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Datasheet for the decision of 18 February 2008

Case Number: T 0719/05 - 3.2.07

Application Number: 98101305.5

Publication Number: 0855232

IPC: B07B 1/00

Language of the proceedings: EN

Title of invention:
Process for classifying particulate hydrophilic polymer and sieving device

Patentee:
NIPPON SHOKUBAI CO., LTD.

Opponent:
BASF Aktiengesellschaft

Headword:
-

Relevant legal provisions:
EPC Art. 100(a),(b),(c); 54, 56
RPBA Art. 12

Relevant legal provisions (EPC 1973):
-

Keyword:
"Extension beyond content of application as filed - main request (yes)"
"Sufficiency of disclosure - all requests (yes)"
"Admittance of document - yes"
"Novelty - all requests (yes)"
"Inventive step - all requests (no) formulation of problem; obviousness"

Decisions cited:

Catchword:
-

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Beschwerdekammern | Boards of Appeal | Chambres de recours

Case Number: T 0719/05 - 3.2.07

D E C I S I O N
of the Technical Board of Appeal 3.2.07
of 18 February 2008

Appellant: (Opponent)	BASF Aktiengesellschaft D-67056 Ludwigshafen (DE)
Representative:	Thalhammer, Wolfgang Reitstötter, Kinzebach & Partner Sternwartstrasse 4 D-81679 München (DE)
Respondent: (Patent Proprietor)	NIPPON SHOKUBAI CO., LTD. 1-1, Koraibashi 4-chome Chuo-ku Osaka-shi Osaka-fu 541 (JP)
Representative:	Henkel, Feiler & Hänzel Patentanwälte Maximiliansplatz 21 D-80333 München (DE)
Decision under appeal:	**Decision of the Opposition Division of the European Patent Office posted 27 April 2005 rejecting the opposition filed against European patent No. 0855232 pursuant to Article 102(2) EPC.**

Composition of the Board:

Chairman: H. Meinders
Members: H.-P. Felgenhauer
I. Beckedorf

Summary of Facts and Submissions

I. This appeal is against the decision of the opposition division rejecting the opposition against European patent No. 0 855 232.

II. The appellant (opponent) requested that the decision under appeal be set aside and the patent be revoked.

III. The respondent (patent proprietor) requested the appeal to be dismissed and the patent to be maintained with claims 1 to 5 as granted (main request) or according to claims 1 to 5, 1 to 3, 1 and 2, and claim 1 according to the third to sixth auxiliary request, respectively, filed with letter dated 18 January 2008.

The first and second auxiliary request filed with that letter were withdrawn in the oral proceedings held before the board on 18 February 2008.

It further requested that D4 (see below) not be admitted.

IV. Claim 1 of the patent in suit according to the main request (claims as granted) reads as follows:

"1. A process for classifying a dried particulate water-absorbent resin, comprising the step of classifying a dried particulate water-absorbent resin in dry particle size with a sieving device, wherein said sieving device is used in a heated and/or thermally insulated state."

Claim 1 according to the third auxiliary request reads as follows:

"1. A process for classifying a dried and pulverized water-absorbent resin, comprising the step of classifying a dried and pulverized water-absorbent resin, in dry particle size with a sieving device, wherein said sieving device comprises a heating means and/or a thermally insulating means and is used in a heated and/or thermally insulated state."

Claim 1 according to the fourth auxiliary request reads as follows:

"1. A process for classifying a dried and pulverized water-absorbent resin in a production process thereof, comprising the step of classifying a dried and pulverized water-absorbent resin, said water-absorbent resin powder having a temperature between 40 and 100°C, in dry particle size with a sieving device, wherein said sieving device comprises a heating means and/or a thermally insulating means and is used in a heated and/or thermally insulated state in a temperature range of 30 to 100°C."

Claim 1 according to the fifth auxiliary request reads as follows:

"1. A process for classifying a dried and pulverized water-absorbent resin in a production process thereof, comprising the step of classifying a dried and pulverized water-absorbent resin, said water-absorbent resin powder having a temperature between 40 and 100°C, in dry particle size with a sieving

device, wherein said sieving device comprises a heating means and/or a thermally insulating means and is used in a heated and/or thermally insulated state in a temperature range of 30 to 100°C, and wherein said sieving device is used at or above a temperature that is lower than a temperature of said water-absorbent resin powder by 20°C.

