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**Datasheet for the decision
of 5 July 2012**

Case Number: T 1509/09 - 3.3.08

Application Number: 96931598.5

Publication Number: 853679

IPC: C12Q 1/68, C07H 21/04

Language of the proceedings: EN

Title of invention:

Expression monitoring by hybridization to high density

Patentee:

Affymetrix, Inc.

Opponents:

Agilent Technologies, Inc.
Combimatrix Corporation
Clondiag Chip Technologies GmbH
Illumina GmbH

Headword:

High density oligonucleotide arrays/AFFYMETRIX

Relevant legal provisions:

EPC Art. 123(2)
RPBA Art. 13(1)

Relevant legal provisions (EPC 1973):

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Keyword:

"Admissibility of the Main Request and of Auxiliary Request A
(yes)"

"Main Request and Auxiliary Request A - added subject-matter
(yes)"

"Admissibility of the Auxiliary Request B (no)"

Decisions cited:

T 0453/03, T 0221/06, T 1685/07

Catchword:

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Case Number: T 1509/09 - 3.3.08

D E C I S I O N
of the Technical Board of Appeal 3.3.08
of 5 July 2012

Appellant I:
(Patent Proprietor)

Affymetrix, Inc.
3380 Central Expressway
Santa Clara
CA 95051 (US)

Representative:

Sheard, Andrew Gregory
Patent Attorney
P.O. Box 521
Berkhamsted, Herts. HP4 1YP (UK)

Appellant II:
(Opponent 1)

Agilent Technologies, Inc. Legal Dept. LSCA IP
Group
3500 Deer Creek Road. M/S 26U-25
Palo Alto. CA 94304-1317 (US)

Representative:

Vossius & Partner
P.O. Box 86 07 67
D-81634 München (DE)

Appellant III:
(Opponent 4)

Clondiag Chip Technologies GmbH
Löbstedterstr. 103-105
D-07749 Jena (DE)

Representative:

Huenges, Martin
Maiwald Patentanwalts GmbH
Elisenhof
Elisenstrasse 3
D-80335 München (DE)

Party as of right I:
(Opponent 2)

Combimatrix Corporation
6500 Harbour Heights Parkway
Mukilteo WA 98275 (US)

Representative:

Mathys & Squire LLP
120 Holborn
London EC1N 2SQ (GB)

Party as of right III: Illumina GmbH
(Opponent 5) c/o Willershausen & Bossert
Bahnhofstrasse 12
D-82418 Murnau (DE)

Representative: Friede, Thomas
Bardehle Pagenberg
Postfach 86 06 20
D-81633 München (DE)

Decision under appeal: Interlocutory decision of the Opposition
Division of the European Patent Office posted
11 May 2009 concerning maintenance of European
patent No. 853679 in amended form.

Composition of the Board:

Chairman: M. Wieser
Members: P. Julià
J. Geschwind

Summary of Facts and Submissions

I. European patent No. 0 853 679, based on the European patent application No. 96 931 598.5 and published as International patent application WO 97/10365 (hereinafter "*the application as filed*"), was granted with 42 claims. Granted claim 1 read as follows:

1. A method of simultaneously monitoring the expression of a multiplicity of genes, said method comprising:

(a) providing a pool of target nucleic acids comprising RNA transcripts of some of said genes, or nucleic acids derived from said RNA transcripts;

(b) providing a plurality of different probes for analysis of each of the RNA transcripts that are to be monitored; said probes being immobilized as an array on a surface of a substrate in known locations at a density greater than 60 different probes per cm²; said array probes including match and control probes; the array comprising more than 100 different probes, each probe attached to the surface through a single covalent bond;

(c) hybridizing said pool of nucleic acids to the array of nucleic acid probes; and

(d) quantifying hybridization of said target nucleic acids to said array by comparing hybridisation of match and control probes wherein said quantifying provides a measure of the levels of transcription of said genes."

