Datasheet for the decision
of 14 March 2018

Case Number: T 1915/14 - 3.2.07
Application Number: 07827057.6
Publication Number: 2086729
IPC: B26B19/38, B26B21/40, B26B21/52, B26B19/14
Language of the proceedings: EN

Title of invention:
ROTARY SHAVER WITH IMPROVED SUPPORT STRUCTURE FOR SHAVING HEADS

Patent Proprietor:
Koninklijke Philips N.V.

Opponent:
Spectrum Brands, Inc.

Headword:

Relevant legal provisions:
EPC Art. 56
RPBA Art. 12(2), 12(4)
Keyword:
Inventive step - main request (no) - common general knowledge
- auxiliary request (yes) - ex post facto analysis

Decisions cited:
G 0009/91, G 0010/91

Catchword:
DECISION of Technical Board of Appeal 3.2.07 of 14 March 2018

Appellant: Koninklijke Philips N.V. (Patent Proprietor)
High Tech Campus 5
5656 AE Eindhoven (NL)

Representative: de Haan, Poul Erik
Philips International B.V.
Philips Intellectual Property & Standards
High Tech Campus 5
5656 AE Eindhoven (NL)

Respondent: Spectrum Brands, Inc. (Opponent)
601 Rayovac Dr.
Madison, WI 53711 (US)

Representative: Davies, Christopher Robert
Dehns
St Bride's House
10 Salisbury Square
London EC4Y 8JD (GB)

Decision under appeal: Decision of the Opposition Division of the European Patent Office posted on 23 July 2014 revoking European patent No. 2086729 pursuant to Article 101(3)(b) EPC.

Composition of the Board:
Chairman: I. Beckedorf
Members: V. Bevilacqua
C. Narcisi
Summary of Facts and Submissions

I. The patent proprietor (appellant) lodged an appeal against the decision of the opposition division revoking the European patent No. 2 086 729 in due time and form.

II. Opposition had been filed against the patent as a whole based on Article 100(a) EPC (lack of novelty, lack of inventive step) and Article 100(c) EPC.

III. The opposition division revoked the patent on the basis of the ground for opposition according to Article 100(a) EPC for lack of inventive step.

IV. The appellant requested that the decision under appeal be set aside and that the patent be maintained in amended form on the basis of one of the sets of claims filed as main request with letter of 16 July 2013, as auxiliary request 1 with letter of 16 April 2014, and as auxiliary request 2 with letter of 1 December 2014.

The respondent (opponent) requested that the appeal be dismissed.

V. Oral proceedings took place on 14 March 2018, at the end thereof both parties confirmed their initial requests as final and the present decision was announced. For the course of the oral proceedings, the issues discussed with the parties and the parties' initial and final requests, reference is made to the minutes of the oral proceedings.
VI. The following documents were mentioned in the appealed decision and will be referred to in the present decision:

E1: WO-A-2006 067 713;
E4: GB-A-1 450 888;

The following document was referred to by the appellant during oral proceedings before the Board:


VII. **Claim 1 of the main request** reads as follows:

"A shaving device comprising a base structure (4) and a head structure (2), wherein the head structure comprises a head support structure (6) configured to support at least two rotary shaving heads, and wherein the base structure is free of support elements in an area of an outer circumference of the head structure such that the head structure, when coupled to the base structure, is not supported in the area of its outer circumference,

characterized in that

the head structure (2) comprises a coupling element (8) arranged in a central area (2A) of the head structure in a center of a substantially circular area which is restricted by a rotary shaft of each rotary shaving head, and in that the base structure (4) comprises a retaining structure configured for releasably retaining the coupling element for coupling the head structure to the base structure, wherein the head structure, when
coupled to the base structure, is substantially only retained on the base structure by a retaining force exerted by the retaining structure on the coupling element."

Claim 1 of auxiliary request 1, filed on 16 April 2014, corresponds to claim 1 of the main request but additionally comprises the following feature added at the end of the characterizing portion thereof:

"wherein the head structure (2), when coupled to the base structure (4), is solely supported by the coupling element (8)."

