'functionality' on which the plaintiff had relied was disabled on 13 January 2012.

[13] The defendants admit annexure 'B' to the plaintiff's particulars of claim to be a copy of the Mobile Money Account Terms and Conditions, and that annexures 'C1' to 'C17' are copies of the screenshots from the MTN Banking training Manual. However, they deny that they have infringed any of the claims of the patent, and seek the dismissal of the plaintiff's claims. In addition the defendants counterclaim for the revocation of the patent on the basis that it is invalid and liable to be revoked in terms of s 61(1) (c) of the Act, on the ground that the invention concerned was not patentable in terms of s 25 of the Act, in that: (i) it was not new; (ii) it did not involve an inventive step; (iii) it includes an 'invention' which consists of a scheme, rule or method for doing business; and (iv) it includes an 'invention' which consists of a program for a computer.

[14] In support of their attack on the validity of the patent based on grounds of lack of novelty and obviousness the defendants rely on four prior art documents, namely:

- (a) US Patent No. 5,513,250 dated 30 April 1996 ('McAllister');
- (b) US Patent No. 5,649,117 dated 15 July 1997 ('Landry');
- (c) US Patent No. 5, 826 241 dated 20 October 1998 ('Stein'); and
- (d) US Patent No 6. 052,675 dated 19 April 2000 ('Checchio')

The claims

[15] In written submissions filed on behalf of the plaintiff, and confirmed orally from the bar during closing argument, I was informed that for the purposes of infringement the plaintiff would rely only on claims 17, 18 and 19. These are method claims. Claim 17 is a 'substantive' claim whilst claims 18 and 19 are 'dependent' claims, in the sense that they are dependent on claim 17 in that they incorporate all of the integers of claim 17 but are limited by further integers. Claim 17 is stated as follows:

- (a) A method of authorizing a transaction;
- (b) the method including selectively designating a bank account status as enabled or disabled, on the instruction of an account holder issued from a remote device;
- (c) thereby to selectively transactions performed using the bank account;
- (d) and recording the status of the bank account in an account status database.

[16] Claim 18 includes additional integers which require that the method includes interrogating the account status database during a transaction involving the bank account to determine the status of the bank account and authorising the transaction if the account is designated as enabled. Claim 19 includes an additional integer which requires that the method includes authenticating the identity of the bank account holder before permitting the status of the bank account to be changed.

The evidence

[17] Four witnesses testified. They are Dr.Wolfram Johannes Bernd Reiners (Dr Reinders), Mr.Christoffel Paul Nel (Mr. Nel), Mr.Ivan Zatkovich, who all testified on

behalf of the plaintiff. Mr. Dirk Bruynse (Mr. Bruynse) was the only witness called on behalf of the defendant. Both Mr. Zalcovitch and Mr. Bruynse were called as experts on behalf of the respective adversaries. What follows is a summary of each witness' evidence.

Dr. Reiners

[18] He is one of the three inventors of the patent. His evidence was for background purposes with regard to the patent itself, the drawing and filing of the patent specification, and attempts to commercialise the invention. Initially the inventors sought to commercialise the patent through a company called E-Intact (Pty) Ltd. Ultimately the inventors assigned the invention to the plaintiff company. He testified that he approached Standard Bank with the possibility of exploiting the invention. He had approximately 30 meetings with various representatives of Standard Bank over a period of time from March 2001 to 2002.

[19] After having made presentations to its officials, Standard Bank expressed interest in the invention and requested to be issued with exclusivity rights among the top four banks in the country, which they did. The plaintiff also issued a Request for Information (RFI) to Standard Bank, at the latter's invitation, for the supply of an Electronic Payments System - Multi-channel virtual payments environment. Standard Bank never reverted to him. On 10 August 2005 Standard Bank and MTN issued a media release, announcing the introduction of the MTN Mobile Money product (*MobileMoney*). In December 2005 MTN issued a media release, introducing the Mobile Money card and alluding to some of its security features. After that it became clear that Standard

Bank was not going to enter into a relationship with the plaintiff. The plaintiff tried to commercialise the invention with Absa but it fell through as the product was not sellable anymore as Standard Bank already held the advantage in this regard.

Mr Nel

[20] Mr. Nel's evidence was merely to demonstrate that the *Mobile money* account functioned in the manner referred to in the screenshots and 'Terms and Conditions' referred to in paragraph [6] above. Having been issued with a Mastercard for use with the money mobile account, he made a purchase at a health shop using the card.

Mr. Zalcovich

[21] Mr. Zalcovich is a technology consultant in a consultancy firm in Tampa, Florida, United States of America. He qualified from the University of Pittsburg in 1980 with a Bachelor of Science (B.Sc) in 1980. From 1980 to date he has been involved with a variety of corporations, mostly in technology and data processing. He has also been involved in a number of projects, all involving internet based systems, financial transactions and authorization of electronic data exchange. Some of them are particularly relevant to the current patent specification, for example the E-Trade Online trading, which is a stock and security transaction system on the internet for trading securities and commodities. It is primarily a system of conducting transactions to merchant accounts which were listed on the E-Trade and with the authorisation of those transactions. It involved a great deal of security in those types of transactions.

[22] Up to the priority date on 26 March 2001 he had been involved with financial electronic transactions since the mid-90s. He has given evidence as an expert at trial

and deposition (motion) proceeding - in numerous patent disputes in the USA, some of which related to the technology relevant in the patent in suit. As a result of his experience and background he considered himself as a person skilled in the art as at the priority date on 26 March 2001. His experience and expertise was never seriously placed in issue. I am therefore satisfied that he is qualified to express an opinion on the issues in dispute in this matter. His detailed *curriculum vitae* is on record and I do not intend to repeat the contents thereof.

[23] The onus of proof on the issue of infringement is on the plaintiff and on the defendants on the issue of validity (see *Stauffer Chemical Co. and Another v Sasfan Marketing & Distribution Co. (Pty) Ltd and Others*¹

INFRINGEMENT

[24] In his evidence on infringement, Mr. Zalcovich used two sources of information as the basis for the opinion he expressed in relation to certain of the method claims of the patent. Those sources are the *MobileMoney* terms and conditions, as well as the product demo that was available on the MTN internet website. He had downloaded it to his laptop computer, which had simulated the use of a cellphone to take a subscriber through the steps of using the product. The downloaded product demo was the same as the screen shots, which are annexures C1 to C17 of the pleadings. He also determined

¹ 1987 (2) SA 331 (A) at 342D-E and 347(I)

from the product demo that the account could be used both for point of sale transactions and for internet transactions.

[25] Comparing the contents of paragraph 5.3 of terms and conditions with integer 17(a) of claim 17, he expressed the opinion that the *MobileMoney* also provided a method of authorizing transactions. The basis for that opinion is that as soon as one enters the main menu of the *MobileMoney* one is presented with several options, including 'Pay to' and 'Buy', which he testified, were methods of performing online bill payments and purchases, respectively. Through a remote device convenient to a particular instruction, one is able to narrow the window to just enabling the account for the time that the next purchase is made and no longer.