- II. The patent was originally opposed by four opponents (opponents 01 to 04). With a letter dated 2 February 2006, opponent 03 withdrew its opposition. On 12 September 2006, oral proceedings took place before the opposition division and an intervention under Article 105 EPC was filed on 3 December 2007.
- III. In an interlocutory decision dated 11 May 2009, the opposition division considered the Main Request (claims as granted) to contain subject matter that extended beyond the content of the application as filed (Article 100(c) EPC, Article 123(2) EPC) and decided to maintain the patent in suit on the basis of a first Auxiliary Request filed at the oral proceedings on 12 September 2006. Claim 1 of this first Auxiliary Request was identical to claim 1 as granted except for part (b) which read as follows:

"... (b) providing a plurality of different probes for analysis of each of the RNA transcripts that are to be monitored; said probes being immobilized as an array on a surface of a substrate in known locations at a density greater than 60 different probes per cm²; said array probes including control probes *and a plurality of match probes*; the array comprising more than 100 different probes, each probe attached to the surface through a single covalent bond; ..."

(italics by the board to show the amendment introduced into part (b) of granted claim 1 in addition to the deletion of the text "*match and*" present in granted claim 1(b) after the term "*including*"; cf. Section I, *supra*).

- IV. Notices of appeal against this decision and statements setting out their grounds of appeal were filed by the patentee (appellant I) and opponents 01 and 04 (appellants II and III, respectively). Appellant I requested the maintenance of the patent as granted.
- V. With letter dated 9 February 2010, appellant I replied to the grounds of appeal of the other appellants and filed 10 Auxiliary Requests. The first Auxiliary Request was the Auxiliary Request on which the opposition division had decided to maintain the patent. Except for Auxiliary Requests 2, 9 and 10, all other Auxiliary Requests had originally been filed on 12 July 2006 in preparation of the oral proceedings before the opposition division.
- VI. Appellants II and III submitted further comments on appellant I's reply and Auxiliary Requests.
- VII. On 10 February 2012, the board summoned the parties to oral proceedings and, in a communication pursuant to Article 15(1) of the Rules of Procedure of the Boards of Appeal (RPBA) annexed thereto, informed the parties of its preliminary, non-binding opinion on some of the substantive issues of the present appeal.
- VIII. With letter dated 4 June 2012, appellant I replied to the board's communication and filed a Main Request and 26 Auxiliary Requests. The Main Request and Auxiliary Request 1 to 10 were identical to those filed on 9 February 2010 but in a different order, the claims as granted and the Auxiliary Request on which the opposition division had decided to maintain the patent in suit (previous Main Request and first Auxiliary

Request) were now appellant I's Auxiliary Request 9 and 10. Appellant I's Main Request was identical to Auxiliary Request 2 filed on 9 February 2010. Auxiliary Requests 11 to 26 were new in the proceedings and based on combinations of two (AR11 to AR16), three (AR17 to AR24) or four (AR25 and AR26) of the appellant I's previous requests (MR, AR1 to AR10).

- IX. With letters dated 12 June 2012 and 16 February 2012, the opponent 02 and the intervener/opponent 05 (parties as of right) informed the board of their intention not to attend the oral proceedings.
- X. Oral proceedings took place on 5 July 2012. At these proceedings, appellant I maintained its Main Request (originally filed on 9 February 2012 as Auxiliary Request 2), withdrew all its previous Auxiliary Requests and filed two new Auxiliary Requests (Auxiliary Requests A and B), each with a single claim.
- XI. The **Main Request** contained 42 claims identical to the 42 granted claims except for independent claims 1 and 22. Claim 1 of the Main Request was identical to claim 1 of the first Auxiliary Request on which the opposition division decided to maintain the patent in suit (cf. Section III, *supra*), except for part (b) which read as follows:

"... (b) providing a plurality of different probes for analysis of each of the RNA transcripts that are to be monitored; said probes being immobilized as an array on a surface of a substrate in known locations at a density greater than 60 different probes per cm²; said array probes including control probes *and, for each of*

the RNA transcripts that are to be monitored, a plurality of match probes; the array comprising more than 100 different probes, each probe attached to the surface through a single covalent bond; ..."