Claim 1 according to the sixth auxiliary request reads as follows:

"1. A process for classifying a dried and pulverized water-absorbent resin in a production process thereof, comprising the step of classifying a dried and pulverized water-absorbent resin, said water-absorbent resin powder having a temperature between 40 and 100°C, in dry particle size with a sieving device, wherein said sieving device comprises a heating means and/or a thermally insulating means and is used in a heated and/or thermally insulated state in a temperature range of 30 to 100°C, wherein said sieving device is used at or above a temperature that is lower than a temperature of said water-absorbent resin powder by 20°C, and wherein said sieving device has a screen mesh face with a sieve mesh of between 45 and 300 μm."

V. The following prior art, already discussed in the decision under appeal, has been considered in the appeal proceedings

D1: EP-A-0 480 031

D3: WO-A-91 18031

Furthermore

D4: edana, Recommended Test Method: Superabsorbent material - Polyacrylate superabsorbent powders - PARTICLE SIZE DISTRIBUTION - SIEVE FRACTIONATION, published 2002 and

D5: Ullmanns Enzyklopädie der technischen Chemie, 4., neubearbeitete und erweiterte Auflage 1972, Band 2, Seiten 482, 483

submitted with the grounds of appeal have been admitted.

VI. According to the impugned decision the grounds of opposition according to Articles 100(c) and 100(b) EPC do not prejudice maintenance of the European patent as granted, of which the claimed subject-matter moreover, has been considered as being novel and as involving an inventive step in view of D1 and D3.

The features distinguishing the process according to claim 1 from the one according to D1 or D3, namely that "said sieving device is used in a heated and/or thermally insulated state", have been considered as having the effect of avoiding, within the dried particulate to be classified, the build up of condensed water due to remnant water and as leading to a process involving inventive step.

VII. The facts, evidence and arguments essentially relied upon by the appellant may, as far as they are relevant to the present decision, be summarised as follows:

(a) Claim 1 as granted extends beyond the content of the application as originally filed since the reference to "a dried particulate water-absorbent resin" in this claim refers to a resin in a form and condition not disclosed in the application as filed, in which a "particulate hydrophilic polymer" exemplified with "dried and pulverized products of water-soluble polymers and those of water-absorbent resins" is referred to. Consequently reference to dried particulate material in the claim instead of dried pulverized material, both materials not necessarily being alike in form, extends beyond the content of the application as filed.

(b) The patent in suit does not disclose the invention in a manner sufficiently clear and complete for it to be carried out by a person skilled in the art since, considering that it is inherent to every sieve (due to its material properties) that it is thermally insulating, it cannot be determined with certitude whether or not a particular process for classifying lies within the scope of claim 1 according to the third auxiliary request or not. Further, with the present wording **any** kind of thermal insulation would suffice to achieve the claimed effects; this is hardly imaginable.

(c) The process for classifying of claim 1 according to the third auxiliary request lacks novelty in view of the process disclosed in D1, given that in that process the sieving device is used under normal conditions, i.e. in an environment in which the sieving device is surrounded by air, which itself, depending on temperature conditions (in any case

not further defined in the claim), acts as a thermal insulation. For corresponding reasons claim 1 according to the third auxiliary request lacks novelty with respect to the process for classifying as referred to in D3.

(d) The process for classifying of claim 1 according to the third auxiliary request does not involve an inventive step for basically three reasons.

According to the first reason it is known from D4 to classify pulverized water-absorbent resin under certain conditions with respect to moisture for which the problem underlying the patent in suit does not occur. Consequently for such resins the measures according to claim 1 (being directed to the provision of heating means and/or thermally insulating means and the use of the sieving device in a heated and/or thermally insulated state) do not form part of the solution. Consequently these features need not be considered in the evaluation of inventive step. The remaining solution according to claim 1 is apparently obvious in view of the prior art according to D1.

According to the second reason it is, e.g. considering the conditions for the formation of dew given in D5 (page 482, table 6.), not credible that the features of claim 1, according to which the sieving device is used in a heated and/or thermally insulated state, have - under all conditions to be considered in connection with this claim 1 - the effect of avoiding adhesion of the resin particles to the sieving device which is

attributed to them. For this reason these features cannot be considered in evaluating inventive step.

According to the third reason application of the problem solution approach with D1 as closest prior art leads to the solution according to claim 1 being obvious.

(e) The additional features according to claims 1 according to the fourth to sixth auxiliary request come, depending on the normal circumstances resulting from the production process of the dried and pulverized water-absorbent resin, like the temperature and the remaining water content of the resin, within regular design practice.

