



PATENTS ACT 1977

APPLICANT Bloom Health Corporation

ISSUE The Patents Act 1977:
whether patent application GB1223381.3 complies
with section 1(2) of the Act

HEARING OFFICER Dr L Cullen

DECISION

Introduction

- 1 This decision concerns patent application GB1223381.3 entitled "*Systems and methods for customizing product selections based on member parameters and providing the selections to members for purchase*" in the name of Bloom Health Corporation. This application was filed under the provisions of the Patent Cooperation Treaty (PCT) on 10 June 2011, claiming an earliest priority date of 28 June 2010, and was initially published as WO 2012/009073 on 19 January 2012. On entering the national phase in UK, it was subsequently re-published as GB 2495039 on 27 March 2013.
- 2 The examiner issued an abbreviated first examination report on 11 February 2013 in which he expressed his view that the application was excluded from patentability under section 1(2) of the Patents Act 1977 since it related to a computer program and/or a business method as such. Despite the amendments and arguments offered by the applicant in their letter dated 4 June 2013, the examiner remained of the opinion that there was little prospect of this application proceeding to grant, and issued a second report to this effect on 2 July 2013. In line with IPO practice¹ in such circumstances, the examiner offered a hearing to deal with this issue which the applicant accepted.
- 3 The matter therefore came before me at an oral hearing on 6 September 2013. The applicant was represented by Dr David Pearce of Barker Brettell LLP, assisted by Ms Amy Xu of Dorsey and Whitney LLP (the applicant's representatives in the US). I was assisted at the hearing by Mr Stephen Jennings, a senior patent examiner at the IPO. The hearing was also attended by one observer for training purposes.

¹ See paragraph 18.79 of the Manual of Patent Practice, <http://www.ipo.gov.uk/practice-sec-018.pdf>

- 4 In advance of the hearing, in a letter dated 30 August 2013, the applicant's representative filed skeleton arguments and an alternative set of claims to replace those on file and which were to form the basis of discussions at the hearing.

The Invention

- 5 The background of this invention is the provision of health care products or insurance products. A large portion of the population of the United States has employer based health insurance, i.e. employers provide or contribute towards the cost of health insurance for their employees. The process of selecting a health insurance plan which is acceptable to the employer and appropriate for the employee can be complicated and time consuming. The invention provides a web-based method which assists the employer and the employee with this process.
- 6 In short, the invention relates to a web based method for allowing an employee to purchase from a recommended selection of products. The selection is based on parameters entered by the employer, in particular, the amount of money that the employer is prepared to provide for the employee to purchase a product. The selection is also tailored to the employee, based on an employee profile established through the employee's responses to a survey.
- 7 As noted above, the applicant filed a revised set of claims on 30 August 2013 for consideration at the hearing, replacing all earlier claims, including those considered by the examiner. There are 12 claims, of which only claim 1 is independent. Claim 1 reads as follows:

A secure web-based method for customizing product selections based on employer parameters and providing the selections for employee purchase, the method comprising:

providing a secure web-based system that allows an employer of the employee to register with the system;

providing formats to be selected by the employer related to a category of product that the employer makes available to the employee via the secure web-based system, wherein one of the selected formats comprises an amount of money the employer will commit to an employee account set up on the secure web-based system in order for the employee to purchase an identified product;

providing the secure web-based system for the employee of the employer to register with the secure web-based system;

automatically administering a survey via the secure web-based system to the employee, wherein the employee's responses provide a personality profile via a personality profile module to be used as inputs for a recommendation engine module, and the personality profile is accessible to the employee as to whether or not the personality profile has been accurately characterized and/or revised accordingly;

automatically generating at least one product that meet criteria of the employee as established by the responses of the survey made by the employee and that meet criteria of the employer as established by the selected format; and

providing an identified product for purchase by the employee that is paid for by the system via the employee account.

The Issues to be decided

- 8 The only issue to be decided is whether the application complies with Section 1(2) of the Act.

Excluded Matter – Section 1(2)

The Law

- 9 Section 1(2) of the Act sets out certain categories of invention that are not patentable as follows:

*“It is hereby declared that **the following** (among other things) **are not inventions for the purposes of this Act**, that is to say, anything which consists of –*

(a);

(b);

*(c) a scheme, rule or **method for performing a mental act, playing a game or doing business, or a program for a computer**;*

(d) the presentation of information;

but the foregoing provision shall prevent anything from being treated as an invention for the purposes of this Act only to the extent that a patent or application for a patent relates to that thing as such.”

