DECISION
of 26 May 2006

Case Number: T 0341/04 - 3.2.05
Application Number: 97941485.1
Publication Number: 0929250
IPC: A47L 13/16
Language of the proceedings: EN
Title of invention: A cleaning implement having high absorbent capacity
Patentee: THE PROCTER & GAMBLE COMPANY
Opponent: Henkel KGaA
Headword:
Relevant legal provisions: EPC Art. 83, 100(b), 111(1)
Keyword: "Sufficiency of disclosure - yes"
"Remittal to the Opposition Division - yes"
Decisions cited: T 0629/90, T 0737/90
Catchword: -
Case Number: T 0341/04 - 3.2.05

DECISION
of the Technical Board of Appeal 3.2.05
of 26 May 2006

Appellant: THE PROCTER & GAMBLE COMPANY
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Decision under appeal: Decision of the Opposition Division of the European Patent Office posted 14 January 2004 revoking European patent No. 0929250 pursuant to Article 102(1) EPC.

Composition of the Board:

Chairman: W. Moser
Members: H. Schram
W. Zellhuber
Summary of Facts and Submissions

I. The appellant (patent proprietor) lodged an appeal against the decision of the Opposition Division revoking European patent No. 0 929 250 on the grounds that the patent did not disclose the invention in a manner sufficiently clear and complete for it to be carried out by a person skilled in the art (Articles 100(b) and 83 EPC).

II. The appellant requested that the decision under appeal be set aside and that the patent be maintained as granted (main request). As an auxiliary measure he requested that the decision under appeal be set aside and that the patent be maintained on the basis of claims 1 to 8 filed as auxiliary request on 13 May 2004. The appellant further requested that, if the Board was unable to comply with his main request, oral proceedings be appointed.

The respondent (opponent) withdrew its opposition on 8 April 2004. Although the former opponent ceased to be a party to the appeal proceedings as far as substantive issues are concerned, it will be denoted as respondent in this decision.

III. Claim 1 according to the main request reads as follows:

"1. A cleaning implement comprising:
   a. a handle; and
   b. a removable cleaning pad (200) comprising:
      i. a scrubbing layer (201), and
      ii. an absorbent layer (205) the cleaning pad having a $t_{1200}$ absorbent capacity of at least
15 g of deionized water per g of the cleaning pad, preferably at least 20 g of deionized water per g of the cleaning pad, more preferably at least 25 g of deionized water per g of the cleaning pad, more preferably at least 30 g of deionized water per g of the cleaning pad, characterized in that the cleaning pad has a squeeze-out value of not more than 40% under 1724 Pa (0.25 psi) of pressure, preferably not more than 25% under 1724 Pa (0.25 psi) of pressure."

IV. The following documents were inter alia referred to in the appeal proceedings:

D7 "Eidesstattliche Versicherung" by Dr Ina Krügermann dated 23 October 2003.


D9 Statement of Edlyn S. Simmons dated 29 April 2004.


V. The appellant argued in writing essentially as follows:

The patent was revoked on the grounds that each of the two stages of the test to determine the squeeze-out value as described in paragraph [0094] on page 13, lines 48 to 56, of the patent in suit were found to be insufficiently disclosed for carrying out the invention. According to the decision under appeal, the first stage of this test, viz. saturating the cleaning
pad to capacity with deionized water via horizontal wicking, was not sufficiently disclosed, since the pressure constraining the sample of the cleaning pad was not indicated. Whilst this information was provided in the cross-referenced document U.S. application Serial No. 08/542,497 (Dyer et al.), this document had not been made available to the public on the publication date of the application as filed. The second stage, viz. determining the amount of fluid that can be blotted from the saturated sample of the cleaning pad with Whatman filter paper under 1724 Pa (0.25 psi) of pressure, was also not sufficiently disclosed, because the amount of fluid that can be blotted from the sample depended on the blotting time, i.e. the time duration that the test was run, which time duration was not provided however. The weight of test fluid lost which was necessary to determine the squeeze-out value (cf. page 13, line 56, of the patent in suit) would asymptotically approach 100% in the long run, since blotting would only stop when the cleaning pad was dry.