[26] With regard to integer 17(b), the first step to be performed using the *MobileMoney* would be to select 'My Security', which is an authorisation process, after which three security options are given. The first one is to perform bank card security functions. The second is to change one's PIN and the third one is to access one's web login. The next step would be to select the bank card function, which presents one with the bank card authorization once the bank card had been activated.

[27] After the card had been activated, one would be able to enable the card by selecting 'Card On' function. If the card is switched off, no transaction can be made on

the card. For a transaction at a point of sale (POS) one has to authenticate himself using a PIN number, after which the card is turned 'On'. Once the card is swiped for the transaction, a text message is sent to the cardholder's cellphone requesting him to confirm the purchase. Once the transaction is complete, the card is automatically disabled until the sms is responded to and the previous transaction confirmed. Conversely, once the sms is confirmed by entering the PIN, the card is activated for the next transaction. To disable the card deliberately, one would simply select 'My Security' option and select the bank authorization functions and then proceed to 'Card off', where authentication of the cardholder in the form of a PIN would be requested, before the card is switched off. According to him, this is one of the features of the patent in suit.

[28] Mr. Zalcovich opined that the *MobileMoney's* function of turning the card 'On' or 'Off' is equivalent to the patent's function of designating the account as 'Enabled' or 'Disabled'. In both instances this is performed on the instruction of an account holder, which signifies user authorisation as opposed to a bank authorization. This instruction is issued from a remote device envisaged in the patent, which is one accessible to where the transaction is being performed, so as to enable the cardholder to enable it just prior to the transaction and potentially disable it after conclusion of the transaction.

[29] As to integer 17(c), Mr. Zalcovich opined that this integer is present in the *Money Mobile* method on the inference that the account is confirmed when one turns the card 'On' or 'Off', and if one tries to perform a transaction while the card is turned off, the

transaction is refused. On that inference, in his opinion the system would not work in any way if the status was not stored in some form of data base associated with that account number.

[30] Turning to the so-called 'Card not present transactions', i.e. transactions over the internet, mail order or telephone order, he described the process that one would follow to purchase an item over the internet using the *MobileMoney*. This transaction would essentially follow all the steps mentioned for a point of sale transaction, except that for internet transactions, one would be prompted to select 'Bank card' function, from which one would proceed to authorization, during which an account holder is allowed to pre-authorise any transaction he would like to do over the internet (This function replaces the 'Card on' function in respect of point of sale transactions). A PIN number is entered, after which a confirmation message would be received. The cardholder then is allowed 15 minutes within which to make one internet, mail order or telephone order transaction, using a computer terminal. Once the purchase is completed, the card is automatically deactivated.

Claim 18

[31] This claim, it should be recalled, is a method as claimed in claim 17 in which the method includes interrogating the account status database during a transaction involving the bank account to determine the status of the bank account and authorizing the transaction if the account is designated as 'enabled'. Mr. Zatcovich drew parallel

between the integers of this claim and the *MobileMoney*, to the extent that the latter required the activation of the card and performance of all the steps necessary for authorization of a transaction.

Claim 19

[32] Claim 19 is a method as claimed in any one of claims 17 or 18 in which the method includes authenticating the identity of the bank accountholder before permitting the status of a bank account to be changed. Basing his premise on his definition of 'authentication', Mr. Zalcovich identified this in the *MobileMoney* in that each time the card is enabled or disabled it prompts for the PIN number to determine the identity of the bank account holder, before permitting the status of the bank account to be changed.

[33] Mr. Zalcovich also sought to distinguish the concept of 'authentication' from 'authorisation' in the context of electronic transfers and banking systems. Authorisation, he said, is to determine whether one is allowed or not allowed to perform a particular transaction, whereas authentication is only used to determine one's identity in relation to that transaction. Authorisation may come from one or more sources, such as the one performed by a computer or by a banking system, which is called banking authorization. In another form, called 'user authorization' where the user is given the benefit of identifying specific transactions or functions which will or will not be allowed. Mr.

Zatcovich also made an overview of the basic steps of performing authorization of credit card transactions, as well as the various parties involved in those steps.

[34] Next Mr. Zatcovich dealt with the meaning of a 'Bank Account' as referred to in the patent specification, to include a credit card account and the functions and transactions associated with a credit card.

Mr. Bruynse

[35] Mr. Dirk Bruynse gave evidence as an expert on behalf of the defendants. He holds a B. Comm. degree (1994). He gained experience in information technology system when he was employed as a commercial manager by Dunair, an air-conditioning aftermarket company in 1995. The system used the internet as a data carrier mechanism and enabled dealers contracted to Dunair to access the system and order parts. From April 1998 to date he has been employed by various companies, mostly in financial systems and information technology. Of particular relevance to the issues in this matter, Mr. Bruynse was employed by Teba Bank from February 2002 to September 2005 where he obtained financial and mobile network experience. During this period, he oversaw a development team responsible for building an entire transaction processing system for Teba Bank.

[36] In October 2005 he was employed by the third defendant and is currently the head of its Research and Development. He has been extensively involved with the *MobileMoney* - the subject matter in dispute. In addition Mr. Bruynse has been involved

in various projects, including one where he was the payments systems expert for USAID where he was involved in providing an assessment of the technical, regulatory and business opportunities and obstacle related to mobile branchless banking in Palestine.

[37] After a detailed analysis of the patent specification, Mr. Bruynse also explained some of the key features of the *MobileMoney*. In this regard he testified that the *Mobilemoney* customer is provided with a bank account with the Standard Bank. The customer can carry out transactions using the funds in that bank account via an associated ATM card or credit card, a cellular telephone or over the internet. All transactions are routed through that bank account irrespective of whether they are initiated by the user's ATM card, credit card, his or her cellular telephone or the Internet.

[38] The ATM card can only be used for ATM transactions. The customer can use his credit card for point of sale (POS) transactions, card not present (CPN) transactions and automatic teller machine (ATM) transactions. The customer can use his cellular telephone for cellular telephone banking transactions such as person to person transfers, the purchase of air time or electricity and the payment of the bills. The customer can also access his account through the internet and carry out internet banking transactions such as electronic funds transfers (EFTs) in relation to that account.

[39] The *Money mobile* has a number of different transaction "channels" which operate to permit these different types of transactions. These channels, which operate as gateways to the account holder's bank account, include:

- (a) A card channel, which has a sub-channels channel for the ATM card and credit card. The credit card sub-channels, includes further sub-channels for ATM transactions and POS transactions. A CNP sub-channel for on-line transactions (such as purchasing books from Amazon.com) also forms part of the card channel but has its own gateway which operates independently of the other card channels. In effect, it operates as its own channel;
- (b) A cellular telephone banking channel for transactions carried out using the account holder's cellular telephone; and
- (c) An internet banking channel for transactions carried out while the user is logged onto his bank account on the internet (e.g EFTs).

[40] Before a transaction is sent for authorisation by *MobileMoney*, the transaction will have to proceed through one of these channels and all the other pre-authorisation checks have to have been successfully completed. If the channel is blocked the transaction will be refused before it proceeds to authorization. In MTN Banking, only the card channel and the CNP sub-channel can be blocked and un- blocked by the account holder. (The cellular telephone banking and internet banking channel cannot be blocked by the account holder.)

