DECISION of 20 January 2000

Case Number: T 1001/95 - 3.3.1
Application Number: 88307133.4
Publication Number: 0302705
IPC: B65D 21/02

Language of the proceedings: EN

Title of invention:
Mitigation of stress-cracking in stacked loads of fragranced bleach-containing bottles, bottles containing such fragranced bleach, bleach for use in such bottles, and storage systems including such bottles

Patentee:
The Clorox Company

Opponent:
PROCTER & GAMBLE EUROPEAN TECHNICAL CENTER N.V.

Headword:
Stress-cracking/CLOROX

Relevant legal provisions:
EPC Art. 56, 83, 114(1), 122

Keyword:
"Re-establishment of rights (yes) - loss of right results from an isolated procedural mistake in a normally satisfactory system"
"Sufficiency of disclosure (yes) - the mere assertion that the claimed subject-matter is not sufficiently disclosed is no sufficient substantiation"
"Inventive step (yes) - no incentive to take cited documents into consideration"
Decisions cited:
G 0001/86, J 0005/80, J 0002/86, J 0003/86, T 0182/89, T 0881/92

Catchword: -
DECISION
of the Technical Board of Appeal 3.3.1
of 20 January 2000

Appellant: PROCTER & GAMBLE EUROPEAN TECHNICAL CENTER N.V.
(Temselaan 100
B-1853 Strombeek-Bever (BE)

Representative: Engisch, Gautier
Procter & Gamble
European Technical Center N.V.
Temsealnen 100
1853 Strombeek-Bever (BE)

Respondent: The Clorox Company
(1221 Broadway
Oakland
California 94612 (US)

Representative: Froud, Clive
Elkington and Fife
Prospect House
8 Pembroke Road
Sevenoaks, Kent TN13 1XR (GB)

Decision under appeal: Decision of the Opposition Division of the European Patent Office posted 27 October 1995 rejecting the opposition filed against European patent No. 0 302 705 pursuant to Article 102(2) EPC.

Composition of the Board:
Chairman: A. J. Nuss
Members: P. P. Bracke
W. Moser
Summary of Facts and Submissions

I. The appeal is against the Opposition Division's decision dated 27 October 1995, rejecting the opposition against European patent No. 0 302 705. The opposition was based on the grounds that the patent in suit 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 and that the claimed subject-matter did not involve an inventive step inter alia over the teachings of documents

(1) EP-A-0 017 951;

(5) Kunststoffe 66, 1976, pages 38 to 41;

(6) US-A-3 348 667; and


The granted set of claims consisted of 18 claims, with the independent claims 1, 9 and 15 reading:

"1. A storage and shipping system comprising a plurality of shipping containers, each of said containers bearing a compression load from at least one other container, except for the uppermost container, each of said containers housing a plurality of plastic, relatively thin-walled vessels, said vessels containing a liquid bleach composition, said vessels sharing at least a portion of the vertical component of said compression load; characterised in that said liquid bleach composition comprises:
(a) a liquid hypochlorite bleach;

(b) an adjuvant immiscible or slightly miscible in said liquid bleach;

(c) a hydrotrope for dispersing said adjuvant in said liquid bleach;

(d) less than 100 ppm of a bleach-stable surfactant to assist in dispersion;

and in that the amounts of hydrotrope (c) and surfactant (d) added are not sufficient to lower the surface tension of the liquid bleach composition below the critical surface tension of the plastic so as not to promote stress-cracking in said plastic vessels."

"9. A plastic, relatively thin walled bottle and a liquid bleach composition in combination therewith, characterised in that said liquid bleach composition comprises:

(a) a liquid hypochlorite bleach;

(b) an adjuvant immiscible or slightly miscible in said liquid bleach;

(c) a hydrotrope for dispersing said adjuvant in said liquid bleach;

(d) less than 100 ppm of a bleach-stable surfactant to assist in dispersion,

and in that the amounts of hydrotrope (c) and
surfactant (d) added are not sufficient to lower the
surface tension of the liquid bleach composition below
the critical surface tension of the plastic so as not
to promote stress-cracking in said plastic bottle."