Claim 1 of auxiliary request 2, submitted with the statement setting out the grounds of appeal, reads as follows (amendments over claim 1 of the main request are highlighted by the Board):

"A shaving device comprising a base structure (4) and a head structure (2), wherein the head structure comprises a head support structure (6) configured to support at least two rotary shaving heads, and wherein the base structure is free of support elements in an area of an outer circumference of the head structure such that the head structure, when coupled to the base structure, is not supported in the area of its outer circumference, and wherein

characterized in that

the head structure (2) comprises a coupling element (8) arranged in a central area (2A) of the head structure in a center of a substantially circular area which is restricted by a rotary shaft of each rotary shaving head, and characterized in that the base structure (4)
comprises a retaining structure configured for releasably retaining the coupling element for coupling the head structure to the base structure, wherein the head structure, when coupled to the base structure, is substantially only retained on the base structure by a retaining force exerted by the retaining structure on the coupling element; wherein the coupling element (8) is a shaft like element protruding from the central area (2A) of the head structure (2) and comprising at its distal end (20) a sloped surface (12a, 16A) facing the head support structure (6) and wherein the retaining structure comprises:
- a retaining recess (18) for receiving the coupling element (8) ; and
- a spring element (10, 10A, 10B, 10C, 10D) at least partly provided in the retaining recess (18) , the spring element (10, 10A, 10B, 10C, 10D) being arranged for engaging the sloped surface (12A, 16A) of the coupling element (8) such that the coupling element (8) is retainable in the retaining recess (18)."

VIII. Insofar as relevant to the present decision the appellant argued substantially as follows.

E6 was to be considered by the Board as relevant.

The opposition division did not correctly construe claim 1 of the main request.

The subject-matter of claim 1 according to the main request and according to auxiliary requests 1 and 2 was novel over the relevant prior art and, in particular, inventive in view of the teaching of document E1 in combination with the common general technical knowledge and/or the teaching of any of documents E3 to E5.
The appellant's arguments will be dealt with in more detail in the reasons for this decision.

IX. Insofar as relevant to the present decision the respondent argued substantially as follows.

E6 was not to be admitted, as this document did not relate to the case under appeal, because the interpretation of claim 1 of the main request referred to by the appellant was the same referred to in the appealed decision, by the respondent and the Board.

In addition, this document was never an object of discussion up to oral proceedings before the Board.

The opposition division was right to revoke the patent in suit for lack of inventive step in respect of claimed subject-matter of the main request and of auxiliary request 1. Auxiliary request 2 should not be admitted into appeal proceedings. Apart from that, the subject-matter of claim 1 according to that request was not inventive in view of the teaching of document E1 in combination with the common general technical knowledge and/or the teaching of any of documents E3 to E5.

The respondent's arguments will be dealt with in more detail in the reasons for this decision.
Reasons for the Decision

1. E6 - admissibility

1.1 The appellant argued that the appealed decision was not based on a correct interpretation of claim 1 of the main request because the feature that the coupling element had to be a component of the claimed head structure was overlooked.

According to the appellant consideration should be given to E6 in order to appropriately determine how claim 1 of the main request had to be construed by a skilled person.

The appellant therefore requested admission of E6 into appeal proceedings by arguing that this document was mentioned in the patent in suit and all the information contained therein had to be acknowledged to correctly determine how claim 1 of the main request had to be construed.

The appellant further requested consideration of E6 also because this document was mentioned in the appealed decision.

1.2 The Board disagrees. A document is not automatically scrutinised in opposition or opposition appeal proceedings only because it is quoted and acknowledged in the contested European patent (see Case Law of the Boards of Appeal, 8th edition 2016, IV.C.1.1.5).

E6 was submitted during oral proceedings before the opposition division, and this is the only issue related to this document which is mentioned in the appealed decision (see page 2, point 8).
E6 was not admitted into opposition proceedings, and in fact no statement to this effect is to be found in the appealed decision or in the minutes of oral proceedings.

In appeal proceedings E6 was only referred to by the appellant during oral proceedings before the Board.

However, according to Article 12(2) RPBA, the statement setting out the grounds of appeal must contain an appellant's complete case, specifying expressly all the relevant facts, arguments and evidence to be relied upon. This provision provides a cut-off point after which any further submission, such as E6 in the present case, is ipso facto late and its admission subjected to the discretionary power of the Board (Supra, IV.C. 1.3.8).