(italics by the board to show the amendment introduced into part (b) of claim 1; cf. Section III, *supra*).

The amendment introduced into part (b) of claim 1 corresponded to parts of the subject-matter of claim 3 as granted.

XII. Claim 1 of **Auxiliary Request A**, the sole claim of this request, was identical to granted claim 1 (cf. Section I, *supra*), except for part (b) which read as follows:

"... (b) providing a plurality of different probes for analysis of each of the RNA transcripts that are to be monitored; said probes being immobilized as an array on a surface of a substrate in known locations at a density greater than 60 different probes per cm²; said array probes including match and control probes; the array comprising more than 100 different probes, each probe attached to the surface through a single covalent bond; and, for each gene, said array comprising at least 10 different nucleic acid probes complementary to subsequences of that gene; ..."

(italics by the board to show the amendment introduced into part (b) of claim 1 as granted; cf. Section I, *supra*).

XIII. Claim 1 of **Auxiliary Request B**, the sole claim of this request, was identical to claim 1 of Auxiliary

Request A, except for the introduction of two additional amendments, one in part (b) and one in part (d) of this claim. The amendment in part (b), introduced after the wording "... *including match and control probes* ...", read as follows:

"..., wherein the control nucleic acid probes comprise mismatch control probes such that for each matched probe there exists a mismatch control probe; ..."

The amendment in part (d) of claim 1, introduced after the wording "... *hybridisation of match and control probes* ...", read as follows:

"... wherein said quantifying comprises either:

(a) calculating the difference in hybridization signal intensity between each of said nucleic acid probes and its corresponding mismatch control probe; or

(b) calculating the average difference in hybridization signal intensity between each of said nucleic acid probes and its corresponding mismatch control probe for each gene; and ..."

The amendments introduced into parts (b) and (d) of claim 1 corresponded, respectively, to subject-matter of claims 8 and 9 as granted.

XIV. The arguments of appellant I, insofar as they are relevant to the present decision, may be summarized as follows:

Admissibility of the Main Request

The Main Request was filed (as Auxiliary Request 2) in direct reply to the grounds of appeal of appellants II and III within the time limit set by Article 12(1)(b) RPBA and thus, at an early stage of the appeal proceedings. The amendment introduced into part (b) of claim 1 was in line with that introduced into claim 1(b) of the first Auxiliary Request on which the opposition division decided to maintain the patent (cf. Sections III and XI, *supra*). The amendment was a serious attempt to overcome an objection raised by appellants II and III in their grounds of appeal, it was straightforward and did not add any complexity to the case. On the contrary, it intended to simplify the case and did not involve any examination that could delay the proceedings.

Main Request

Article 100(c) EPC; Article 123(2) EPC

The term "*plurality*" only meant "*more than one*" or "*at least two*", thereby excluding the minimal embodiment considered by the opposition division to be embraced by the granted claims and to lack a basis in the application as filed. Although, in the application as filed, the term "*plurality*" was found only in the context of a computer-implemented method, the application as filed constantly and consistently referred to a plurality or to a set of match probes (plural) opposed to a single target sequence (singular), as shown by the numerous references to "*large numbers of probes*" and to the use of several probes found in the application as filed, such as on page 9,

lines 29-30, page 21, lines 1-3, 15 and 19-20, page 22, lines 9-10, page 34, lines 18-19, page 36, lines 10-11, page 37, lines 15-16 and page 38, lines 5-7 and 11-12. Thus, there was a basis in the application as filed for using plural terms (plurality) when referring to match probes and singular terms for target sequences. This teaching was also conveyed to the skilled person by references to specific increasing and decreasing numbers of probes found, respectively, on page 5, lines 15-17 and page 22, lines 6-8 of the application as filed. From these references, the skilled person would have understood that, in the method of claim 1, a plurality of probes had to be used for each target gene. There was no lower limit for the number of probes to be used in the method of claim 1 as long as there was more than one (a plurality) for each target gene.