[41] In order to block or unblock the card channel, a customer accesses a wireless 'internet gateway' menu on his telephone. This is the menu that appears as one of the screenshots (annexure C8 to the particulars of claim). If the customer selects 'Card off' the card channel is blocked. If the channel is blocked, no transactions can be carried out using that channel. Thus, a customer with a credit card would not be able to carry out ATM or POS transactions using the card once the card channel is blocked. If the customer has an ATM card, the customer would not be able to carry out ATM transactions once the channel is blocked.

[42] If the customer selects "Authorisation" on the above-mentioned menu then the CNP channel is un-blocked for 15 minutes (the default position for this particular transaction being that the channel is blocked). The customer can thereafter carry out a CNP transaction. As soon as the transaction is complete or the 15 minute time period expires, the channel reverts to the default position (wherein the channel is blocked).

[43] Mr. Bruynse emphasised that blocking a channel has no effect on the other channels. Thus, switching 'off' an ATM card or credit card has no effect on the status of the customer's bank account, which remains active at all times. Thus, it is still possible for the customer to carry out other transactions using the bank account, for example CNP transactions (if the channel has been unblocked by selecting 'Authorisation' on the Gateway menu); EFT transactions on the internet or cellular telephone banking

transactions. In this regard he used Mr. Nel's transaction as an example. He stated that this was an ordinary card transaction and Mr Nel's card would have to have been 'on' (i.e. the card channel unblocked) for the transaction to proceed. Mr Nel could, however, have carried out other transactions using his account even if the card remained switched off, such as electronic funds transfers and cellular telephone banking transaction.

[44] Furthermore, unblocking the relevant card channel does not 'authorize' a particular transaction. In fact, switching the card 'on' serves only to partially pre-authorise transactions. Checking to see that the card was switched 'on' is part of the pre-authorisation check carried out by the card issuing retail bank (in this instance Standard Bank). The conventional pre-authorization checks (checking to see that the card is stopped, velocity checks etc) take place simultaneously with checking to see that the card is switched on. Only if the card is switched on and all of these checks have been completed successfully, will the transaction be allowed to proceed to authorisation.

[45] On the basis of the above, Mr. Bruynse expressed an opinion that the *Mobilemoney* does not enable the user to selectively designating a bank account status as enabled or disabled, on the instruction of an account holder issued from a remote device, which is integer 17(b) of the patent in suit. He based his opinion with reference to the patent specification's definition of 'enabled' or 'disabled'. In this regard he testified

that the *MobileMoney* customers cannot authorize transactions using a credit card or an ATM card by turning the credit card or the ATM card from their cellular telephone or the MTN internet banking website. Switching the card 'on' serves only to open the card channel. Only if this card channel is open, and the other pre authorisation steps are completed successfully, will the transaction be permitted to proceed to authorization. He opined therefore that even if the card channel is open, the transaction may not be authorized. The customer's bank account is not therefore 'enabled' by the customer switching 'on' his or her credit or ATM card.

[46] Mr. Bryunse made the distinction that using the card 'on/off' function of the *MobileMoney* to switch the relevant card 'off' does not 'disable' the customers' bank account. While ATM and POS card transactions are blocked when the card is switched off, it is still possible for the MTN customer to carry out CNP transactions on the internet, or cellular telephone banking transactions using the bank account. Consequently the *MobileMoney* does not permit its customers to designate the status of their bank account as enabled or disabled. In the light of the above, integer 17(b) was not present in *MobileMoney*.

Integers 17(c) and (d)

[47] Flowing from the above premise, Mr. Bryunse testified that integer 17(c) followed as a consequence of the user's designation in integer 17(b), that is, it is a result of selectively designating a bank account status as enabled or disabled that transactions

being the account are selectively authorized. As such he understood the third integer as meaning that a transaction is authorized or not authorized depending on whether the user has designated his or hers account as either enabled or disabled. Mr. Bruynse accordingly opined that integer 17(c) was not present in *MobileMoney*, because by switching the credit card or the ATM card 'on', a customer does not selectively authorize transactions. Similarly, with regard to integer 17(d), he testified that it required that 'the status' (i.e. whether the bank account is enabled or disabled) of the bank account be recorded in an account status database. *MobileMoney* did not allow users to enable or disable their bank accounts. As such the banking system does not record the status of the bank account in an account status database. Thus integer 17(d) was not present in the *MobileMoney*.

Claims 18 and 19

[48] Mr. Bruynse testified, with regard to claim 18 that the *Moneymobile* does not at any point interrogate (or permit any third party to interrogate) an account status database during a transaction to determine the status of the bank account. As to claim 19 he stated that the *Moneymobile* does not permit the status of the bank account to be changed on the instruction of the customer.

[49] Mr. Bruynse also testified that the word 'authorize' has a technical meaning within the banking environment and the term is used in accordance with this meaning in the specification of the patent. The authorisation of a transaction takes place after pre-authorisation. Once a transaction is authorized the funds are without more transferred

from the account holder to the merchant. Simply put, Mr. Bruynse suggested that the sequence in the *MobileMoney* is that there is pre-authorisation process followed by an authorization process, and completion of the process by payment to a merchant. According to the defendants, this sequence is important in distinguishing the *MoneyMobile* from the patent in suit, in that the latter required additional authorization, which, in the body of the specification and the diagrams, can only take place at the end of the transaction.

[50] A number of issues emerged from the evidence of the two experts, on which they expressed divergent views. I set out those that I find key in relation to the infringement.

- (a) the meaning of authorization and authorizing in the context of the patent
- (b) the meaning of the phrase 'selectively designating a bank account status as 'enabled' or 'disabled'
- (c) the meaning of the term 'account status database'
- (d) what is meant by a 'bank account' as it used in the claim,
- (e) when the bank account is designated as disabled, does this utterly block the entire account?
- (f) is the claim limited to methods of authorising a single transaction or does it also include within its scope methods of authorising multiple transactions?

[51] Before I consider these aspects, it is necessary to refer briefly to the applicable legal principles, which are to a great extent, trite and well-settled. A fundamental

principle of patent law is found in the well-known *dictum* of Lord Russell in *Electrical and Musical Industries v Lissen* 56 RPC 23 at 39. The principle was adopted by the then Appellate Division in *Steel Constructions (Pty) Ltd v African Batignolles Construction (Pty) Ltd*². The *dictum* reads:

“... The claims must undoubtedly be read as part of the entire document, and not as a separate document; but the forbidden field must be found in the language of the claims and not elsewhere. It is not permissible, in my opinion, by reference to some language used in the earlier part of the specification, to change a claim which by its own language is a claim for one subject-matter into a claim for another and a different subject-matter, which is what you do when you alter the boundaries of the forbidden territory...”

“... A claim is a portion of the specification which fulfills a separate and distinct function. It and it alone, defines the monopoly; and the patentee is under a statutory obligation to state in the claims clearly and distinctly what is the invention which he desires to protect.”