(f) D4 should be admitted since it is a relevant document, as it shows that pulverized water-absorbent resin particles can be classified without particles adhering to the sieving device.

VIII. The facts, evidence and arguments essentially relied upon by the respondent may, as far as they are relevant to the present decision, be summarised as follows:

(a) Claim 1 as granted does not extend beyond the content of the application as filed since the reference to "a dried particulate water-absorbent resin in dry particle size" in this claim refers to a resin which in this form and condition is disclosed in the application as filed.

(b) The patent in suit discloses the invention as defined in claim 1 according to the third auxiliary request in a manner sufficiently clear and complete for it to be carried out by a person skilled in the art. In this respect not only the combination of features of this claim needs to be taken into account but in addition the entire teaching of the patent. It is apparent that using these sources of information the person skilled in the art can carry out the process as defined in claim 1 according to the third auxiliary request.

(c) The process for classifying of claim 1 according to the third auxiliary request needs to be considered as being novel considering the subject-matter of claim 1 and taking into account that in order to be novelty destroying all features of a claim need to be directly and unambiguously derivable from a prior art document. D1 does not contain such a disclosure with respect to the feature defining that the sieving device is used in a heated and/or thermally insulated state. This applies correspondingly with respect to D3.

(d) The process for classifying of claim 1 according to the third auxiliary request involves an inventive step since it sufficiently defines a solution to the problem underlying the patent in suit according to which cohesion of the dried and pulverized water-absorbent resin particles is to be avoided. All features of this claim need to be considered in the assessment of inventive step. Furthermore, applying the problem solution approach with D1 as closest prior art, no indication is given in the

prior art leading to the sieving device being used in a heated and/or thermally insulated state. This applies even more considering the additional features of claims 1 according to the fourth to sixth auxiliary request defining a temperature range for the sieving device and - in the case of the sixth auxiliary request - also the mesh size of the sieving device.

(e) D4 should not be admitted, as it relates to the classification of resin in dry particle size under test conditions such that it is not relevant for the subject-matter of claim 1 according to all requests.

Reasons for the decision

1. *Admissibility of D4*

The respondent objected to document D4 being admitted into the appeal proceedings.

An argument with respect to lack of inventive step based on D4 has been filed with the grounds of appeal (cf. page 7, first and second paragraphs from the bottom; page 8) and forms thus part of the basis of the proceedings according to Article 12 RPBA (OJ EPO 2007, 536 - 547).

According to this argument it can be derived from D4 that not all types of dried particulate water-absorbent resin have a tendency to cohesion. For such resins the problem underlying the patent in suit, namely "to

provide a process for classifying a dried particulate water-absorbent resin wherein cohesion of the dried particulate water-absorbent resin can be avoided" (page 2, lines 45, 46), which, in a broader form, namely "how to improve the working of a sieving device in a dry particulate water-absorbent resin classifying process", underlies the reasoning of the impugned decision with respect to inventive step (reasons, no. 5.), does not exist. Consequently for such resins it is not necessary to provide measures so that cohesion of particulate resin is avoided. Thus, according to the appellant, the problem underlying the patent in suit is not necessarily solved for any type of dried particulate water-absorbent resin. This has the consequence that to the extent in which the features of claim 1 do not contribute to the problem being solved they cannot be considered in the assessment of inventive step.

The Board follows the argument of the appellant that this line of argumentation with respect to inventive step, making use of document D4, has been made in response to the reasons of the impugned decision and that document D4, forming the factual basis of this argument, has to be considered as being relevant. Since this argument and D4 have been introduced at the earliest moment in time, namely with the grounds of appeal, both have to be admitted into the proceedings.

The admission of D5 relating to the formation of dew and thus to general technical knowledge has not been disputed.

2. *Ground of opposition according to Article 100(c) EPC*

According to the appellant the definition of the resin to be classified according to claim 1 as granted (main request) as "a dried particulate water-absorbent resin" extends beyond the content of the application as originally filed since in the application as filed such a resin is not disclosed. According to the respondent classification of such a resin is evident considering the statement of the application as filed according to which "The particulate hydrophilic polymer in the present invention is exemplified with dried and pulverized products of water-soluble polymers and those of water-absorbent resins." (page 4, lines 6 - 9) as well as the one according to which "a process for classifying a particulate hydrophilic polymer, according to the present invention, compris(es) the step of classifying a particulate hydrophilic polymer in dry particle size with a sieving device..." (cf. page 3, lines 16 - 22; claims 1, 2).