The application as filed explicitly referred also to "*a multiplicity of probes*", in particular on page 10, line 16, page 38, line 17 and page 39, line 9. Although these references were found in the context of a method of selecting a set of oligonucleotide probes or a method of optimizing a probe set, it was directly and unambiguously derivable from the content of the application as filed that this "*multiplicity of probes*" was to be used in the method of claim 1, since this method was essential to the disclosure of the application as filed and no other possible use for this "*multiplicity of probes*" could be derived from the application as filed. This was the sole possible interpretation if the application as filed was read with the mind of a skilled person willing to understand.

Admissibility of Auxiliary Requests A and B

The subject-matter of Auxiliary Request A was filed at the beginning of both the opposition (claim 1 of Auxiliary Request 6 filed on 12 July 2006 in preparation of the oral proceedings before the opposition division) and the appeal proceedings (claim 1 of Auxiliary Request 8 filed on 9 February 2010 in reply to appellants II and III's grounds of appeal and claim 1 of Auxiliary Request 6 filed on 4 June 2012 in reply to the board's communication pursuant to Article 15(1) RPBA). Although Auxiliary Request A was filed at the oral proceedings before the board, the subject-matter of this request was not late filed. Auxiliary Request A had only a single claim and thus, it reduced the complexity of the case and contributed to the procedural economy of the appeal proceedings. In this sense, it was not a reintroduction of a previously withdrawn Auxiliary Request which, with 42 claims, increased the complexity of the case.

The subject-matter of Auxiliary Request B was a combination of subject-matter that was present at the beginning of both the opposition (claims 1 of Auxiliary Requests 2 and 6 filed on 12 July 2006 in preparation of the oral proceedings before the opposition division) and the appeal proceedings (claims 1 of Auxiliary Requests 4 and 8 filed on 9 February 2010 in reply to appellants II and III's grounds of appeal). The subject-matter of Auxiliary Request B was identical to that of claim 1 of Auxiliary Request 15 - filed on 4 June 2012 within the time limit set out by the board in its communication pursuant to Article 15(1) RPBA and in direct reply to the board's preliminary opinion

expressed therein. Thus, Auxiliary Request B was not filed at a late stage of the appeal proceedings. The subject-matter of Auxiliary Request B was immediately derivable from a direct combination of subject-matter already present in previous Auxiliary Requests and it clearly addressed in a straightforward manner two objections raised by the opponents at the beginning of the opposition proceedings. None of the other appellants and parties in appeal proceedings could be surprised by the subject-matter of Auxiliary Request B. Moreover, since Auxiliary Request B had only a single claim, it clearly reduced the complexity of the case and contributed to the procedural economy of the appeal proceedings.

Auxiliary Request A

Article 100(c) EPC; Article 123(2) EPC

Basis for the amendment introduced into part (b) of claim 1 of Auxiliary Request A was found on page 5, lines 17-18 and page 6, lines 9-11 of the application as filed. Although reference was made therein to oligonucleotide probes and not to nucleic acid probes, a probe was clearly defined in the application as filed as being always an oligonucleotide (page 11, line 25). It was well-known in the art and clearly derivable from the application as filed that all oligonucleotides were nucleic acids (page 11, line 23). Accordingly, no difference was made in the application as filed between nucleic acid probes and oligonucleotide probes. The terms were used interchangeably and meant the same, as clearly conveyed to the skilled person by the disclosure of the application as filed when taken as a whole.

XV. The arguments of appellants II and III, insofar as they are relevant to the present decision, may be summarized as follows:

Admissibility of the Main Request

No objections were expressed against the admissibility of the Main Request.