Patent interpretation

[52] To ascertain what it is that is ‘the invention’, and thus determine whether the patent is valid and infringed, it is necessary first to construe the claims of the patent. The leading case on the construction of patent specifications is *Gentiruco AG V Firestone SA (Pty) Ltd*³ where the rules of construction were formulated at 614A-616D, and restated in *Monsato Co v MDB Animal Health (Pty) Ltd (formerly MD Biologics CC)*⁴ as follows:

- (a) A specification should be construed like any other document, subject to the interpreter being mindful of the objects of a specification and its several parts;

² 1955 (4) SA 215 (A) at 224D-F.

³ 1972 (1) SA 589 (A).

⁴ 2001 (2) SA 887 (SCA).

- (b) The rule of interpretation is to ascertain, not what the inventor or patentee may have had in mind, but what the language used in the specification means, i.e. what the intention was as conveyed by the specification, properly construed;
- (c) To ascertain that meaning the words used must be read grammatically and in their ordinary sense;
- (d) Technical words of the art or science involved in the invention must also be given their ordinary meaning, i.e. as they are ordinarily understood in the particular art or science;
- (e) If it appears that a word or expression is used, not in its ordinary sense, but with some special connotation, it must be given that name since the specification may occasionally define a particular word or expression with the intention that it should bear that meaning in its body or claims, thereby providing its own dictionary for its interpretation;
- (f) If a word or expression is susceptible of some flexibility in its ordinary connotation, it should be interpreted so as to conform with and not to be inconsistent with or repugnant to the rest of the specification as a whole that certain words or expressions in the claims are affected or defined by what is said in the body of the specification, the language of the claims must then be construed accordingly.

(In paras 9 and 10 of *Monsato* Harms JA put a gloss to the rules laid down in *Gentiruco* by adding two qualifications with regard to, first, the construction of 'ordinary meaning'

of words, and second, the contextual reading of specification, including the definitions).

[53] In recent years, there has been a shift away from literalism towards contextualism. See for example *Aktiebolaget Hassle and another v Triomed (Pty) Limited*⁵ where Nugent JA at para 8 undertook useful review of the South African decisions (and the adoption of the approach in *Catnic Components Ltd and Another v Hill and Smith Ltd*⁶. In *Vari-Deals 101 (Pty) Ltd v Sunsmart Products (Pty) Ltd*⁷ the approach was set out as follows:

‘... (W)hat is sought by a purposive construction is to establish what were intended to be the essential elements, or the essence, of the invention, which is not to be found by viewing each word in isolation but rather by viewing them in the context of the invention as a whole... it is of course true that *Catnic* did not change the law relating to construction, but it certainly restricted the scope for contesting litigants to indulge in meticulous verbal analysis’ of specifications and claims-usually to an extent which would have been inconceivable to the ordinary skilled addressee reading the patent to ascertain the invention and the ambit of protection claimed. it also relieved the courts of the metaphorical ‘straitjacket’ of having to arrive at any interpretation of claims without having free recourse (subject to the well-established limits) to the specification in order to decide what the skilled addressee would have understood those claims to meant.’

[54] The question as to whether the defendant is infringing the asserted claims of the plaintiff’s patent, involves a comparison between the alleged infringing product and the

⁵ 2003 (1) SA 155 (SCA) para 1.

⁶ [1983] RPC 183 (HL) at 212.

⁷ 2008 (5) SA 247 (SCA).

actual words of the asserted claims (see *Stauffer Chemical Co. v Salsam Marketing & Distribution Co. (Pty) Ltd*⁶). It is only an infringement if each of the essential integers of a particular claim is present in the alleged infringing product. The claim is to be purposively interpreted by a mind willing to understand and 'not with an attitude of studied obtuseness'.

[55] In order to construe the patent specification, the court will have to be instructed by expert evidence in so much of the art or science commonly known as at the priority date as is necessary. The purpose of this evidence is to place the court as near as may be in the position of the interested, skilled members of the public to whom the patent is addressed as at the relevant date, which in the present case is 26 March 2001. The court must, in other words, be placed in the position of the notional 'addressee' of the patent in issue. This person has been judicially defined as the 'typical representative' or 'ordinary skilled or qualified persons in the art': *BM Group (Pty) Ltd v Beecham Group Limited*⁹.

The role of expert evidence

[56] In *Gentiruco*, above, it was made clear that the evidence of an expert's opinion to the meaning of a patent specification is inadmissible. For example, on the proof of infringement it has been held in *Johnson & Johnson (Pty) Ltd v Kimberly Clark Corporation & Kimberly Clark of South Africa (Pty) Ltd* that:

⁶ 1987 (2) SA 321 (A) at 342D-E.
⁹ 1980 (4) SA 536 (A) at 553E-F.

“...an expert witness cannot be heard to say whether there has been an infringement by the defendant. In *Seed v Higgins* (1860) VIII HL 550 (14 ER 544) Lord Campbell L.C. said at 551 that the opinion of a scientific witness: “That one machine is a piracy of the other is of no consequences whatever, for that is a question not in their province to decide.”¹⁰

[57] On the issue of proof of infringement the following was said in *Johnson & Johnson*, above, at 135C-136A:

“...an expert witness cannot be heard to say whether there has been an infringement by the defendant.

...

Generally speaking, guidance is the main function of the expert in a patent case. In *Parkinson v Simon* (1894) II RPC 493 (CA), Lord Esher MR said at 506

“I have always thought that the value of the expert evidence in such cases as this is that they can point out to you things which you yourself would not perhaps, without them, observe in two machines. They point out to you things that you must consider, but as to what their opinion is- whether they consider that the one is an infringement of the other, or whether they consider that the one is bad for want of novelty-I have always thought that is going beyond what they have any right to do, and that their opinion upon that is entirely subservient to the view of the tribunal which is trying the case.”

¹⁰ 1285 (11) BP 126 at 135 C-136

[58] Back to the facts of the present case. Having set out the proper approach, I deal with the issues I have identified as key to the issue of infringement.

Authorisation

[59] The plaintiff contends that the words 'authorisation' and 'authorising' bear their ordinary meanings. The defendants contend for an esoteric meaning. It would be recalled that in his evidence, Mr. Bruynse testified that the words bore technical meanings within the banking art to mean that final authorisation from the issuing bank to the clearing bank. However, Mr. Bruynse's evidence is not borne by any of the relevant documents. Clauses 5.3, 6.10.2 and 7.3 of the *Moneymobile* 'Terms and Conditions' make it plain that the word 'authorise' denotes authorization by the card holder and not 'final' authorization by the issuing bank. Clause 5.3 states: 'You must *authorise* your transactions using your secret PIN...' Clause 6.10.2 provides that '... by entering your PIN ... you also agree and confirm that you *authorised* the... transaction...' Mr. Zalcovich's evidence on this aspect was clear and to the point. In the specification of the patent in suit, it is made clear that 'the transaction authorisation system allows an account holder to designate a bank account as enabled to disabled, i.e to provide authorization for any transactions performed using the account' McAllister, one of the prior art documents used by the defendants for invalidity, apparently also uses the word 'authorise' in its ordinary meaning.