"15. A fragranced liquid hypochlorite bleach in which
an immiscible or slightly miscible fragrance is stably
dispersed in said bleach with minimal wetting of the
interior surface of a plastic container in which said
bleach is housed, characterised in that said bleach
consists of:

(a) 0.5-10% by weight of an alkali metal hypochlorite;

(b) 0.001-10% by weight of a water-immiscible to
slightly miscible fragrance composed of volatile
oils;

(c) an effective amount of a hydrotrope dispersant
which does not wet plastic to any substantial
extent but stably suspends the fragrance in said
hypochlorite, said hydrotrope being selected from
the group consisting of unsubstituted and
substituted aryl sulfonates, unsubstituted and
substituted aryl carboxylates, C_6-10 alkyl
sulfonates, C_8-14 alkyl dicarboxylates, and mixtures
thereof;

(d) Less than 100 ppm of a surfactant to assist in
dispersion;

(e) the remainder, water and other inert materials,

and in that the amounts of hydrotrope (c) and
surfactant (d) added are not sufficient to lower the surface tension of the liquid bleach composition below the critical surface tension of the plastic so as not to promote stress-cracking in said plastic container.”

II. At the oral proceedings before the Board, which took place on 20 January 2000, the Appellant (Opponent) was not represented. By telefax dated 24 November 1999, he had requested that a decision be taken on the basis of the written submissions in the file.

III. In the written procedure the Appellant accepted that the statement setting out the grounds of appeal, received at the EPO by telefax on 7 March 1996, was not filed in due time and he filed an application for re-establishment of rights according to Article 122 EPC on 22 March; the appropriate fee was paid on 25 March 1996.

In support of his submission that the non-observance of the four month period for filing the statement setting out the grounds of appeal was the result of an isolated mistake in a system which was otherwise normally satisfactory, the Appellant filed with letter of 19 March 1996 inter alia:

- a copy of the page of the training manual of the Appellant, concerning term watching by a central diary (Attachment 1),

- a copy of the page of the central diary where the term should have been docketed (25 to 27 February 1996) (Attachment 3) and
copies of the pages of the representative's
docketing (Attachment 4) and of the central diary
(Attachment 5) where the two months term for
filing the notice of appeal in the present case
has been docketed on 27 December 1995.

IV. On the merits, the Appellant stated that Claim 16 was
not sufficiently disclosed in the patent in suit
because the composition of a reference compound used in
the test referred to in Claim 16, namely that of "Fresh
Scent Clorox Bleach ®", was not known at the priority
date of the patent in suit and because there was no
evidence that its composition had not been changed
since that priority date. By referring to that test, he
moreover submitted that Claim 16 contained an
unallowable trade mark.

As far as inventive step was concerned, the Appellant
submitted that document (1) represented the closest
state of the art. Since a skilled person knew from
document (1) that surfactants and hydro tropes were
interchangeable at least to some extent as perfume
solubilizers and since he knew from document (5) that
surfactants cause stress cracking of plastic
containers, he would try to reduce the amount of
surfactant in the compositions known from document (1).

V. The Respondent (Proprietor of the patent in suit)
stated that it was questionable that the Appellant had
been unable to observe the time limit for filing the
statement setting out the grounds of appeal in spite of
all due care required by the circumstances having been
taken in order to re-establish his rights.
VI. The Respondent submitted that the composition of "Fresh Scent Clorox Bleach" was given as material 4 of Table IV in the patent in suit and that the composition had not been changed since the priority date of the patent in suit. Therefore, how the test referred to in Claim 16 was carried out had been sufficiently described.

In the discussion of inventive step, he argued that the problem of stress-cracking caused by compression load had always been solved by mechanical means and that, with the present invention, a chemical solution to that problem was proposed for the first time. Since in none of the cited documents a chemical solution for the problem of stress-cracking caused by compression load was described or suggested, the claimed subject-matter was not obviously derivable therefrom. Additionally, he submitted that neither document (1) nor document (5) concern bleaching compositions and that, consequently, a skilled person would not have taken those documents into consideration.

VII. The Appellant requested that his rights be re-established and that the decision under appeal be set aside and that the European patent No. 0 302 705 be revoked.

The Respondent requested that the Appellant's application for re-establishment of rights be refused and that the appeal be dismissed.