The argument in the decision under appeal (see point 2.3.3.1 of the Reasons) that the information about the Horizontal Gravimetric Wicking method contained in the Dyer application had not been made available to the public on the publication date of the application as filed, i.e. 26 March 1998, was incorrect, since the person skilled in the art trying to obtain a copy of the Dyer application would readily have found the desired information in its family member WO 96/21682, which was published on 18 July 1996, and which inter alia claimed priority of the Dyer application (see the statement of Ms Edlyn S. Simmons, document D9). The
requirements of sufficiency of disclosure with respect to the saturation step of the squeeze-out test were thus met.

The argument of the Opposition Division in the decision under appeal (see point 2.3.3.2 of the Reasons) that if blotting were continued indefinitely all of the absorbed liquid would be removed from the cleaning pad, and that the person skilled in the art would not know a priori when to stop the test, was contradicted by the blotting tests conducted on request of the respondent (see document D8). That blotting continued indefinitely was neither mentioned in document D8, and apparently also not observed, since both the amount of fluid that was blotted from the sample could be accurately determined and the ensuing squeeze-out values were from about 60% to 75%. According to the passage on page 13, lines 49 to 51, of the patent in suit, "Squeeze-out" is measured on an entire cleaning pad by determining the amount of fluid that can be blotted from the sample with Whatman filter paper under pressures of 0.25 psi (1.5 kPa). The only logical interpretation of the wording "the amount of fluid that can be blotted" in this passage was that blotting continued until, for practical purposes, no more fluid could be blotted. The procedure was not stopped at some arbitrary time. The tests conducted by Mr Nisi showed that after a first and a second blotting operation which had a duration of 30 minutes and ca. 16 hrs, respectively, the residual amount of fluid that was blotted from the cleaning pad in a third blotting operation was in the order of 0.04 to 0.07 g, i.e. for all practical purposes a negligible amount (see Table on page 7 of document D10). The initial objection of the respondent on the grounds of
Article 100(b) EPC, submitted in its Notice of opposition, that the failure to specify the kind and type of Whatman filter paper (which were commercially available in different sizes and grades having different filtering speeds) to be used in the squeeze-out test prevented to obtain a reliable squeeze-out value, was refuted by the tests conducted by Mr Nisi, which showed that the squeeze-out value was independent of the type of Whatman filter paper used: the results obtained by using Whatman filter paper No. 1 and Whatman filter paper No. 3 were substantially the same, i.e. the difference was within the range of experimental error (see Table on page 7 of document D10).

The tests described in document D8 were performed on Ecolab tissue, which clearly was a different product compared to the cleaning pads defined in claim 1 of the main request, since the squeeze-out values measured in the laboratory of Dr Krügermann were in the range from 60 to 75%, i.e. far above the upper limit of 40% as prescribed in claim 1. Whilst the tests specified that Whatman filter paper of 5.5, 9 and 12.5 cm in diameter were used, document D8 was silent about the diameter of the sample. This was a strange omission, since the objection of the respondent that the patent failed inter alia to specify the size of the Whatman filter paper should be seen, if this correction were justified, in relation to the size of the sample. The tests showed a dependency on the size of the Whatman filter papers having the same grade: the larger the size, the larger the squeeze-out value (see document D8, page 3, under a) same filter quality, different filter size). Mr Nisi used two overlapping piles of
Whatman filter paper of 24 cm in diameter with a combined diameter that was much larger than the pads of 30 cm in length. The tests performed in the laboratory of Dr Krügermann could not provide support for the respondent's case. The requirements of sufficiency of disclosure with respect to the blotting step of the squeeze-out test were thus met.