- 10 Current IPO examination practice is to use the structured approach set out by the Court of Appeal in its judgment in *Aerotel/Macrossan* (hereafter *Aerotel*)² for deciding whether an invention is patentable. The test comprises four steps:

- (1) Properly construe the claim;
- (2) Identify the actual contribution;
- (3) Ask whether it falls solely within the excluded matter;
- (4) Check whether the contribution is actually technical in nature.

Operation of this test is explained in paragraphs 40-48 of the *Aerotel* judgment. Paragraph 43 confirms that identification of the contribution is essentially a matter of determining what it is that the inventor has really added to human knowledge and involves looking at the substance of the invention claimed, rather than the form of the claim. Paragraph 46 explains that the fourth step of checking whether the contribution is technical may not be necessary because the third step – asking whether the contribution is solely of excluded matter - should have covered that point already.

² *Aerotel Ltd v Telco Ltd*; *Macrossan’s Patent Application* [2006] EWCA 1371, [2007] RPC 7

- 11 More recently, the Court of Appeal in the case of *Symbian* [2009] RPC 1 (hereafter *Symbian*) confirmed that this structured approach is one means of answering the question whether or not the invention reveals a technical contribution to the state of the art. In other words, *Symbian* confirmed that the four-step test is equivalent to the prior case law test of ‘*technical contribution*’, as discussed in *Merrill Lynch*³, *Gale*⁴ and *Fujitsu*⁵.

Construing the claims

- 12 There was some discussion of claim 1 at the hearing, and of how the invention actually worked. Dr Pearce helpfully explained a number of features of claim 1, particularly some of those that had been added or re-worded in the most recent set of amendments.
- 13 Dr Pearce explained that the essential parameter that must be input by the employer is the amount of money that the he is willing to commit for the employee to purchase a product, and this of course is explicitly claimed, but he noted that the term “formats to be selected” encompassed additional parameters such as how the employer wished the system to deal with full time, part time or former employees.
- 14 Dr Pearce also provided some helpful comments on the operation and purpose of the “*personality profile module*”. Essentially, the employee has to answer a series of questions in a survey, and based on the responses the system generates a personality profile for the employee. It is this personality profile (along with the parameters entered by the employer), and not the survey responses *per se*, that is used to generate a selection of products that are offered to the employee to purchase. In particular, Dr Pearce drew attention to what he considered to be a key feature of the invention – the opportunity for the employee to access the personality profile prior to the system generating the product selections, to review whether the profile is accurate, and to change it if not.

Identifying the contribution

- 15 In his final examination report the examiner defines the contribution as “*relat[ing] to a method of managing products offered to an employee*”, though I should note that this assessment was based on a somewhat broader claim than the one considered at the hearing. Dr Pearce argued that this was too general and did not take into account any differences between the invention and the prior art. With reference to the prior art, and to paragraph 43 of *Aerotel*, Dr Pearce set out his assessment of the contribution.
- 16 He argued that the problem to be solved was how to provide, in a reliable and effective way, a product for an employee to purchase that accurately reflects their requirements while ensuring the employee’s personal information is kept private. He also argued that the advantage of the invention was that it provides a secure web based system that operates more accurately and reliably in providing a product recommendation.

³ *Merrill Lynch’s application* [1989] RPC 561.

⁴ *Gale’s application* [1991] RPC 305.

⁵ *Fujitsu Limited’s application* [1997] RPC 608.

- 17 Furthermore he drew my attention to the difference between the claimed invention and the closest known prior art, US 2010/0004955 (Telkamp), which has been cited against the corresponding US application. In particular, Dr Pearce pointed out that the prior art does not include the “*automatically administering a survey*” step of claim 1, and, additionally, does not allow the employee to revisit a personality profile to check for accuracy. These differences, he argued, ensure the reliability of the system.
- 18 I have some reservations about assessing the contribution here simply in terms of the difference between the claimed invention and a particular piece of prior art, especially since the search is incomplete and the examiner has deferred examination for novelty and inventive step, and indeed there was some discussion at the hearing about the difference in emphasis between assessing the contribution and assessing inventive step, but I do not think this presents me with any real difficulty in reaching a decision in this case.
- 19 So what has the applicant, as a matter of substance, added to the stock of human knowledge? Having carefully considered Dr Pearce’s submissions, I am prepared to accept that the contribution can be said to reside in a secure web-based method for selecting products for purchase by an employee which ensures the suitability of the product for the employee by basing the selection on a personality profile determined using a survey and by allowing the employee the opportunity to review the personality profile and change it if necessary.

Does the contribution fall solely within excluded subject matter? Is the contribution technical in nature?