Reasons for the Decision
Admissibility

1. Pursuant to Rule 78(3) EPC, the decision dated 27 October 1995 was deemed to be delivered to the appellant on 6 November 1995. Hence, the time limit for filing the statement setting out the grounds of appeal expired on 6 March 1996 (Article 108, third sentence EPC, Rule 83(4) EPC). However, the statement was filed only on 7 March 1996, i.e. late. Consequently, the admissibility of the present appeal hinges upon the allowability of the appellant's application for re-establishment of rights under Article 122 EPC.

2. Under Article 122(1) EPC re-establishment of rights may in principle not be granted to an opponent. However, there is an exception to this principle in the following case: An opponent as appellant may have his rights re-established under Article 122 EPC if he has failed to observe the time limit for filing the statement setting out the grounds of appeal (cf. decision G 1/86 of the Enlarged Board of Appeal (cf. OJ EPO 1987, 447). In the present case, the appellant was thus entitled to apply for re-establishment of rights under Article 122 EPC. The application further complies with the requirements of Article 122(2) and (3) EPC; it is thus admissible.

3. When an applicant is represented by a professional representative (Article 114(1) EPC), an application for re-establishment of rights under Article 122 EPC cannot be acceded to unless the authorised representative himself can show that he has taken the due care required of an applicant by Article 122(1) EPC (cf. J 05/80 (OJ EPO 1981, 343), point 4 of the Reasons).
However, if the representative has entrusted to an assistant the performance of routine tasks, the same strict standards of care are not expected of the assistant as are expected of the applicant or his representative (cf. J 05/80 above, point 6 of the Reasons). Hence, a culpable error on the part of the assistant made in the course of carrying out routine tasks is not to be imputed to the representative if the latter has himself shown that he exercised the necessary due care in dealing with his assistant. In this respect, it is incumbent upon the representative to choose for the work a suitable person, properly instructed in the tasks to be performed, and to exercise reasonable supervision over the work (cf. J 05/80 above, point 7 of the Reasons).

Since application for re-establishment of rights under Article 122 EPC is also admissible in the present case, the above principles reflecting the established jurisprudence of the Boards of Appeal are applicable mutatis mutandis.

4. Furthermore, when considering an application for re-establishment of rights, it has to be kept in mind that Article 122 EPC is intended to ensure that in appropriate cases the loss of substantive rights does not result from an isolated procedural mistake within a normally satisfactory system (cf. J 02/86, J 03/86 (OJ EPO 1987, 362)).

5. The Appellant argued that the non-docketing by the representative was a mistake while the non-docketing by the central clerk was the result of exceptional circumstances, due to the fact that the EPO, until
September 1994, issued decisions with a cover form mentioning both the two months term for filing the notice of appeal and the four months term for filing the statement setting out the grounds of appeal, whereas the form covering the decision under appeal mentioned only the two months term for filing a notice of appeal. Since the central clerk thus docketed only the two months term, as may be concluded from Attachments 3 and 5, Appellant's double docketing system, which was previously satisfactory, became inefficient in the unique situation where the representative forgot to docket the four months term for filing the statement setting out the grounds of appeal. Since it was extremely rare that representatives forget to docket their terms and since most of the appeals lodged by the Appellant were handled by outside agents having their own systems for docketing terms, in the present case it took up to the expiration of the term for filing the statement of the grounds of appeal, before the deficiency in the system became apparent; and the central clerk had now been instructed to docket both terms of appeal, even tough the EPO form only mentions the two months term.

Since it may be derived from Attachment 1 that not only the representative kept a docket listing the terms but that such terms are also registered in a central diary, as confirmed by the docketing of the two months term for filing the notice of appeal by the representative (Attachment 5) as well as by the central diary (Attachment 4), in the Board's view the Appellant's docketing system may be considered as a normally satisfactory system.
Moreover, the Board does not have any reason to doubt that the non-docketing of the four month period for filing a statement setting out the grounds of appeal is an isolated procedural mistake within a normally satisfactory system.

Furthermore, despite the non-docketing of the term pursuant to Article 108, third sentence EPC, the statement setting out the grounds of appeal was filed only one day after the term had elapsed, which implies that the Appellant's representative and/or the central clerk checked the diaries carefully.

6. Since Article 122 EPC is intended to ensure that in appropriate cases the loss of substantive rights does not result from an isolated procedural mistake within a normally satisfactory system (cf. point 4 above), the rights of the Appellant are re-established in relation to the filing of the statement of the grounds of appeal within the time limit prescribed by Article 108, third sentence, EPC.