Sequence of authorization

[60] During the cross-examination, Mr. Bruynse went as far as to suggest that it was impossible to perform the additional authorization of the invention anywhere else but as a final step. Mr. Zatzovich, on the other hand, disagreed with this. He emphasized that where in a patent specification sequence of operations is identified then the sequence is very important. When the claims do not identify a very specific sequence of operations (and he suggested the patent in suit is one such) one has to look towards the specification as to whether an embodiment required a specific sequence in order to perform the function. In his opinion, in the context of the patent in suit it would not matter if either of the conventional authorization or the patent authorization is performed first. Mr. Zatzovich pointed out that it would make no difference in should one choose to do additional authorization before the standard authorization. I prefer Mr. Zatzovich's reasoning in this regard.

[61] It is noteworthy that this supposition (of impossibility of any other sequence) was raised for the first time by Mr. Bruynse during cross-examination. Although Mr. Zatzovich was cross-examined at length on this topic, it was never put to him that any other sequence was impossible. Although in the body of the specification and the diagrams the sequence puts additional authorisation as a final step, there is nothing to suggest that it cannot be performed at any stage of the transaction. In any event, even if this conclusion is wrong, I take a view that the sequence does not have a significant functional impact on performing the authorization.

Does the patent freeze the account as the debit card fully blocked account?

[62] Mr. Bruynse, in seeking to distinguish between the patent and the Moneymobile, testified that the patent contemplates the complete and utter disablement of the bank account associated with the transaction processing capability within the patent. On the other hand, in the Moneymobile, the blocking of any of the three channels (card, cellphone banking and internet banking) would not have an effect on the other channels. During cross-examination he qualified this by stating that other transactions like EFTs could take place, unless they were set up to be governed by the patent as the final step of authorization of the transaction. However, he ultimately conceded that the user of the patent had the option not to set up such transactions in conjunction with the debit card. In other words, the user may allow a debit card to be subject to the patent without freezing the underlying associated account. To this extent, therefore, there is no significant difference between the invention and the *MobileMoney*.

Bank account and Account Status Database

[63] Mr. Bruynse's evidence was that the ordinary meaning of a bank account is (and was at the priority date of the patent) the ledger account where an account holder's transactions are recorded. Thus, if funds are withdrawn from the account holder's bank account, the account is credited and if funds are deposited in the account, the account is debited. I think that the meaning contended for on behalf of the defendants is too literal and does not take into account the context of the patent. The patent makes it abundantly clear that 'bank account' refers not only to a bank account in the strict,

regular sense but also as a credit card (bank) account, and a debit card (bank) account. It also appears from the specification that a credit card account or a debit card account may be associated with a (regular) bank account. In the definition of his patent, McAllister defines a 'bank account' also defines it to include a credit card. I therefore take a view that a 'bank account' in the context of the patent includes credit card and debit card accounts. It follows therefore that all data stored in relation to whether they are enabled or disabled would be stored in an 'account status database' which I understood to mean an electronic storage memory, recording whether the account is enabled or disabled.

Have claims 17, 18 and 19 been infringed?

Claim 17

[64] This claim, it is to be recalled, describes '(a) a method of authorizing a transaction (b) the method including selectively designating a bank account as enabled or disabled (c) on the instruction of an account holder issued from a remote device (d) thereby causing to selectively authorize transactions performed using the bank account'.

Integer (a)

[65] I have dealt with the meaning of 'authorise', and came to the conclusion that the meaning ascribed thereto by the defendants is untenable. I have also accepted that the other card transactions are not utterly blocked once the account is disabled. I am satisfied that the 'on/off' function of the *MobileMoney* similarly renders the accounts

enabled' or 'disabled'. Flowing from this, the transactions will be 'authorized' or 'unauthorized' within the ordinary meaning of those words. To that extent, I find that integer 17(a) is present in the *MobileMoney*.

Integer (b)

[66] From the totality of the evidence, it is clear that it is indeed the user who enables or disables the bank account to authorize a transaction in terms of the invention, and not the bank.

Integer (d)

[67] In the manner the *MobileMoney* was demonstrated to function, I agree with Mr. Zatcovich's inference that an account status database must necessarily be present so as to record whether the card channel has been blocked or unblocked, taking into account the meaning I accept of a 'bank account'.

Claim 18

[68] Claim 18 includes all of the integers of claim 17 and adds the following integers: '(a) in which the method includes interrogating the account status database during which a transaction involving the bank account to determine the status of the bank account, and (b) authorising the transaction if the account is designated as enabled'. Counsel for the plaintiff contended that the *MobileMoney* would interrogate the 'card channel database', which, if taken in the context of the meaning of the concepts considered earlier, would place

the card channel database within the definition of account status data use of the patent.
I agree with this construction.

Claim 19

[69] Claim 19 is a method as claimed in claims 17 and 18, and includes the following integer: 'in which the method includes authenticating the identity of the bank account holder before permitting the status of the bank account to be changed'. From Mr. Zalcovich's screenshot demonstrations, it is clear that before the *MobileMoney* card holder can proceed to the 'on/off' function on his or her cell phone, the user has to authenticate himself/herself.

[70] On a conspectus of the evidence, I am therefore satisfied, and find, that the *Moneymobile* has the integers of claims 17, 18, and 19 of SA Patent 2002/2337 and has thus infringed those claims. Before I leave this subject, I must record that during the course of the trial it became common cause that the 'on/off' function of the *MobileMoney* was disabled on 13 January 2012.

INVALIDITY

Lack of novelty

[71] Lack of novelty is a ground revocation in terms of s 25(1) (5) and (6) of the Act, read with s 61(1)(C). The relevant provisions of the s 25 read as follows:

- (1) A patent may, subject to the provisions of this section, be granted for any new invention which involves an inventive step and which is capable of being used or applied in trade or industry or agriculture.
- (5) An invention shall be deemed to be new if it does not form part of the state of the art immediately before the priority date of any claim to that invention.
- (6) The state of the art shall comprised all matter (whether a product, a process, information about either, or anything else) which has been made available to the public (which in the Republic or elsewhere) by written or oral description, by use or in any other way.'

[72] In so far as the ground of revocation based on lack of novelty is concerned, it was emphasised in *Gentiruco*, above, at 646H that the opinions of the expert witness that a document does or does not anticipate a claim of the patent in suit must be disregarded, as that is for the court to decide. Trollop JA went on to state the following general principles at 646C-647A:

- (a) the objection of anticipation relates to the claims and not the description of the invention in the body of the specification;
 - (b) the particular claim must be construed to ascertain its essential elements or integers;
 - (c) for the purpose of the objection of anticipation the claim so construed is assumed to be inventive;
 - (d) the prior printed publication or patent alleged to be anticipatory is then construed;
 - (e) the two documents are then compared to ascertain whether the prior patent was granted for, or the prior printed publication 'describes' the same process as that claimed;
-

- (f) "In regard to a prior publication, the ordinary meaning of 'described' means to set forth in words or recite the characteristics of". Hence for it to describe the invented process it must recite at least its essential integers in such a way that the same process is identifiable or perceptible and hence made known, or the same or substantially the same thing can be made, from that description;
- (g) 'Substantially the same' means 'practically the same', the same 'for the purposes of practical utility, that is, substance and not form must be regarded;
- (h) if on a comparison of the two documents it appears that the same or substantially the same process is described in the above sense in both, the claim has been anticipated and is not novel; conversely, if the description in the prior document differs, even in a small respect, provided it is a real difference, such as the non-recital of a single essential integer the objection of anticipation fails;
- (i) an allegedly anticipatory document is to be constructed at the date of its publication 'to the exclusion of information subsequently discovered'.