Main Request

Article 100(c) EPC; Article 123(2) EPC

In the application as filed, the term "*plurality*" was found only in the context of a computer-implemented method but not in the method of claim 1 (page 10, line 25 and claims 65 and 73 of the application as filed). Both methods were different and the former could not be a basis for the latter. The term "*a plurality*" was different from the wording "*large numbers*" found on pages 21 and 22 of the application as filed, the former comprising embodiments with a low number of probes (two, three, etc.) that were not embraced by the latter wording. Embodiments with a low number of probes were also not supported by the disclosures of specific numbers of probes found on page 5, lines 15-17 (more than 10) and on page 22, lines 6-8 (even 10) of the application as filed. The references in the application as filed to "*a multiplicity of probes*" were found in the context of methods for selecting and/or optimizing a set of probes which were different from the method of claim 1. There was no disclosure in the application as filed linking these methods with that of claim 1, i.e. stating that

all probes selected and/or optimized by these methods had to be used in the method of claim 1.

Admissibility of Auxiliary Requests A and B

Although both Auxiliary Requests were late filed in appeal proceedings, no objections were raised against the admissibility of Auxiliary Request A. However, appellant III noted that since Auxiliary Request 6 filed on 4 June 2012 (claim 1 of Auxiliary Request 6 was identical to claim 1 of Auxiliary Request A) was withdrawn during oral proceedings before the board, Auxiliary Request A reintroduced subject-matter previously withdrawn and thus, its admissibility spoke against procedural economy.

Auxiliary Request B was filed at oral proceedings before the board and thus, at a late stage of appeal proceedings. The subject-matter of this request was not straightforward but only derivable from a combination of different Auxiliary Requests previously filed in appeal proceedings. Although claim 1 of Auxiliary Request B was identical to claim 1 of Auxiliary Request 15 filed by appellant I in reply to the board's communication pursuant to Article 15(1) RPBA, Auxiliary Request 15 was filed one month before the oral appeal proceedings together with a large number of other Auxiliary Requests that contained all possible combinations of subject-matter intending to address several different, but not all, possible objections. According to the case law of the Boards of Appeal, this was a "pick and mix" approach that was not to be allowed (T 745/03 of 22 September 2005 and T 221/06 of July 2008).

Auxiliary Request A

Article 100(c) EPC; Article 123(2) EPC

The sentences on page 5, lines 17-18 and on page 6, lines 9-11 of the application as filed referred to oligonucleotide probes. The definitions of nucleic acid and oligonucleotide found on page 11, lines 19-22 and lines 23-24, respectively, showed that they were different, the former being broader than the latter. Nucleic acid probes were not identical to oligonucleotide probes, they were not merely equivalent and the terms could not be interchangeably used one for the other. Oligonucleotide probes could not be directly and unambiguously equated to nucleic acid probes. There was no basis in the application as filed for the specific wording introduced into part (b) of claim 1 of Auxiliary Request A.

- XVI. Appellant I (patentee) requested that the decision under appeal be set aside and that the patent be maintained on the basis of the Main Request filed with letter of 4 June 2012 or, in the alternative, on the basis of Auxiliary Request A or B filed on 5 July 2012 during the oral proceedings before the board.
- XVII. Appellant II (opponent 01) and appellant III (opponent 04) both requested that the decision under appeal be set aside and that the patent be revoked.