7. Hence, the appeal is admissible.

Sufficiency of disclosure

8. The Appellant objected to the wording of Claim 16, wherein the bleach according to Claim 15 is further characterised in that "the hydrotrope is visually graded no higher than 4 on the polyethylene wetting grade scale according to the test described in the experimental part of the description". Since the test referred to is described in one of the footnotes to Table VII to require grading of the hydrotrope against
two references, one of them being "Fresh Scent Clorox Bleach ® ", in the Appellant's view it was essential that the composition at the priority date was known in order to be able to reproduce the test.

9. The Appellant conceded not to have any evidence that the composition had changed since the priority date, but he submitted that, on mere probabilities, it is more likely than not that the product would have changed and he asked the Respondent to produce evidence that the product has not been changed.

10. However, according to the case law of the Boards of Appeal of the EPO the party making such a statement has also the burden of proof. Thus, in order to establish insufficiency, the burden of proof is upon the party objecting it, namely the Appellant-Opponent (see, for example, T 182/89 (OJ EPO 1991, page 391, point 2 of the reasons)). In the present case, in the Board's judgement, the Appellant's assertion that the claimed subject-matter was not disclosed in a manner sufficiently clear and complete within the meaning of Article 83 EPC has not been substantiated. Moreover, there is no evidence that "Fresh Scent Clorox Bleach ® " is essential for carrying out the test referred to in Claim 16.

Inventive step

11. The Opposition Division and the Appellant considered document (1) to represent the closest state of the art.

However, in selecting the closest prior art, the first consideration is that it must be directed to the same
purpose or effect as the invention. Otherwise, it cannot lead a skilled person in an obvious way to the claimed invention.

The patent in suit relates to a storage and shipping system comprising containers which house plastic vessels or bottles to hold liquid bleaches containing immiscible or slightly miscible adjuvants, in which the shipping and storage containers are stacked on top of one another (page 2, lines 3 to 5), whereas document (1), which is concerned with the use of hydrotropes and surfactants for solubilising perfume oils in solutions containing high amounts of electrolytes, is completely silent about the problems arising from storing and shipping containers housing plastic vessels or bottles and about the problems arising from liquid bleaches containing immiscible or slightly miscible adjuvants contained in plastic vessels or bottles. Therefore, a skilled person would not have any incentive to consider document (1) as an appropriate starting point and, consequently, it cannot represent the closest state of the art.

12. According to the case law of the Boards of Appeal of the EPO, the definition of the technical problem to be solved should normally start from the technical problem actually described in the patent in suit in relation to the closest state of the art indicated there. Only if it turns out that an incorrect state of the art was used or that the technical problem disclosed has in fact not been solved or has not been correctly defined for some reason(s), is it appropriate to consider another problem which objectively existed (see, for example, T 881/92 of 22 April 1996, point 4.1 of the

In the present case, from the cited documents concerning the problem of storing and shipping containers housing plastic vessels or bottles containing bleaches, only mechanical solutions are known and none of these documents proposes to solve such problem by modifying the bleach composition. Therefore, the Board has no reason to assume that a state of the art exists which is more relevant to the claimed storage and shipping system than the proposed solutions described in the documents cited in the introductory part of the description of the patent in suit (page 2, lines 27 to 35), such as the one described in document (6).

13. Document (6) describes a shipping container having greater vertical strength in relation to the amount of material used in its manufacture as compared to prior shipping containers of equal size made from identical material, such container being composed of separate upper and lower trays there being a plurality of angular partitions interposed between the trays to form a vertical structural support (column 1, lines 25 to 29 and lines 51 to 55). Moreover, in column 4, lines 14 to 18, it teaches that the vertical loads on the container are borne by the angular partitions rather than the articles packaged therein, such as bottles and jars.

14. In view of the teaching of document (6), the technical problem underlying the claimed invention was to reduce or eliminate stress-cracking in plastic bottles which
contain a liquid bleach and an adjuvant immiscible or slightly miscible in said liquid bleach and which bottles are packaged in cartons in which the bottles themselves directly share or bear part of the load caused by similarly-filled cartons which are stacked on top of one another (see the patent in suit, page 2, lines 36 to 47, and page 3, lines 21 to 24).