[73] The test for anticipation is the one found in *Hill v Evans*¹¹, which was formulated as follows:

"... (T)he information as to the alleged invention given by the prior publication must, for the purposes of practical utility, be equal to that by the subsequent patent. The invention must be shown to have been before made known. Whatever, therefore, is essential to the invention must be read from the prior publication."

¹¹ (1862) 31 LJ Ch 457

[74] Clear and unmistakable directions are required in the prior art documents (see *Flour Oxidizing Company Ltd v Cair*¹²; *Canadian Electric Co v Fada Radio Ltd*¹³ and *General Tire & Rubber Co. v Firestone Tyre & Rubber Co. Ltd*¹⁴)

The prior art documents

[75] The defendants rely on four prior art documents for purposes of anticipation, McAllister, Checchio, Landry and Stein. The last two documents relied upon conditionally, depending on my finding whether the claims of the patent in suit include within their scope, methods and systems by which customer pre-authorise transactions (as the MTN system does) as opposed to authorise transactions as claimed in the patent. I have already made that finding.

McAllister

[76] McAllister describes a system and method for enhancing the security of use of a transaction device such as a credit card through a telephone system wherein the subscriber may establish through the telephone network a series of parameters which must be satisfied in order to activate the credit card to permit validation by passage of the card through the conventional point-of sale magnetic swiping device. The parameters may include subscriber establishment of an activation time frame, an activation area, a dollar limit on purchasing power, a temporary PIN valid subject to satisfaction of the other parameters, and voice verification.

¹² [1908] 25 R.P.C. 438

¹³ [1930] 47 R.P.C. 69, 190

¹⁴ [1972] R.P.C. 457 at 485

[77] According to one version of the invention in McAllister, the credit card holder subscribes to the service to set up a PIN and/or a voice print or template to control his credit card use. Prior to the use of the card the card holder accesses the security system by a landline telephone (preferably his residence telephone) and effects verification by the pre-established PIN or voice template or both. Following such verification the card holder establishes or sets parameters at least one and preferably two or more of the following parameters:

- (a) A stated time frame during which the card will be activated, for example, for the next three hours;
- (b) A limited amount of the purchasing power of the card that time;
- (c) A geographical area or location wherein the card will be activated
- (d) A temporary PIN which the subscriber desires to have applicable under the restrictions set out in (a) (b) (c) above;
- (e) A voice verification using the pre-established template.

[78] The last two ((d) and (e)) are really not parameters, but forms of authentication, and have nothing to do with enabling or disabling a bank account. The temporary PIN resides in an authentication data base. Either of these (PIN or voice template) would be used at the point of sale and not remotely.

[79] Mr. Zalcovich was adamant that McAllister cannot be used in respect of a single transaction. Even if one only sets up the parameters on a one time basis, one is still bound by a time frame, an amount limit, or a geographical area, and any one of those

parameters, or a combination of any of those, cannot specify a single transaction. Mr. Ginsberg, counsel for MTN, put a proposition to Mr. Zalcovich during cross-examination that McAllister was capable of enabling and disabling a single transaction using a landline telephone. Reliance was placed for this proposition on a passage in the McAllister patent which reads as follows:

'It will be understood that the subscriber may utilize any combination of the foregoing safeguards on a one-time basis or per day, per week, or per month schedule'.

[80] Counsel sketched a scenario during the cross-examination of Mr. Zalcovich in which a subscriber, using his residence telephone (as a remote device) sets the parameters using an amount limit and time, thus making it a single transaction. I think Mr. Zalcovich's response in this regard is cogent:

'... (T)he fact that we have to think very hard and be very clever as to how we are going to utilize these parameters, tells us that ... McAllister was not intended to enable or disable a single transaction.'

[81] Enabling by setting parameters such as time and money limits is not covered by claim 17, which has an obvious limitation and claims the one embodiment described in the patent specification allowing the user to selectively enable and disable the account. The reading of the claim is plainly limited to a single transaction. The subsequent use of the plural 'transactions' does not, in my view, detract from the clear thrust. Thus,

properly construed, McAllister does not disclose all the essential features of the patent in suit.

[82] At the end of the day, it should be borne in mind that the overriding functioning of the patent in suit is added security and authorization for on-line transactions, something which is not described or envisaged in McAllister. In my view, far from advancing the defendants' argument, Mr. Ginsberg's example simply demonstrates that McAllister does not give 'clear and unmistakable directions' enabling a customer selectively to disable a bank account after a single transaction has taken place. The reading of McAllister in this manner would, in my view, amount to indulging in 'meticulous verbal analysis to an extent which would have been inconceivable to the ordinary skilled addressee reading the patent to ascertain the invention and the ambit of the protection claimed'

(see *Vari-Deals* 101, above).

Checchio

[83] Checchio teaches a method and apparatus for pre-authorising transactions including provision of a communication device to a vendor and a credit card owner. In particular, the invention concerns pre-authorising a credit card for a particular transaction and subsequently initiating the authorized transaction at a vendor location using the credit card via credit card authorization device. The summary of Checchio states the object of the invention as being to provide an authorization method and apparatus which pre-stores transaction information and allows vendors to determine

whether a user at any location is authorized to use a particular card for a particular transaction.

Integer 17(b)

[84] The authorization of a particular transaction in Checchio is not done by enabling or disabling a bank account. Checchio description envisages an authentication database which stores details to permit the future conduct of a single transaction. The claims in Checchio arises from the fact that the purchaser has to determine the ID of the vendor, the transaction amount and perhaps certain other optional parameters associated with a particular transaction. These details are stored in 'an authentication database' and will in due course be used in order to authenticate a particular transaction. This teaching is very different to that of the patent in suit. Integer 17(b) of the patent in suit is therefore not present in Checchio.

Integer 17(d)

[85] In Checchio the information is stored in an 'authentication database' which by definition is not an 'account status database' and is incapable of reflecting the status of an account. This integer is similarly not present in Checchio.

[86] Overall, Checchio, like McAllister, does not give a 'clear and unmistakable' direction to perform the steps of the method of claim 17 of the patent in suit

Claims 18 and 19

[87] It follows that absent an account status database there cannot be any interrogation, and accordingly, no status in the bank account can be changed.

Landry

[88] Landry describes a system and method of paying bills without requiring interaction with the payer disclosed. In terms of this system, both the payer and payee have to subscribe to the system which is under the control of a third party, who operates the system. The system includes a payer control interface, a communication interface, a bill generator, and a Transfer Communication Facilitator (TFC) message generator. The bill generator generates bill records from the payer and payee information stored within the system for recurring bills. The payer may alter the payment amount and date for the bill as well as reverse payment of a bill already paid. The payer record status is used to indicate the status of a payer within the system and confirm whether an obligation submitted by a payee may be paid or not. The payer status may be one of the values: active, temporarily suspended, permanently suspended, closed or deleted. The defendants relied on the 'Temporary Suspension' and 'Hold On Payer/Child Transfer Record' modes, for a contention that this system is capable of enabling and disabling of the account status for authorising a transaction.