The Board notes that E6 has no relevance to the present proceedings, because the opposition division construed claim 1 of the main request as comprising the feature that the coupling element is a component of the claimed head structure (see point 11.4 of the appealed decision where feature 1.5 is discussed) and the Board does not deviate (see point 2.2 of the present decision) from this interpretation of the claim.

This interpretation has also never been contested by the respondent, both during opposition and appeal proceedings.

The admission of E6 into appeal proceedings would therefore not have any effect on the construction of claim 1 of the main request, and therefore also on the outcome of the subsequent patentability discussions.
As a consequence of that, the Board decides not to admit this document as it does not relate to the case under appeal (Article 12(4) RPBA).

2. E1 - content of the disclosure

2.1 It is common ground that E1 discloses a shaving device having all the features of the preamble of claim 1 of the main request.

The appellant argued that all the features of the characterizing portion of this claim are new over the content of the disclosure E1 especially because holder (106) of E1 (depicted in figure 5) does not belong to the head structure (depicted in figure 4), and as a consequence of that the head structure of E1 does not comprise a coupling element arranged in a central area of the head structure in a center of a substantially circular area which is restricted by a rotary shaft of each rotary shaving head.

2.2 The Board disagrees with the appellant in relation to this particular feature for the following reasons.

2.2.1 E1, page 3 lines 11-16, discloses a "shaving unit", corresponding to the head structure of claim 1. E1 also discloses a holder (106) having the shaving heads mounted thereon (see figure 3A).

E1 then discloses that the holder (106) has a lower cylindrical portion arranged in a central area of the head structure (3) in a center of a substantially circular area which is restricted by a rotary shaft of each rotary shaving head (see figures 2, 3 and 5).
This lower cylindrical portion of the holder base acts (see page 7, lines 22-23) as a connecting element of the head structure, comprising the shaving heads, with the base structure.

Element (106) clearly keeps the shaving heads together thereby forming a unitary removable (head) structure with them.

The holder (106), as an element of the head unit, is centrally connected to the shaver body, around the drive shaft. Such a central connection clearly mechanically pairs the base structure and the head structure.

As a consequence of that, the Board considers that El discloses a coupling element (the lower cylindrical portion of holder base (106)) belonging to the head structure arranged in a central area of the head structure 3 in a center of a substantially circular area which is restricted by a rotary shaft of each rotary shaving head (see figures 2, 3 and 5).

2.2.2 As the head structure is coupled to the base structure, said base structure necessarily comprises a retaining structure (not shown) which is configured for interacting with the coupling element of the head structure.

2.2.3 In respect of the appellant's argument that the shaving unit did not include the holder base (106), because according to page 3, lines 15, 16 the holder is "for the shaving unit", the Board concurs with the position of the respondent that the use of "for" does not prevent the skilled person from considering that said holder is a component of the head structure (referred
to as "shaving unit" in E1), as a handlebar for a bicycle can also be considered as part of the bicycle.

2.2.4 Contrary to the appellant's argument according to which E1 did not disclose that the holder base (106) and the shaving heads together constitute a replaceable assembly, E1, page 7, lines 31-32, clearly explains that the body structure 2 can be used with a set of various head structures (referred to as shaving units in the language of E1, see page 6, lines 32-33).

2.2.5 The appellant also argued that the connection between the coupling element of the head structure and the retaining structure of the base element in the second embodiment of E1 was not disclosed as being releasable.

2.2.6 The Board disagrees. E1 clearly mentions that the head structure is made by shaving heads (5) mutually connected through the central holder base (106).

This implies that when E1 further states that said central holder base (106) (see page 7, lines 28-33) is designed so as to allow the shaving heads to be detached together from the base structure, the complete head structure is intended to be removed, for allowing the base structure (called shaving body) to be used with a set of various head structures (called shaving units 3).

E1 therefore also discloses that the head structure is releasably retained on the base structure.

This implies that the retaining structure of the base element, which is only implicitly disclosed in E1, is suitable for releasably retaining the coupling element for coupling the head structure to the base structure.
3. Main request - inventive step

3.1 Distinguishing features

According to E1, page 7, lines 31-33, there is a retaining structure (referred to as decoupling provision) engaging with the coupling element of the head structure and allowing the head structure and the base structure to be connected and disconnected in case of an overloading force.

As acknowledged by both parties, E1 is silent about the physical structure of this retaining structure.