The Board, following the opinion expressed by the appellant, considers the disclosure of the application as filed to be limited with respect to dried water-absorbent resins to those which have been pulverized (cf. page 4, lines 6 - 9; page 5, lines 12 - 14 and page 13, lines 2 - 7), such that dried resin as defined by the expression "dried particulate water-absorbent resin" of claim 1 is not directly and unambiguously disclosed. It can neither be derived from the expression "in dry particle size", since this not necessarily only relates to the water-absorbent resins to which the sieving process is applied. It can also relate to the result of the sieving process, i.e. the

water-absorbent resin is dried via the sieving process. The characterization of the resin as defined in claim 1 as granted thus extends beyond the content of the application as filed, in that it encompasses dried resin in a form other than the one limited by the term "pulverized" (cf. page 5, lines 12 - 19 which states that the particles can have an arbitrary shape like spherical, cubic, columnar, plate, scale etc., which are all shapes that cannot be obtained by a pulverizer).

3. *Amended claims*

In view of the conclusion of the Board that the ground of opposition according to Article 100(c) EPC applies with respect to claim 1 as granted and the fact that claims 1 according to the first and second auxiliary request likewise comprise the expression objected to with respect to claim 1 according to the main request, the respondent withdrew the sets of claims according to the first and second auxiliary request.

Within claims 1 according to the third to sixth auxiliary request the expression objected to has been replaced by a reference to "a dried and pulverized water-absorbent resin". The appellant did not object to the amendments of claims 1 according to the third to sixth auxiliary request in respect of the requirements of Articles 84 and 123(2) and (3) EPC. The Board has convinced itself that these requirements are fulfilled; in view of the conclusion of the Board that the subject-matters of these claims do not involve an inventive step, this aspect needs no further discussion in this decision.

4. *Ground of opposition according to Article 100(b) EPC*

The appellant maintained its objection that the patent in suit does not disclose the invention in a manner sufficiently clear and complete for it to be carried out by a person skilled in the art, with respect to amended claim 1 according to the third auxiliary request.

Following the view expressed by the respondent the Board considers that the argument of the appellant with respect to sufficiency of disclosure, according to which it is an inherent property of every sieve that it is thermally insulating, and that consequently it cannot be determined with certitude whether or not a particular process for classifying lies within the scope of claim 1, concerns a requirement of Article 84 EPC rather than the ground of opposition according to Article 100(b) EPC. In any case, the Board, considering that the disclosure of the entire patent in suit and not only that of claim 1 needs to be considered, concludes that the invention is disclosed sufficiently clear and complete, the description giving a number of examples of the sieving device being in a heated and/or insulated state.

5. *Novelty*

The appellant maintained its objection concerning lack of novelty in view of the process according to D1 or D3 with respect to claim 1 according to the third auxiliary request.

According to the appellant D1, and correspondingly D3, discloses a process for classifying a dried and pulverized water-absorbent resin in which, under the condition that the sieving device is used under normal circumstances, i.e. in an environment within which the sieving device is surrounded by air of a temperature such that it acts as a thermally insulating means, the sieving device is used in a thermally insulated state. Consequently according to the appellant the alternative of claim 1, in which a thermally insulating means is provided and the sieving device is used in a thermally insulated state, lacks novelty.

Since, as argued by the respondent, such environmental conditions cannot be considered as being directly and unambiguously disclosed in D1 the feature concerning the provision of a thermally insulating means cannot be considered as being derivable from D1. Thus it can be concluded that this alternative of claim 1 is novel (Article 54 EPC) in view of D1. Under these circumstances it does not need to be further examined whether or not a sieving device, in combination with the ambient air of the environment in which the sieving device is located, can be considered as involving the feature of claim 1, according to which "said sieving device comprises a ... thermally insulating means and is used in a ... thermally insulated state".

The above applies correspondingly with respect to D3 which is directed to water-absorbent resin particles subjected - under not further defined conditions - to classification by sieving (page 8, paragraph 4).

6. *Inventive step*

6.1 *Claim 1 according to the third auxiliary request*

The appellant maintained its objection concerning lack of inventive step with respect to claim 1 according to the third auxiliary request.