[89] The latter mode, where a 'hold' is placed on a particular 'Payer Child-Transfer record, is an occurrence reversing a transaction after the goods had been delivered.

This is certainly what the patent in suit teaches, which is to prevent unauthorized transactions from occurring in the first place.

Stein

[90] Stein concerns the purchase of information over the internet and is designed to prevent the broadcast of bank details over the internet. It is directed to authentication and not authorization. It requires contact between a payer and a payee and the verification of the payer's details prior to any payment being made. There is no account status database in Stein nor is there any designation of the account as being enabled or disabled. It is simply a process of verification rather than alteration of a bank account status. It was suggested during the cross-examination of Mr. Zatzovich that the function which permits the purchaser to say "yes", "no" or "fraud" in response to confirmation of a single transaction, is equivalent of enabling or disabling of the account as found in the patent in suit. Mr. Zatzovich distinguished Stein by stating that it provided for a certain portion of online transactions, very selected ones for that matter. Perhaps the most distinguishing factor is that the system in Stein is meant for buying information, and not for making purchases. There is no discussion in the patent as to how one could handle physical transactions, even if one accepts that it is conceivable that one could buy, say an electronic book, as suggested by Mr. Ginsberg. I therefore conclude that Stein does not have the essential integers of any of the claims, and did not anticipate the invention.

[81] To conclude on this aspect, I find that none of the prior art relied upon by the defendants anticipated the invention in the patent in suit. The defendants have failed to discharge the onus resting on them.

Lack of inventive step.

[92] A patent may be revoked in terms of s 61(1) of the Act on the ground that it is not patentable under s 25. In terms of s 25(1) to be patentable the invention must be one 'which involves an inventive step'.

Section 25(10) of the Act provides that:

"(10) Subject to the provisions of section 39(6), an invention shall be deemed to involve an inventive step if it is not obvious to a person skilled in the art, having regard to any matter which forms, immediately before the priority date of the invention, part of the state of the art by virtue only of sub-section (6) (and disregarding sub-sections (7) and (8))."

[93] In relation to obviousness, it is the technical evidence by expert witnesses which constitutes the primary evidence in respect of (i) the nature of the step claimed to have been inventive; (ii) the state of the art as at the priority date relevant to that step; and (iii) the respect or respects in which the step goes beyond or differs from that state of the art. See *Schlumberger Logelco v Coflexip SA*⁵ where it was remarked as follows:

"It is the technical evidence by expert witnesses in respect of the nature of the step claimed to have been inventive, the state of the art as at the priority date relevant to that step and the respect or respects in which the step goes beyond or differs

⁵ 2003 (1) SA 16 (SCA) para 34

evidence. It is clear from a reading of the *Ensign-Bickford* case, at 84D-83A, that the Court considered the question of obviousness on that basis. The technical evidence of the witnesses was considered without any reference to their opinions as to whether the invention was obvious. Expert witnesses who are either of the opinion that the invention is obvious or that it is not obvious would almost invariably give the primary technical evidence. In those circumstances it may sometimes be difficult to avoid them expressing the conclusion that the step is either obvious or not obvious, but that would do no harm so long as is borne in mind that that conclusion is immaterial.¹⁶

[94] The general approach on the issue of obviousness was recently stated by the Supreme Court of Appeal in *Ensign-Bickford (South Africa) (Pty) Ltd and Others v AECI Explosives & Chemicals Ltd*¹⁶:

"As is pointed out in *Roman Rolier CC and Another v Speedmark Holdings (Pty) Ltd* 1996 (1) SA 405 (A) at 413, in order to apply these provisions (of the Act) to a particular case it is necessary to determine what the art or science to which the patent relates is, who the person skilled in the art is and what the state of the art at the relevant date was. But the inquiry, in my view, must then proceed further. After those factors have been determined, a more structured inquiry must be undertaken. For this, it is appropriate to adopt tests formulated in certain English authorities. The tests proposed do not differ from some of the inquiries suggested in the earlier practice in our courts but they are conveniently arranged in a suitable sequence in the case of *Mölnlycke AB and Another v Procter and Gamble Ltd and Others (No 5)* (1994) RPC 49 (CA) at p115. Four steps are identified. They include or restate in part what has been said above but may be taken to conveniently list the inquiries to be made:

- "(1) What is the inventive step said to be involved in the patent in suit?
- (2) What was, at the priority date, the state of the art (as statutorily defined) relevant to that step?

¹⁶ 1996 (1) SA 70 (SCA) 791-801

-
- (3) In what respect does the step go beyond, or differ from, that state of the art?
- (4) Having regard to such development or difference, would the taking of this step be obvious to the skilled man?

See also *Ausplow (Pty) Ltd v Northpark*¹⁷ where the SCA cited with approval the test as was restructured in *Pozzoli Spa v BDMO SA & Another*¹⁸, as follows:

"(a) Identify the notional 'person skilled in the art'; (b) Identify the relevant common general knowledge of that person; (2) Identify the inventive concept of the claim or if that cannot readily be done, construe it; (3) Identify what, if any, differences exist between the matter cited as forming part of the 'state of the art' and the inventive concept of the alleged invention as claimed as construed; (4) Viewed without any knowledge of the alleged invention as claimed, do those differences constitute steps which would have been obvious to the person skilled in the art or do they require any degree of invention?

[95] In *Northpark Trading v Ausplow (Pty) Ltd*¹⁹ at para 13 we were, once again, reminded against the danger posed by hindsight in assessing whether a step is inventive:

'What with hindsight, seem plain and obvious, often was not so seen at the time.'

[96] I proceed to consider the facts against the factors mentioned above.

¹⁷ [2011] ZASCA 23 (7 September 2011) para 34

¹⁸ [2007] EWHC (CIV 588) para 23

¹⁹ 2008 BIP 14 (SCA) at 12

Person skilled in the art

[97] It was submitted that Mr. Zalcovici is not a person skilled in the art at the priority date. I do not agree. According to the uncontroverted evidence, he has been involved in computer science software and system development for 30 years, 25 of which he gained experience in authentication of electronic transfers. In the last 8 years he has been involved with banking transactions. This is the art to which the patent in suit relates.

The inventive concept

[98] Mr. Zalcovich testified that although various attempts were made in the 1990's and early 2000's to devise a method for sending secured internet transactions, but nothing really came of those efforts. This resulted in the prevalence of credit card fraud in three forms he identified. The patent in suit provides a simple and unique method through added security for online transactions.

The differences between the invention and 'prior art'

[99] From the discussion on novelty above, it is quite clear that each of the prior art documents cited, had each very disadvantaging limitations. For example, to use McAllister one has to have access to a landline, which can be inconvenient, whereas the present invention is suited for convenient cellphone use. For Checchio, one has to know the identity of the vendor and the amount of the transaction. The limitation, and clumsiness, of this system was aptly demonstrated during the cross-examination of Mr. Bruynse. Mr. Puckrin postulated his trip to Cape Town as an example. For him to

use his credit card through the Chocchis system, he would before hand, have to know exactly what restaurant he would dine in, and the exact amount for the meal! Landry and Stein describe very different methods to the patent in suit.