In the decision under appeal it was held that the t$_{1200}$ absorbent capacity test was sufficiently described, so there was no need for further substantiation of this point.

Summarizing, the patent provided sufficient information to determine the parameters "squeeze-out value" and "t$_{1200}$ absorbent capacity" that characterized the cleaning pad used in the cleaning implement according to the invention claimed in claim 1 of the patent as granted so that the requirement of Article 83 EPC was met.

**Reasons for the Decision**

**Main Request**

1. An issue to be decided in the present appeal proceedings is whether the patent discloses the subject-matter of claim 1 in a manner sufficiently clear and complete for it to be carried out by a person skilled in the art (Articles 100(b) and 83 EPC).

If reference is made to the disclosure of the invention in this decision, the patent in suit (published version 1018.D)
In the decision under appeal two issues relating to the alleged insufficiency of disclosure are discussed. The first issue is whether the test given in the patent in suit for determining the parameter "t_{1200} absorbent capacity" recited in claim 1 is sufficiently disclosed (see point 2.2 of the decision under appeal). This parameter is explained in paragraphs [0028] and [0029] of the patent in suit. The absorbent capacity of the cleaning pad is the amount of deionized water expressed in gram [g] per gram of cleaning pad and is measured 20 minutes (1200 seconds) after starting saturating the cleaning pad, while the cleaning pad is held under a confining pressure of 620 Pa (0.09 psi). The test procedure for measuring this parameter is described in paragraphs [0084] to [0093] of the patent in suit.

During the oral proceedings before the Opposition Division, the respondent had, according to point 4 of the minutes, contested "the feasibility to produce an acceptably accurate result of the test to measure the absorbent capacity (t_{1200}) as claimed in claim 1 following the description of the contested patent".
According to point 2.2.3 of the decision under appeal, the argument of the respondent presented during said oral proceedings was that executing steps 7 and 8 of the procedure of operating the 3-way stopcocks described on page 13, lines 5 to 17, of the patent in suit resulted in draining the tubing between valve 540 and fritted funnel 514, which would be in contradiction with the statement on page 13, line 21, of the patent in suit that "Typically ~0.04 g of fluid is drained from the system during this procedure". Although the figure of "~0.04 g of fluid" may seem to be small, in the judgement of the Board, no contradiction can be seen between the passages referred to above. The idea behind executing steps 7 and 8 is to temporarily dry the surface of the fritted funnel. Since the quantity of fluid that is drained from the fritted funnel by executing steps 7 and 8 is reabsorbed by the fritted funnel when the test is run, this quantity of fluid, referred to as the "fritted funnel correction weight", must be subtracted from the weight difference of the reservoir 512 between the start and the end of the test, since this quantity of fluid is not absorbed by the cleaning pad, see page 13, lines 23 to 27, of the patent in suit.

The Board thus concurs with the Opposition Division that the test for determining the parameter \( t_{1200} \) absorbent capacity" is disclosed in a manner sufficiently clear and complete for it to be carried out by a person skilled in the art.
1.2 "Squeeze-out value"

The squeeze-out value is defined as the weight of test fluid lost per weight of the wet sample (cf. page 13, line 56, of the patent in suit). In order to determine the squeeze-out value, one has to determine (i) the weight of the wet sample, and (ii) the weight of test fluid lost.

1.3 Determining the weight of the wet sample

On page 13, lines 51 to 54, of the patent in suit the following is stated: "Squeeze-out is performed on a sample that has been saturated to capacity with deionized water via horizontal wicking. (One means for obtaining a saturated sample is described as the Horizontal Gravimetric Wicking method in U.S. application Serial No. 08/542,497 (Dyer et al.), filed October 13, 1995, which is incorporated by reference herein.)". This passage contains not merely a cross-reference to a document, it contains specifically a cross-reference to information, namely information about the Horizontal Gravimetric Wicking method needed as an intermediate step in determining the squeeze-out value.