6.1.1 In its examination of whether or not the subject-matter of this claim involves an inventive step the Board follows, in line with the jurisprudence of the Boards of Appeal (cf. Case Law of the Boards of Appeal of the EPO, Fifth Edition December 2006, Chapter I.D.2.), the argumentation of the respondent and the third line of arguments of the appellant, the so called problem-solution approach.

6.1.2 It is uncontested that D1 constitutes the closest prior art.

D1 discloses in respect of the process according to claim 1 of this request a process for classifying a dried and pulverized water-absorbent resin (page 8, lines 29 - 31), comprising the step of classifying a dried and pulverized water-absorbent resin, in dry particle size with a sieving device (page 8, lines 33 - 36; figures 1 - 3).

The process according to claim 1 is thus distinguished from the one according to D1 in that the sieving device comprises a heating means and/or a thermally insulating means and is used in a heated and/or thermally insulated state.

The effect attributed to these distinguishing features lies in the avoidance of cohesion of pulverized resin particles which would be detrimental to the proper functioning of the sieve and thus the classification (cf. patent in suit, page 3, lines 54 - 56).

6.1.3 Based on this effect the problem underlying the invention as defined in claim 1 can be seen as being the one referred to in the patent in suit, namely to provide a process for classifying a dried pulverized water-absorbent resin wherein cohesion of the water-absorbent resin particles can be avoided (page 2, lines 45, 46).

This problem has its origin in the water-absorbent resin particles which are to be classified by sieving which, despite their qualification as being dried, still comprise a certain content of water since otherwise, as referred to in the first line of argumentation of the appellant, the stated problem would not exist. This presumption finds support in the recommended test method for the particle size distribution of superabsorbent powder material as referred to in D4 (cf. in particular the sections 4 - 6, 8 - 9 and the statistical results according to Annex A - Table A.1.) for which no problems due to cohesion of particles are reported.

6.1.4 In a comparable manner, as pointed out by the respondent, apparently the conditions for classification by sieving referred to in D1 are such that a problem caused by cohesion of resin particles during classification with a sieving device does not occur. Concerning the resin particles to be classified

these conditions require that the resin resulting from a production process is hot air dried and has a remaining water content of not more than 10% by weight (see D1, page 8, lines 29 - 31). This resin is pulverized and classified by sifting with a 20-mesh metallic net (page 8, lines 31, 32). Concerning the classification reference is also made to a heated mixture being sifted to obtain an absorbent resin powder as a 20-mesh pass (page 8, lines 33 - 36). That the heated resin particles are classified by sifting can be derived also from figures 1 - 3 in which the process of manufacturing classified water-absorbent resin is shown schematically. According to these figures and the corresponding description hydrated polymer is spread out in a hot air drier and dried therein to produce an absorbent resin having a water content of not more than 10% by weight. This still heated resin is pulverized and immediately thereafter the still heated resin is classified using a sieving device (page 8, lines 29 - 36).

6.1.5 Within D1 it is, with respect to the drier, indicated that its inner cylindrical wall needs to be maintained at a temperature within a certain range "to prevent agglomeration of cohesively united particles" (page 6, line 57 - page 7, line 4).

Thus according to D1 problems due to cohesion of particles are recognized, although with respect to the cylindrical wall of a drier.

6.1.6 The Board considers, contrary to the opinion expressed by the respondent, that - irrespective of the fact that the problem underlying the patent in suit is not

mentioned in D1 - this problem can also occur in case the conditions for sieving are not as favorable as they are for the examples of D1, namely that e.g. due to the water content and/or the temperature of the pulverized resin cohesion of resin particles occurs during classification.

The Board thus considers that the problem underlying the patent in suit as referred to above is one

(a) which in practice can occur not only in the drying stage of the method according to D1 as explicitly mentioned in this document, but also during the classification stage referred to in this same document and

(b) which the person skilled in the art will readily recognize as such when cohesion of resin occurs at the classification stage, by mere observation of the process and/or the result of the classification.

Compared to the problem as defined in the impugned decision (reasons, point 5) the problem to be considered in view of the teaching of D1 as outlined above is narrower than the one defined in this decision, but still one which is based on the effects of the distinguishing features and which does not comprise elements of the solution.

6.1.7 Having recognized the problem as indicated above in case cohesion of resin occurs (which, according to the first line of arguments of the appellant, need not happen in each process of classification of the kind

concerned), D1 clearly teaches the skilled person what needs to be done to prevent this from happening, namely to heat the part with which the resin comes into contact. In D1 this part is the inner wall of the cylindrical member of the drier (page 6, line 57 - page 7, line 4). It will be apparent that the same remedy will also solve the problem when the resin particles stick on to a different part, namely the sieving device, since the cause of the cohesion, namely the water content and the temperature of the resin and its effect, namely deposition on and adhesion to a surface, are alike.