Reasons for the Decision

Admissibility of the Main Request

1. According to Article 13(1) RPBA, "(a)ny amendment to a party's case after it has filed its grounds of appeal or reply may be admitted and considered at the Board's discretion. The discretion shall be exercised in view of inter alia the complexity of the new subject matter submitted, the current state of the proceedings and the need of procedural economy".
2. In the statement of grounds of appeal, appellant I requested, as its sole request, the maintenance of the patent as granted. The present Main Request was originally filed by appellant I as Auxiliary Request 2 - together with other 9 Auxiliary Requests - in reply to the grounds of appeal of appellants II and III (cf. Section V *supra*). As a direct reply to the board's communication pursuant to Article 15(1) RPBA, appellant I changed the order of its previous requests and made its Auxiliary Request 2 its new Main Request - filing also 16 additional Auxiliary Requests (cf. Section VIII *supra*).
3. In view of the fact that the Main Request was originally filed (as Auxiliary Request 2) in reply to the grounds of appeal of appellants II and III's, it is arguable whether it is necessary for the board to exercise its discretion for admitting it into the appeal proceedings. In any case, the Main Request, which was not filed in the first instance proceedings, was already present at an early stage of the appeal proceedings.

4. The Main Request is identical to the granted claims except for claims 1 and 22. Claim 1 of the Main Request contains an amendment in step (b) ("*for each of the RNA transcripts that are to be monitored, a plurality of match probes*"; cf. Section XI *supra*) that is in line with the amendment or feature introduced into claim 1(b) of the Auxiliary Request on which the opposition division decided to maintain the patent ("*a plurality of match probes*"; cf. Section III *supra*). The amendment of the Main Request further defines this feature in order to overcome the objections raised by appellants II and III in their grounds of appeal. It is not complex and it does not negatively affect procedural economy.

5. Thus, the board sees no reason not to admit the Main Request into the appeal proceedings.

Main request

Article 100(c) EPC; Article 123(2) EPC

6. The passages of the application as filed cited by appellant I as providing a basis for the amendment introduced into part(b) of claim 1 of the Main Request refer to a "*large numbers of probes*" (cf. page 21, lines 1-3, 15, 19-20 and page 22, lines 9-10), to a very specific number of probes (cf. page 5, lines 15-17 and page 22, lines 6-8) or to probes in general without further definition (cf. page 34, lines 18-19, page 36, lines 10-11, page 37, lines 15-16 and page 38, lines 5-7, 11-12). None of these references contains the term "*plurality*" which is found only in the context of a computer-implemented method of monitoring

expression of genes which is different from the method of claim 1 (cf. page 10, lines 21-30 and claims 65 and 73 of the application as filed).

7. The board agrees with appellant I that the expression "*a plurality*" means "*more than one*" or "*at least two*" and thereby, it excludes a minimal embodiment containing only a single match probe; an embodiment considered by the opposition division to be embraced by the granted claims and to lack a formal basis in the application as filed (cf. Section XIV *supra*). However, the Main Request embraces embodiments that make use of a limited low number of match probes, such as "*at least two*" or "*more than one*", i.e. two, three, etc. Neither the references to "*a large number of probes*" nor those to a specific number of probes ("*more than 10*", "*most preferably more than 1000*", "*at least 10*", etc.) provide a basis for embodiments comprising these limited low number of probes. Likewise, the references founds in the application as filed to probes in general have to be read in the light of these other references ("*a large number of probes*", "*more than 10*", etc.). The expression "*a plurality*" cannot be directly and unambiguously derived from these references to probes in general.

8. Appellant I has also referred to the expression "*a multiplicity of probes*" found in the application as filed in the context of methods for selecting and optimizing a set of probes. Although these methods are different from that of claim 1, appellant I argues that it is directly derivable from the whole disclosure of the application as filed that these selected and optimized "*multiplicity of probes*" are to be used in

the method of claim 1. Thus, the selected and optimized "*multiplicity of probes*" by the former methods are in a way equivalent to, and provide a basis for, the "*plurality of probes*" in the method of claim 1 (cf. Section XIV *supra*).