The Opposition Division held that whilst US application No. 08/542,497 contained the necessary information to carry out the invention of the patent in suit (see the corresponding US Patent No. 5,849,805 published on 15 December 1998, column 25, line 64, to column 26, line 21), neither a copy of this document was available to the EPO on (or before) the date of filing of the application (here: 10 September 1997, the international
filing date of WO 98/11812) that matured into the patent in suit, nor was this document made available to the public (no later than) on the date of publication of said application (here: 26 March 1998, the international publication date of WO 98/11812), being the two prerequisites for incorporation of essential matter or essential features mentioned in the Guidelines for Examination in the European Patent Office, Chapter C-II, 4.18, for the case that the reference document was not available to the public on the date of filing of the application.

It may be noted that, according to Article 158 (1) EPC, the publication under Article 21 of the Cooperation Treaty of an international application for which the European Patent Office is a designated Office shall, subject to Article 158 (3) EPC, take the place of the publication of a European patent application and shall be mentioned in the European Patent Bulletin. The date mentioned on the cover of the published patent specification EP-B1 0 929 250 under INID code (43), viz. "Date of publication of application: 21.07.1999 Bulletin 1999/29", is merely the date of notification that the European publication number "0 929 250" corresponds to the international application published by the World Intellectual Property Organisation under number WO 98/11812.

In decision T 737/90, dated 9 September 1993, which is cited in Chapter C-II, 4.18 of the Guidelines referred to in the preceding paragraph, the then competent Board had to decide whether a cross-referenced document, which, in the patent application refused by the Examining Division, was referred to as follows: "In
patent application Serial No. ........, filed concurrently herewith and assigned to the assignee of the present invention there is disclosed ...", enabled the person skilled in the art to retrieve that document. The Board held that in general a reference could be taken into account if it could be unambiguously identified and if it was available (in the sense of having ready access to it) to the relevant addressees of the document containing the reference, here the EPO before, and the public after, its publication (see point 3 of the Reasons). The Board was of the opinion that in the case at hand the reference, although not identified by a number but identifiable through additional information such as the filing date and assignee, was easily, i.e. without undue effort, retrievable by the EPO and by the public, see points 4 and 5 of the Reasons. In this respect the Board held that the requirement of easy retrieval of a cited document was met if a person skilled in the art availing himself, if necessary, of the professional skills of a librarian, was able to find the document.

The appellant has submitted that in the present case the person skilled in the art trying to find US application No. 08/542,497 would have easily retrieved its family member WO 96/21682 and would have found the details of horizontal wicking in the Section "B. Horizontal Gravimetric Wicking" on page 32, lines 9 to 25, of document WO 96/21682. In document D9, Ms Edlyn S. Simmons, US Patent Agent working in the field of patent information, states that she is sure that a search of the Derwent World Patent Index on 10 September 1997, the filing date of the patent in suit, contained a reference to WO 96/21682.
Whereas in decision T 737/90 the question was whether a referenced document, of which the document number was missing, could be unambiguously identified and therefore taken into account for the purpose of Article 83 EPC, in the present case the question is whether a referenced document, which could be unambiguously identified at the date of filing of the document containing the reference by its document number, but which document itself was "missing" in the sense that it was not available at said date of filing, can be "taken into account" for the purpose of Article 83 EPC by relaying on information present in a family member of the referenced document.

In the judgement of the Board, the answer in this particular case is yes. The EPO would have easily retrieved document WO 96/21682 published on 18 July 1996 and claiming priority of inter alia US application No. 08/542,497 on the filing date of the patent in suit, 10 September 1997. This also applies to a member of the public, availing himself, if necessary, of the professional skills of a librarian on or after the (international) publication date of the application that matured into the patent in suit, viz. 26 March 1998.