Consequently the process for classifying according to the **first alternative of claim 1** of this request, according to which the sieving device comprises a heating means and is used in a heated state, does not involve an inventive step with respect to the measures referred to in D1 to avoid particle deposition and adhesion on the drier (page 7, lines 1 - 4).

6.1.8 For completeness sake it shall be outlined that this applies correspondingly with respect to the **second alternative of claim 1**, according to which the sieving device comprises a thermally insulating means and is used in a thermally insulated state.

As indicated by the appellant provision of insulating means alone leads only then to cohesion being avoided, if this insulating means can keep the resin in the heated state which it had prior to the classification. Without such a precondition provision of a thermal insulation alone cannot diminish the tendency of the

pulverized resin for cohesion and thus prevent this effect.

In case of cohesion posing a problem for the process of classification according to D1 it is obvious for the skilled person that, in case of the heated state being sufficient, retaining the temperature of the preheated resin will avoid the occurrence of cohesion. It is also obvious that this can be achieved by an appropriate thermal insulation of the sieving device.
It is likewise immediately apparent for the person skilled in the art that, in case the preheating of the resin is not sufficient or in case the resin is not preheated at all prior to classification, to avoid cohesion during the process of classification, a heating according to the first alternative of claim 1 as referred to above or a combined heating and thermal insulation according to the **third alternative of claim 1** would be required to avoid cohesion of the resin.

Thus neither the second nor the third alternative of claim 1 involves inventive step.

The process for classification according to claim 1 of the third auxiliary request, as a result, does not involve an inventive step in view of measures a skilled person would take in the manufacturing process of D1 when confronted with the problem of cohesion of the water-absorbent resin particles produced (Article 56 EPC).

6.1.9 The differing conclusion in the impugned decision (reasons, point 5) appears to be based on the erroneous

assumption that the feature qualifying the resin to be classified as "dried" contributes to inventive step.

In view of the result of the examination of inventive step based on applying the problem-solution approach the first and second line of arguments of the appellant with respect to inventive step need not be considered any further.

6.2 *Claims 1 according to the fourth to sixth auxiliary request*

6.2.1 According to the respondent the additional features of claims 1 according to the fourth to sixth auxiliary request relating to temperature ranges for the sieving device (fourth and fifth auxiliary request) and additionally to the mesh size of the sieving device (sixth auxiliary request) lead to, not further specified, unexpected bonus effects. Due to the lack of evidence concerning such unexpected effects the Board follows the opinion of the appellant according to which the temperature ranges and the mesh size according to these claims 1 are based on values which necessarily need to be selected and possibly adjusted according to circumstances, like the nature of the production process, the process for classification which forms part of the production process according to D1 and the nature and water content of the pulverized resin. Consequently the additional features of claims 1 according to the fourth to sixth auxiliary request come, as they depend on these circumstances, which in any case are not further defined in these claims, within the regular design practice of the skilled person and

thus do not lead to subject-matter involving inventive step.

6.2.2 Moreover, concerning the value ranges for the temperature of the sieving device as defined in these claims, these can naturally be lower than the temperature range given in D1 (50 - 200°C, see page 6, line 57 - page 7, line 4) for the inner cylindrical wall of the drier, because according to the process disclosed in D1 the temperature of the dried resin will be lower when it reaches the sieving device where it is classified. The temperature ranges defined in these claims 1 therefore cannot be considered as contributing to inventive step.

6.2.3 The above applies correspondingly to claim 1 according to the sixth auxiliary request, considering the argument of the respondent that the additional features of this claim, relating to the temperature of the sieving device and the mesh size of the sieve, lead in combination (in the sense of a synergistic effect) to the problem being solved.

The Board does not see such a combinatory effect. The reason is that, as indicated above, the determination of the temperature of the sieve comes within regular design practice if the skilled person takes account of the process circumstances. The mesh size, to the contrary, will be determined depending on different, independent criteria, namely the classification required.

In any case, the standard mesh size referred to in D1 (150 μm, see claim 10) falls in the range of values

defined in claim 1 according to the sixth auxiliary request for the sieve mesh (between 45 and 300 μm).

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:

G. Nachtigall H. Meinders