9. The board cannot follow this argument. It is arguable whether all, some or only a few probes of these "*multiplicity of probes*" selected and optimized by the methods disclosed in the application as filed are, always and exclusively, to be used in the method of claim 1. In the absence of a clear disclosure linking, in a straightforward manner, these selection and optimizing methods with that of claim 1, the use of these "*multiplicity of probes*" indicated by appellant I may well be obvious to the skilled person. However, according to the case law, obviousness is not a criterium for assessing whether subject-matter is supported by the application as filed. It is also not a question of reading the disclosure of the application as filed with a mind willing to understand but only of assessing whether the subject-matter is directly and unambiguously derivable from the application as filed, either explicitly or implicitly (cf. "Case Law of the Boards of Appeal", 6th edition, III.A.7.1, page 347). In the board's view, this is not so in the present case.
10. Therefore, the Main Request is considered not to fulfil the requirements of Article 123(2) EPC.

Admissibility of Auxiliary Requests A and B

11. The sole claim of Auxiliary Request A is identical to claim 1 of Auxiliary Request 8 filed by appellant I on

9 February 2010 in reply to the grounds of appeal of appellants II and III, which was itself identical to claim 1 of Auxiliary Request 6 filed on 12 July 2006 in preparation of oral proceedings before the opposition division. The amendment introduced into claim 1(b) of Auxiliary Request A corresponds to subject-matter of granted claim 3 which read as follows:

"3. A method of claim 1 or 2, wherein *for each gene, said array comprises at least 10 different nucleic acid probes complementary to subsequences of that gene, preferably no more than 20 different nucleic acid probes complementary to subsequences of that gene.*"

(in italics by the board the subject-matter introduced into claim 1(b) of Auxiliary Request A, cf. Section XII, *supra*).

12. Although Auxiliary Request A was filed at the oral proceedings before the board, i.e. at a very late stage of the appeal proceedings, its subject-matter was, as such, in the proceedings from a very early stage. This subject-matter, being a straight combination of granted claims 1 and 3, is not complex and, since Auxiliary Request A contains a single claim, it does not increase the complexity of the case. The subject-matter of Auxiliary Request A intends to overcome an objection originally raised against the claims as granted and decided to be relevant by the opposition division in its interlocutory decision.

13. Although the subject-matter of Auxiliary Request A was present in an Auxiliary Request (claim 1 of Auxiliary Request 6 filed on 4 June 2012) that was previously

withdrawn at the oral proceedings before the board, this withdrawn Auxiliary Request, which consisted of 42 claims, cannot be equated with present Auxiliary Request A, as it raised other additional objections that increased the complexity of the case and which do not apply anymore to the subject-matter of Auxiliary Request A.

14. Thus, the board, in the exercise of its discretion under Article 13(1) RPBA (cf. point 1 *supra*), decides to admit Auxiliary Request A into the appeal proceedings.

15. The sole claim of Auxiliary Request B is identical to claim 1 of Auxiliary Requests 15 and 24, filed by appellant I on 4 June 2012 in reply to the board's communication pursuant to Article 15(1) RPBA, which was a combination of features present in claims 1 of Auxiliary Request 4 (subject-matter of granted claims 8 and 9 introduced into claim 1(b) and (d)) and Auxiliary Request 8 (subject-matter of granted claim 2 introduced into claim 1(b)), both filed on 9 February 2010 in reply to the grounds of appeal of appellants II and III. Auxiliary Requests 4 and 8 of 9 February 2010 were originally filed on 12 July 2006, as Auxiliary Requests 2 and 6 in preparation of the oral proceedings before the opposition division.

16. Although the subject-matter of Auxiliary Request B results from a combination of Auxiliary Requests that were in the proceedings from an early stage, this particular combination was introduced, as such, into the appeal proceedings only one month before the oral proceedings before the board. However, Auxiliary

Requests 15 and 24, whose claim 1 was identical to claim 1 of Auxiliary Request B, were filed together with a large number of other Auxiliary Requests (AR11 to AR26) that contained numerous combinations based on previously filed requests (MR, AR1 to AR10) (cf. Section X *supra*). Some of these Auxiliary Requests and these combinations were not hierarchically arranged (convergent) but only mere alternatives that intended to address the same or closely related objections. The subject-matter of Auxiliary Request B was thus filed, as such, in a set of requests that followed a so-called "pick and mix" approach (cf. T 1685/07 of 4 August 2010, T 745/03 and T 221/06, *supra*).