- 20 At the hearing, Dr Pearce argued that the contribution does not fall within the computer program exclusion because it meets the terms of one of the five “*signposts*” first set out in *AT&T*⁶, in particular, the fourth signpost as expressed by Lewison LJ at paragraph 150 of *HTC v Apple*⁷ which in turn referred back to paragraph 42 of Mann J’s decision in *Gemstar v Virgin*⁸. The signposts pointing to a technical effect as modified by *HTC v Apple*, were recently set out in full in *Lantana*⁹:
- i) *whether the claimed technical effect has a technical effect on a process which is carried on outside the computer;*
 - ii) *whether the claimed technical effect operates at the level of the architecture of the computer, that is to say whether the effect is produced irrespective of the data being processed or the applications being run;*
 - iii) *whether the claimed technical effect results in the computer being made to operate in a new way;*

⁶ *AT&T Knowledge Ventures’ Application and CVON Innovations Ltd’s Application* [2009] FSR 19.

⁷ *HTC Europe Co Ltd v Apple Inc* [2013] EWCA Civ 451

⁸ *Gemstar –TV Guide International Inc v Virgin Media Limited* [2009] EWHC 3068 (Ch), [2010] RPC 10.

⁹ *Lantana Ltd’s Application* [2013] EWHC 2673 (Pat)

- iv) *whether the program makes the computer a better computer in the sense of running more efficiently and effectively as a computer;*
- v) *whether the perceived problem is overcome by the invention as opposed to merely being circumvented.*

21 Dr Pearce's argument is that, as a consequence of the use of a survey and personality profile which can be reviewed by the employee, the method results in a more accurate and reliable recommendation of products. Therefore, he argues, the computer in this invention works more effectively as a computer because it provides a more reliable and accurate result, and consequently, according to the fourth signpost, there must be a technical contribution.

22 The claimed method may well provide the employee with a more reliable result in an efficient manner, and one might therefore say that the method is more effective, but the fourth signpost is not about the efficiency and effectiveness of the program, but about whether that program makes the computer itself a better computer, and whether the computer itself is more efficient and effective. To interpret the signpost as broadly as Dr Pearce implies would be to suggest that any "better" computer program is patentable. I am aided and reinforced in my understanding of the fourth signpost by *Gemstar v Virgin*. At paragraph 42, referred to by Dr Pearce at the hearing, Mann J said:

"It would be a relevant technical effect if the program made the computer a better computer in the sense of running more efficiently and effectively as a computer. That was the case in Symbian itself. This is described as a technical effect within the computer itself; it makes it a better computer, or solves a technical problem lying within the computer itself (see para.54). It was also analysed as being the reasoning in Gale's Application [1991] R.P.C. 305. On this analysis the present alleged invention fails. The computer program within it produces a technical effect within the computer in the sense that any functioning program does – the computer would not work in the same way without such effects. But those are not the effects referred to. More is required to avoid the exclusion, and (in this context) that "more" is something which makes the computer work better. The invention does not have this effect. It makes the computer, as a computer, work differently in the sense of processing data in a different way, but it does not make it work better, faster or differently in that sort of performance sense. The internal operation of the computer in this case therefore does not amount to a technical effect of the kind which I am considering in this section."

23 I am therefore not at all persuaded by Dr Pearce's argument. As in *Gemstar v Virgin*, the claimed method certainly makes the computer work differently in the sense that any new program would do, but plainly there is nothing "more" which makes the computer itself work better.

24 For completeness, I do not consider that any of the other signposts assist the applicant's argument here. Clearly there is no process which is carried on outside the computer. The application contains no suggestion of any technical effect which operates at the level of the architecture of the computer. The computer may well

follow a new set of instructions, as will always be the case for any new piece of software, but the computer itself does not operate in a new way. Finally it seems to me that the method circumvents the problem of offering inappropriate products to the employee by simply finding out something about the employee before making any recommendation – and I do not consider this to amount to solving a technical problem using technical means.

- 25 I therefore consider the application to relate to a computer program as such.
- 26 There was little discussion on the subject of the business method exclusion at the hearing. There can be no question that the computer-based method defined in claim 1 implements a business method. Having concluded that the use of the computer here does not involve any technical contribution, I must also conclude that the method of the invention is also excluded from patentability as a business method.

Conclusion

- 27 In light of the above, I find that the invention as claimed is excluded under Section 1(2) of the Act because it relates to a program for a computer and to a method of doing business. Having read the specification I do not consider that any saving amendment is possible. I therefore refuse the application under section 18(3).

Appeal

- 28 In line with current practice of the Intellectual Property Office, any appeal must be lodged within 28 days.

Dr LAWRENCE CULLEN

Deputy Director acting for the Comptroller