Both US application No. 08/542,497, which became publicly available on 15 December 1998, when the US Patent No. 5,849,805 was published, and PCT application WO 96/21682 contain a Section entitled "B. Horizontal Gravimetric Wicking", and the information contained therein happens to be identical, i.e. in retrospect, since this could not be established before
15 December 1998. The Board is aware that this need not to be the case in general, so that in general a family member of an unambiguously identified reference document may not take the place of said document. In the present case, however, the information that is "cross-referenced" is about a method to saturate a sample of an absorbent member. In the judgement of the Board, the person skilled in the art, on the date of filing of the application that led to the patent in suit, would not have had any reason to doubt that the Horizontal Gravimetric Wicking method described in WO 96/21682 would be different from the Horizontal Gravimetric Wicking method described in the at that time unpublished US application No. 08/542,497.

Summarizing, the Board is of the opinion that PCT application WO 96/21682 would have been retrieved without undue effort and that the person skilled in the art would have used the information contained therein, thus enabling him or her to saturate the cleaning pad to capacity with deionized water via horizontal wicking and to determine the weight of the wet sample. The Board is satisfied that what is important in the present context is not the physical availability of the referenced document itself (cf. Guidelines, C-II, 4.18), but the availability of the information contained therein, at the filing date and the publication date of the application as filed underlying the patent in suit, respectively.

1.4 Determining the weight of test fluid lost

In the opinion of the Board, the test report submitted by the respondent and denoted as document D8 does not
conclusively prove that the weight of test fluid lost, i.e. the amount of fluid that can be blotted from the sample held under pressure of 1724 Pa (0.25 psi) with Whatman filter paper, is dependent on the size and grade of Whatman filter paper used, and that the weight of test fluid lost cannot reliably be determined by this method.

The blotting tests referred to in document D8 were performed on Ecolab tissues. The absorbent capacities of the five tissues that were tested, taken as the weight of the absorbed fluid in [g] per gram of tissue, i.e. \( \frac{\text{WtWt1 [g] - Trockengewicht [g]}}{\text{Trockengewicht [g]}} \), are in the range from 6.80 [g/g] (test 2) to about 9.74 [g/g] (test 5). Not only are these values much lower than the minimum value of the \( t_{1200} \) absorbent capacity specified in claim 1 of the patent in suit, the variation in absorbent capacity of the tested Ecolab tissues seems to be rather high. Determining the weight of the sample and the weight of the absorbed fluid is carried out before the sample is squeezed-out, i.e. blotted. In the opinion of the Board, it can be no surprise that the measured weights of the blotted samples, and therefore of the squeeze-out values, also showed a large variation. In the test report submitted by the appellant and denoted as document D10, the six Swiffer Wetjet cleaning pads that were tested were found to have an absorbent capacity from 29.55 [g/g] (test No. 1, Replicate 3) to 30.93 [g/g] (test No. 2, Replicate 1), i.e. within the range specified in claim 1 of the patent in suit for the \( t_{1200} \) absorbent capacity. A dependency on the grade of Whatman filter paper is not reported in document D10.
In the decision under appeal the Opposition Division did not comment on the objection made by the respondent that the failure to specify the size and grade of Whatman filter paper in the squeeze-out test constituted a lack of disclosure in the sense of Article 83 EPC.

The Opposition Division, however, reasoned that squeezing-out fluid was the reverse process of fluid intake ("absorbing fluid"), and, since the \( t_{900} \) absorbent capacity and the \( t_{1200} \) absorbent capacity reported in paragraph [0028] of the patent in suit were different (namely that the amount of fluid absorbed in 900 s was less than the amount of fluid absorbed in 1200 s), a similar time-dependency applied to the squeeze-out duration as well (see point 2.3.3.2, first two paragraphs, of the Reasons).