The feature that the head structure, when coupled to the base structure, is substantially only retained on the base structure by a retaining force exerted by the retaining structure (of the base structure) on the coupling element (of the head structure) is therefore not disclosed by E1.

This is the only difference between the subject-matter of claim 1 of the main request and the device shown in the second embodiment of E1.

3.2 Effect - Problem to be solved

The appellant argued the presence of inventive step by referring to the effect mentioned in paragraph [10] of the patent in suit, according to which when the distance between the circumference of the head structure and the retaining structure was maximized, the torque acting on the retaining structure in case the shaver was dropped is also maximized, thereby
automatically and reliably releasing the head structure.

The Board notes that this effect is not linked to the above identified distinguishing features, as E1 already discloses a centrally supported head structure.

According to paragraph [10] of the patent in suit the distinguishing features have the effect that in the assembled state it is the retaining structure of the base structure which limits the movement of the coupling element of the head structure and keeps it in place.

As the presence of a retaining structure is implicit from E1 (see point 3.1 above), but this provision is not described in detail, the Board concurs with the respondent on the formulation of the problem to be solved as: how to design this retaining structure.

3.3 Discussion of inventive step

3.3.1 The Board concurs with the respondent, according to which the skilled person would apply his common general technical knowledge in the field of mechanical engineering in order to fill the above identified gap in the teaching of E1.

The skilled person would immediately recognise that to mechanically couple the retaining structure with the coupling element there are only three possibilities:

either the retaining structure holds the coupling element in place, or vice versa,
or these two elements mutually lock each other's position.

The Board notes that no particular advantage of the claimed solution, based on the distinguishing features, over the other two possible solutions mentioned above is either mentioned in the description of the patent in suit or immediately derivable by the skilled person.

Such an effect has also not been brought forward by the appellant.

To arrive at the subject-matter of claim 1 of the main request the person skilled in the art has therefore, as argued by the respondent, only to select one of these three self-evident possibilities.

This would be done without the need of any inventive activity.

3.3.2 The appellant argued that the skilled person could conceive other possible configurations of the coupling provision mentioned in E1. Inventive step should be acknowledged because while he possibly could use a solution as suggested by the present alleged invention, the prior art provides no compelling reason why he would do so.

The Board disagrees. The problem solution approach, as it has been developed and constantly applied in the case law of the Boards of Appeal does not exclude that there can be a plurality of obvious solutions to the same problem.

As a consequence of that, even if the distinguishing features were to represent only one of a plurality
(three) of obvious solutions to the problem formulated above, this would nevertheless still be obvious.

3.3.3 Consequently the subject-matter of claim 1 of the main request does not involve an inventive step (Article 56 EPC).

4. Auxiliary request 1 - inventive step

4.1 Distinguishing feature

E1 discloses (see figure 2 and the passage on page 6, lines 11-13 of E1) that the head structure (3) of E1, when coupled to the base structure (2), is solely supported by the coupling element (106). This is because element 35, which is visible in figure 2, is not a supporting element, but a lotion supply (see page 8, 3-6).

The additional features of claim 1 of the first auxiliary request over claim 1 of the main request are therefore known from the second embodiment of E1.

4.2 Lack of inventive step

Inventive step of the subject-matter of claim 1 of auxiliary request 1 should be discussed on the basis of the same distinguishing features already identified in relation to the main request.

As a consequence of that, no inventive step can be acknowledged, for the same reasons already discussed in relation to the main request.
5. **Auxiliary request 2 - admissibility**

The respondent requested not to take auxiliary request 2 into consideration, as it was directed towards subject-matter which was not decided upon in the appealed decision. The examination of subject-matter which was not decided upon during opposition proceedings went beyond the purpose of the inter partes appeal procedure, which was to conduct a final review of the decision given at the previous instance and thereby provide the losing party with an opportunity to challenge the decision against it and obtain a judicial ruling on whether it is correct.

The Board disagrees. The appeal procedure does primarily, but not exclusively serve the parties' right to a judicial review of decisions taken by the EPO departments (G 9/91 and G 10/91, OJ 1993, 408, 420).

It is settled case law (supra, IV.E.4.1.4) that an appellant-patent proprietor who has lost before the opposition division can file new requests at a timely stage of the appeal proceedings, in particular together with the statement setting out the grounds of appeal, whereby the admission of these requests depends on the Board's discretion under Article 12(4) RPBA, and it is not excluded by general principles of law.