17. Auxiliary Request B contains a single claim and thus, does not appear, in principle, to increase the complexity of the case. However, in view of the above mentioned circumstances, namely the fact that Auxiliary Request B was filed at a late stage of the appeal proceedings and that its subject-matter was present, for the first time, in Auxiliary Requests filed only one month before the oral proceedings in a "pick and mix" approach, the admission of Auxiliary Request B is considered not to contribute to the economy of the present appeal proceedings.

18. Thus, the board, in the exercise of its discretion under Article 13(1) RPBA (cf. point 1 *supra*), decides not to admit Auxiliary Request B into the appeal proceedings.

Auxiliary Request A

Article 100(c) EPC; Article 123(2) EPC

19. Whereas the amendment introduced into claim 1(b) of Auxiliary Request A reads "*and, for each gene, said array comprising at least 10 different **nucleic acid** probes complementary to subsequences of that gene*" (in bold by the board; cf. Section XII *supra*), the passages on page 5, lines 17-18 and page 6, lines 9-11 of the application as filed indicated by appellant I as a basis for this amendment read "*at least 10 different **oligonucleotide** probes for each gene*" and "*(t)he array includes test probes which are **oligonucleotide** probes*" (in bold by the board).
20. Whereas a probe is defined on page 11, lines 25-26 of the application as filed as being "*an **oligonucleotide** capable of binding to a target nucleic acid of complementary sequence*" (in bold by the board), an oligonucleotide is defined on page 11, lines 23-24 as being "*a single-stranded **nucleic acid** ranging in length from 2 to about 500 bases*" (in bold by the board). However, the definition of "*nucleic acid*" found on page 11, lines 19-22 of the application as filed is broader than that defining an oligonucleotide. In the board's view, the nature and properties of a nucleic acid probe do not need to be, always and necessarily, the same as these of an oligonucleotide probe. It cannot be directly and unambiguously inferred from all these definitions that all probes are nucleic acid probes and that both terms, oligonucleotide and nucleic acid, are to be used interchangeably in the application as filed - as argued by appellant I (cf. Section XIV *supra*).

21. Although references to "*nucleic acid probes*" are found in the application as filed, they cannot provide a formal basis for the amendment introduced into claim 1(b) of Auxiliary request A. There is a reference on page 18, lines 6-10 to a high density array of "*nucleic acid probes*" to be used in a method of monitoring the expression levels of one or more genes. However, this method is described in general terms with no reference to the specific number of probes and with none of the features present in claim 1, in particular those in part (b) of this claim. Other references to "*nucleic acid probes*" are also of general character and it is arguable whether they directly and unambiguously relate to the method of claim 1, such as those found on page 10, lines 21-30, claims 65 and 73 (computer-implemented method) and page 45, lines 5-10 (combination of selection methods) of the application as filed. Although several references to "*nucleic acid probes*" are also found on page 57, including one in context with some of the features cited in claim 1(b), they all relate to a computer-implemented method and none of them refers to the specific number of 10 different probes indicated in claim 1(b) of Auxiliary Request A.
22. It is questionable whether all these references, taken as a whole, might lead a skilled reader to understand that the terms oligonucleotide and nucleic acid are to be used interchangeably in the application as filed. In the board's view, such interpretation is not directly derivable from these references and implies, to say the least, a certain degree of ambiguity. It cannot thus be a direct and unambiguous formal basis for the amendment introduced into claim 1(b) of Auxiliary Request A.

23. Therefore, Auxiliary Request A is considered not to fulfil the requirements of Article 123(2) EPC.

Order

For these reasons it is decided that:

1. The decision under appeal is set aside.
2. The patent is revoked.

The Registrar:

The Chairman:

A. Wolinski

M. Wieser