Inventive step?

[100] Mr Zatkovich testified that the invention would not have been obvious to him, as a skilled addressee, at the priority date. He testified that at the priority date he was not aware of anyone in the industry who ever considered using such a simple solution for a complex problem of the three forms of fraud.

[101] It is clear that Standard Bank was particularly interested in the invention disclosed in the patent in suit. Counsel for the plaintiff pointed out that had the invention been so obvious then, it is inconceivable that Standard Bank would have entertained Dr Reiners on so many occasions and even requested him for an RFI. I agree. The very fact that Standard Bank requested exclusivity on the negotiations, suggests quite strongly that it's technical advisors regarded the patent as inventive. There is no explanation as to why its officials did not even have the courtesy to revert to Dr. Reiners.

[102] Considering the evidence of both expert witnesses, I am satisfied that at the priority date, the patent in suit involved an inventive step. The defendants bore the onus of proving that the claims are invalid on the grounds of obviousness. They have failed to discharge that onus.

PARTIAL VALIDITY

[103] I have found claims 17, 18 and 19 to be valid and infringed. No submissions have been made on behalf of the plaintiff opposing the defendants' counterclaim for revocation of claims 1 – 16 and 20 – 25. The counterclaim should therefore be granted for revocation of those claims. There is therefore partial validity of claims. S 68 of the Act provides as follows:

"68. Relief for the infringement of partially valid specification

Where in any proceedings for infringement of a patent, the commissioner finds that any claim in the complete specification in respect of which infringement is alleged, is valid, but that any other claim therein is invalid, the following provisions shall, notwithstanding anything contained in section 66(5), apply, namely –

- (a) If a counterclaim for the revocation of the patent has been made in the proceedings on the ground of the invalidity of any claim in the specification, the Commissioner may postpone the operation of any order issued thereon for such time as may be required to enable the patentee to effect any amendment of the specification pursuant to the conditions imposed by the Commissioner, who may attach such other condition to any order to be issued on the counterclaim as he may deem fit; and
- (b) when the specification has been amended in terms of paragraph (a), the Commissioner may, subject to such order as to costs as he may issue and as to the date from which damages shall be calculated, grant relief in respect of any claim which it had, before the amendment, being found to be valid and infringed, and in exercising his discretion he may take into consideration the conduct of the patentee in inserting in the specification those claims which have been found, before amendment, to be invalid or permitting such claims to remain there.

[104] The defendant's argued that in terms of the above provisions, the plaintiff is not entitled to any relief. They sought an order dismissing the plaintiff's claim with costs. They placed reliance for such contention, on *Deton Engineering Pty Ltd v McKelvey and Others*²⁰, in which it was concluded that the court is not empowered to grant relief on infringement proceedings where one or more of the claims of a patent are invalid unless and until the defect had been rectified by proper amendment.

(See also *H. Lundbeck A/S and Another v Cipla Medpro (Pty) Ltd*²¹ and *Ausplow Pty v Northpark Trading Ltd and Others*²²).

[105] In *Pfizer Ltd and Another v Cipla Medpro (Pty) Ltd and Others*²³ Botha J expressed a view, albeit *obiter*, that the interpretation of s 68 in *Deton Engineering* might be open to doubt, having described counsel's argument before him (*contra Deton Engineering*), to be 'persuasive'. However, as the issue before him involved a simple application to correct clerical errors of the patent specification, which was ripe for hearing, he considered the application without having to be seized of the task of determining the correctness or otherwise of *Deton Engineering*.

[106] No argument was proffered that the conclusion in *Deton Engineering* is 'clearly wrong' (for I can only deviate from it if I find that to be the case). Counsel seemed to be in agreement in principle on the correctness of the conclusion in that case. However,

²⁰ 1995 BP 288 (CP) at 236C – 239B

²¹ 2008 BIP 79 (CP) para 11

²² 2010 BP 51 (CP) para 20

²³ 2005 BIP 1 (CP)

counsel for the plaintiff sought to distinguish the situation in that case from the present, for the plaintiff to escape the effect of the judgment in *Deton Engineering*.

[107] The distinction is said to be this. In that case, where an interim interdict was sought, there was no counterclaim for renovation, whereas in the present case there is an action for final relief and a counterclaim for revocation. This, counsel submitted, was a distinguishing factor 'which took the matter entirely out of section 68 of the Act'. What is said to be a distinguishing factor between the present case and *Deton Engineering*, namely the absence of a counterclaim, was expressly considered by Van Dijkhorst J 'not to affect the issue'.

[108] I am not entirely certain what the contention between counsel was in this regard, for, they seemed to be in agreement as to the proposed order to make. Whatever the position is, I must make an order that reflects my findings, which also take takes into consideration a clear discretion afforded to me in terms of s 68(a).

[109] To sum up: I have found that claims 17, 18 and 19 are valid and are infringed by the *MobileMoney*. The patent survived the prior art relied upon by the defendant. Similarly, I have found the patent to be inventive. The order I must make therefore is to revoke claims 1-16 and 20-25, but suspend the operation of the revocation order, in order to afford the plaintiff an opportunity to apply for an amendment of the specification.

[110] Finally, the issue of costs. This is a matter which is within my discretion, which of course, must be exercised judiciously having regard to all the circumstances. In this regard I take into account preliminary and interlocutory applications brought by the defendants before and during the trial. In my view those were side-issues which resulted in unnecessary wasted costs and court time. In the circumstances I am of the view that a fair and equitable order with regard to costs is that the plaintiffs are entitled to the costs of proving infringement. The defendants are of course entitled to the costs relevant to their counterclaim. The costs consequent on employment of three counsel (for the plaintiff) and two counsel (for each of the first defendant, on the one hand, and the second and third defendants, on the other) are appropriate. There is no doubt that this matter warranted employment of more than one counsel, given its importance to the parties and the involved nature of the issues.

[111] For all of these considerations, I made the order referred to in paragraph 1 above.



TM MAKGOKA
COMMISSIONER OF PATENTS

DATES OF HEARING : 01, 02, 03, 04, 05, 06, 07, 08, 09, 10, 11, 12 AUGUST 2011; 13, 14 and 20
FEBRUARY 2012

JUDGMENT DELIVERED : 14 SEPTEMBER 2012

FOR THE PLAINTIFF : ADV CE PUCKRIN SC
ADV A FRANKLIN SC (AUSTRALIA)
ADV R MICHAU SC

INSTRUCTED BY : *STEMELA & LUBBE ATTORNEYS*, PRETORIA

FOR THE 1ST DEFENDANT : ADV LG BOWMAN SC (with ADV C CIRONE)

INSTRUCTED BY : *BOWMAN GILFILLAN*, JOHANNESBURG

FOR THE 2ND AND 3RD DEFENDANTS : ADV P GINSBURG SC (with ADV G MARRIOTT)

INSTRUCTED BY : *SPOOR & FISHER*, CENTURION