The respondent then argued that, in application of Article 12(4) RPBA, no consideration had to be given to auxiliary request 2, as it should have been presented already in the opposition proceedings.

According to Article 12(4) RPBA, the Board has a discretion not to admit auxiliary auxiliary request 2
if the appellant was in a position to submit this request earlier, and if he could have been expected to do so under the circumstances of the present case.

The Board notes that it is not apparent why auxiliary request 2 could not be seen as filed in response to the appealed decision (and to the discussion during the oral proceedings before the opposition division), in which case no room for discretion would arise.

The respondent did not submit specific and convincing arguments as to why under the particular circumstances of the case auxiliary request 2 could and should have been submitted earlier.

Therefore, in the present case, the Board decides not to exercise its discretionary power under Article 12(4) RPBA not to admit auxiliary request 2, as it considered that the discussion of this request would not deviate essentially from the discussion of the previous requests and from the discussion during opposition proceedings.

Hence, auxiliary request request 2 is to be considered in appeal proceedings.

6. Auxiliary request 2, claim 1 - inventive step

6.1 Distinguishing features

El discloses (see figure 5) that the coupling element ((106)) is a shaft like element protruding from the central area of the head structure (3).

El fails to disclose that this element comprises at its distal end (the lowermost end shown in figure 5) a
sloped surface facing the head support structure and
that the retaining structure comprises:
- a retaining recess for receiving the coupling element;
and
- a spring element at least partly provided in the
  retaining recess, the spring element being arranged for
  engaging the sloped surface of the coupling element
  such that the coupling element is retainable in the
  retaining recess.

6.2 Effect- Problem to be solved

These additional distinguishing features clearly
contribute to the solution of the already formulated
problem (see point 3.2 above) of designing the
releasable coupling between the holder base and the
shaver body mentioned in E1.

6.3 Discussion of inventive step

The respondent argued that the subject-matter of claim
1 of auxiliary request 2 was, starting from E1, not to
be considered as inventive, because all the
distinguishing features were disclosed in figure 1 of
E3 and figure 1 of E5.

The Board acknowledges that at least figure 1 of E3
shows a coupling element (19), comprising at its distal
end a sloped surface (the lowermost inclined surface of
element 19a) facing the head support structure and a
retaining structure comprising a spring element (16)
arranged for engaging the sloped surface of the
coupling element such that the coupling element is
retainable in the retaining recess.
However, even assuming that all the distinguishing features of the subject-matter of claim 1 of auxiliary request 2 could be derived from E3 and/or E5, as the respondent argued, the skilled person would not have applied the coupling elements and the retaining structures shown in these documents to the shaver of E1.

This is because the skilled person, starting from E1, is looking for a way to design a releasable coupling between the holder base and the shaver body in a shaver where the head structure, when coupled to the base structure, is not supported in the area of its outer circumference.

To select the coupling element and the retaining structure of E3 or of E5 and to apply it to the shaver of E1 clearly goes beyond what the skilled person would have objectively done, because E3, and E5 all teach coupling elements and retaining structures specifically designed for head structures which are supported all around their outer circumferences.

The same reasoning applies when the teaching of E4 is taken into consideration, because E4, see figure 1 thereof, also relates to a shaver having a head structure which is not supported centrally, but all around its periphery.

As a consequence of that, the Board decides that the subject-matter of claim 1 of auxiliary request 2 involves an inventive step.

6.4 Since the respondent, having been asked by the Chairman at the oral proceedings, did not raise any objection to the claimed subject-matter other than the one under
Article 56 EPC as discussed in the preceding points, nor did the respondent object to the adapted description as filed by the appellant during the oral proceedings, the patent can be maintained on the basis of auxiliary request 2 and the adapted description.

**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 with the order to maintain the patent in amended form on the basis of the following documents:

   **claims**
   1 to 8 filed as auxiliary request 2 with letter of 1 December 2014

   **description**
   pages 2 and 3 and two additional pages for par. [0008] and insertion between par. [0010] and [0011] filed during the oral proceedings
   pages 4 to 5 of the patent specification

   **figures**
   1 to 5B of the patent specification.
The Registrar:  G. Nachtigall

The Chairman:  I. Beckedorf

Decision electronically authenticated