15. According to the patent in suit it was found that stress-cracking is substantially reduced when a hydrotrope and less than 100 ppm surfactant is used instead of common surfactants which cause wetting of the surface (page 3, lines 18 to 20) and the problem described in point 3.4 is solved by the storage and shipping system claimed in Claim 1.

16. From the data provided in Table VI of the patent in suit it follows that with fragranced aqueous sodium hypochlorite compositions containing hydrotrope as a dispersant the crack length in the tensile bar test is not increased in comparison to a control aqueous sodium hypochlorite composition containing neither fragrance nor dispersant, whereas such crack length is increased with aqueous sodium hypochlorite compositions containing surfactant as fragrance dispersant.

The Board accepts that those data are illustrative in so far as the compression load stress-cracking caused by stacking the containers is substantially reduced when a hydrotrope and less than 100 ppm surfactant are used instead of common surfactant and, consequently, that a credible case has been put forward that the problem underlying the invention, as defined under point 14, is effectively solved by the claimed system.
Besides, this was not contested by the Appellant.

17. It remains to be decided, whether, in the light of the teachings of the cited documents, a skilled person seeking to solve the above-mentioned problem, would have arrived at the storage and shipping system of Claim 1 in an obvious way.

17.1 Document (1) concerns the problem of solubilizing oil soluble perfume oils in aqueous compositions containing more than 15% by weight of electrolytes, such as bleaches, and proposes to use an alkylene succinic acid derivative as hydrotrope in combination with surfactants. In particular, it teaches that such compositions containing 0.2 to 0.5 perfume oil necessarily contain 4 to 5% by weight of alkylene succinic acid derivative and 1 to 1.5% by weight of surfactants (see page 1, lines 4 to 11, page 2, lines 18 to 25, and page 5, lines 1 to 16).

Since document (1) is completely silent about the problem arising from compression load stress cracking of plastic vessels caused by stacking containers containing such vessels, on top of each other, and about the effect of surfactants or hydrotropes on stress cracking of polyethylene, in general, a skilled person could not get any hint therefrom that compression load stress cracking of plastic vessels containing a fragranced bleach composition could be substantially reduced by filling them with fragranced bleach containing a hydrotrope and less than 100 ppm of surfactant.

17.2 Document (5) is related to the problem of stress-
cracking of polyethylene under tension, in particular, in the presence of surface active agents and it teaches that stress-cracking is dependent on the nature and the concentration of the surfactant (page 38, left-hand column, second and last paragraph, and right-hand column, second paragraph; and the paragraph bridging the right-hand column of page 39 and the left-hand column of page 40).

Since it was known from document (5) that surfactants influence the stress cracking of polyethylene, the Appellant argued that it was obvious to reduce the amount of surfactants. In this respect, he submitted that it was common general knowledge, as confirmed by document (11), page 49, lines 4 to 8, that the bleach would promote the stress cracking induced by the surfactant.

However, in the relevant passage of document (11) it is only said that the addition of ionic electrolytes to anionic surface active agents can reduce surface and interfacial tension and improve wetting speed; and document (5) is only concerned with the influence of surfactants on the stress cracking of polyethylene. Since both documents are silent about the effect hydrotropes could have on stress cracking, let alone on stress cracking under compression load, none of these documents could provide a skilled person with any pointer to replace common surfactants as dispersants by hydrotropes.

17.3 The Board therefore concludes that, starting from the storage and shipping systems of document (6) as the most relevant prior art, a skilled person would have
had no incentive to take the teaching of document (1), (5) or (11) into consideration.

18. Consequently, the claimed system according to Claim 1 was not obviously derivable from the cited documents. Moreover, this conclusion is also valid for the subject-matter of the independent Claims 9 and 15 for the same reasons. Furthermore, dependent Claims 2 to 8, 10 to 14 and 16 to 18, which relate to specific embodiments of the subject-matter of independent Claims 1, 9 and 15, respectively, derive their inventiveness from that of the respective independent claims.

19. Therefore, the Board comes to the conclusion that the grounds on which the opposition was based, do not prejudice the maintenance of the patent in suit unamended.
Order

For these reasons it is decided that:

The appeal is dismissed.

The Registrar: The Chairman:

E. Görgmaier A. Nuss