The Opposition Division may be correct when asserting that the amount of fluid that is blotted from a sample in 15 minutes is less than the amount of fluid that is blotted in 20 minutes. However, this is not the point. The squeeze-out test specifically requires that the amount of fluid that can be blotted is determined (see page 13, lines 49 to 51, of the patent in suit). The typical blotting time reported in document D10 is much longer than the twenty minutes that is taken for determining the \( t_{1200} \) absorbent capacity, namely 30 minutes for the first squeeze-out and about 16 hours for the second squeeze-out ("in practice from about 5 pm one afternoon until about 9 am the following day"), see document D10, point 8. In document D8 no information is provided about the duration of the
blotting test. It is clear, however, from the test results on 5 Ecolab tissues (see document D8, Table bridging pages 2 and 3) that the weight of the test fluid lost was simply calculated from the difference between the weight of the wet sample saturated to capacity and the weight of the sample after blotting.

The Opposition Division put forward a second reason why the blotting test described in the patent in suit was the wrong test to determine the weight of test fluid lost: based on Fick's second law of diffusion, blotting continued indefinitely until the cleaning pad was dry.

However, this theory is not supported by the evidence in the test reports D8 and D10. In document D8, after completion of the blotting test, a considerable amount of fluid is still present in the blotted sample (see Table bridging pages 2 and 3, column Wet Wt 2). The ratio disclosed in document D10 shows that after about 16.5 hrs of blotting the amount of fluid that can be removed from the cleaning pad by blotting is in the order of 0.04 to 0.09 g, which is for all practical purposes a negligible amount (see Table on page 7 of document D10).

In the judgement of the Board, the passage on page 13, lines 49 to 51, of the patent in suit, viz. "Squeeze-out" is measured on an entire cleaning pad by determining the amount of fluid that can be blotted from the sample with Whatman filter paper under pressures of 0.25 psi (1.5 kPa), enables the person skilled in the art to determine the amount of fluid that can be blotted.
1.5 The Board comes thus to the conclusion that the patent discloses the invention as claimed in claim 1 of the main request in a manner sufficiently clear and complete for it to be carried out by a person skilled in the art (Articles 100(b) and 83 EPC).

Auxiliary Request

2. Since the subject-matter of claim 1 of the main request is found to be disclosed in compliance with Article 83 EPC, there is no need to consider the auxiliary request of the appellant.

Remittal

3. Since the other ground for opposition, lack of inventive step, Article 56 EPC, raised by the respondent and mentioned in Article 100(a) EPC, was not examined by the Opposition Division, the Board considers it appropriate to make use of its discretionary powers under Article 111(1) EPC and to remit the case to the Opposition Division for further prosecution.

In his statement setting out the grounds of appeal the appellant pointed out that the respondent had withdrawn his opposition and submitted that under the circumstances it appeared neither appropriate for the Board to consider the question of inventive step itself, nor appropriate to remit the case to the Opposition Division for inventive step to be considered. However, it is established case law of the Boards of Appeal that if the opponent is the respondent, withdrawal of the opposition does not
affect the appeal proceedings in respect of the substantive issues, see e.g. decision T 629/90 (OJ EPO 1992, 654), point 2.2 of the Reasons. Furthermore, the competent Board may exercise its discretionary power under Article 111(1) EPC without giving the parties to the appeal proceedings the opportunity to present their comments within the meaning of Article 113(1) EPC, irrespective of whether or not the parties filed requests concerning the way the Board is to exercise the power in question.

The request of the appellant to appoint oral proceedings if the Board was unable to comply with his main request is thus construed to mean that oral proceedings be appointed if the Board were to find that, on the basis of the written submissions of the appellant, the invention claimed in claim 1 of the main request was not sufficiently disclosed in the patent in suit.

Since, in the judgement of the Board (see point 1.5 above), the patent discloses the invention claimed in claim 1 of the main request in a manner sufficiently clear and complete for it to be carried out by a person skilled in the art, there is no need for the Board to conduct oral proceedings.
Order

For these reasons it is decided that:

1. The decision under appeal is set aside.

2. The case is remitted to the Opposition Division for further prosecution.

The Registrar: M. Dainese

The Chairman: W. Moser