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Datasheet for the decision of 18 January 2023

Case Number: T 2037/19 - 3.3.03

Application Number: 10729769.9

Publication Number: 2449025

IPC: C08L23/08, C08F210/16,

C08F210/18, C08F10/00, C08F10/02, C08J5/18

Language of the proceedings: EN

Title of invention:

ETHYLENE-BASED POLYMER COMPOSITIONS

Patent Proprietor:

Dow Global Technologies LLC

Opponents:

Borealis AG

TotalEnergies One Tech Belgium

Relevant legal provisions:

RPBA Art. 12(4)

RPBA 2020 Art. 11, 12(2)

EPC Art. 123(2), 111(1)

Keyword:

Late-filed evidence - could have been filed in first instance proceedings (no) - admitted (yes)

Late-filed request - could have been filed in first instance proceedings (no) - admitted (yes)

Amendments - opposition proceedings - extension beyond the content of the application as filed (no)

Appeal decision - primary object of appeal proceedings to review decision - remittal to the department of first instance (yes)



Beschwerdekammern **Boards of Appeal** Chambres de recours

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Case Number: T 2037/19 - 3.3.03

DECISION of Technical Board of Appeal 3.3.03 of 18 January 2023

Appellant: Dow Global Technologies LLC

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Decision of the Opposition Division of the Decision under appeal:

> European Patent Office posted on 9 May 2019 revoking European patent No. 2449025 pursuant to

Article 101(3)(b) EPC.

Composition of the Board:

Chairman D. Semino Members: M. Barrère

R. Cramer

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Summary of Facts and Submissions

I. The appeal of the patent proprietor lies against the decision of the opposition division revoking the European Patent number 2 449 025. The decision was based on the claims as granted (main request of the patentee) and auxiliary request 1 filed with the reply to the notices of opposition.

- II. Claim 1 as granted read as follows:
 - "1. An ethylene-based polymer composition characterized by a Comonomer Distribution Constant greater than 45 and as high as 400, wherein the composition has less than 120 total unsaturation unit/1,000,000C."

Granted claim 13 was directed to a polymerization process for producing an ethylene-based polymer composition according to claim 1.

Claims 1 and 13 of auxiliary request 1 (as dealt with in the contested decision) differed from granted claims 1 and 13 only in that the ethylene-based polymer was a copolymer of ethylene and 1-octene.

III. The following documents were *inter alia* cited in the opposition division's decision:

D1: WO 2007/136506 A2 D5: WO 2007/136496 A2 D18: WO 2009/064404 A2 - 2 - T 2037/19

- IV. In that decision the opposition division held, among others, that:
 - The main request (patent as granted) complied with the requirements of Article 123(2) EPC and sufficiency of disclosure.
 - The subject-matter of granted claims 1 and 13 was novel over D1, D5 and D18.
 - However granted claim 13 did not involve an inventive step over D5 as the closest prior art. The same conclusion applied to claim 13 of auxiliary request 1.

Therefore the patent was revoked.

- V. The patent proprietor (appellant) filed an appeal against said decision. With the statement of grounds of appeal, the appellant filed two new sets of claims as main request and auxiliary request 1.
- VI. The following documents were filed by the parties during appeal proceedings:

D25: experimental report by Dr Rongjuan Cong, dated 13 September 2019

D26: declaration by Kalin Simeonov, dated 30 January 2020

D27: experimental report by Andreas Albrecht, dated 4 February 2020

D28: declaration by Andreas Albrecht, dated 4 February 2020

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D29: Andrew J. Peacock, Handbook of polyethylene: structures: properties, and applications, Marcel Dekker, Inc., 2000, page 519

D29a: imprint of D29

D30: Benedikt, George, Metallocene technology in commercial applications, William Andrew Inc., 1999

D31 and D31a: extract from the internet page https://www.lyondellbasell.com/en/news-events/products--technology-news/lyondellbasell-to-highlight-leadership-innovation-and-collaboration-at-its-chinaplas-2008-exhibit/

D25 was submitted by the appellant with the statement of grounds of appeal.

Opponent 1 filed D26-D31 and D31a with the rejoinder to the statement of grounds of appeal and D29a with letter of 24 February 2021.

- VII. The parties were summoned to oral proceedings and a communication under Article 15(1) RPBA 2020 was then issued, containing the preliminary opinion of the Board for the issues relevant for the present case. In particular the Board indicated that it was minded to admit the new main request and auxiliary request 1 into the proceedings and to remit the case to the opposition division for further prosecution.
- VIII. With letter dated 15 November 2022, the appellant requested oral proceedings only if the Board did not issue a decision remitting the case to the opposition

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division for further consideration. The same request was filed by opponents 1 and 2 (respondents 1 and 2) with the letters dated 9 December 2022 and 5 January 2023.

- IX. Thereafter the oral proceedings were cancelled.
- X. The final requests of the parties were as follows:
 - (a) The appellant requested that the decision under appeal be set aside and the case be remitted to the opposition division for further prosecution on the basis of the main request or auxiliary request 1 both filed with the statement of grounds of appeal.
 - (b) The respondents requested that the appeal be dismissed. Should the main request or auxiliary request 1 of the appellant or D25 be admitted into the proceedings, respondent 1 requested remittal of the case to the opposition division.
- XI. Claim 1 of the main request was identical to claim 1 of auxiliary request 1 and differed from claim 1 of the earlier main request (the patent as granted) in that the Comonomer Distribution Constant was "greater than 95" (instead of "greater than 45"). Moreover, claim 13 was deleted in auxiliary request 1.
- XII. The appellant's submissions, in so far as they are pertinent to the present decision, may be derived from the reasons for the decision below. They were essentially as follows:
 - (a) Document D25 should be admitted into the proceedings.

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- (b) The main request and auxiliary request 1 should be admitted into the proceedings.
- (c) Documents D28 to D31 and D31a should not be admitted into the proceedings.
- (d) The findings of the opposition division under Article 123(2) EPC were correct.
- XIII. The respondents' submissions, in so far as they are pertinent to the present decision, may be derived from the reasons for the decision below. They were essentially as follows:
 - (a) Document D25 should not be admitted into the proceedings.
 - (b) The main request and auxiliary request 1 should not be admitted into the proceedings.
 - (c) Documents D28 to D31 and D31a should be admitted into the proceedings.
 - (d) The findings of the opposition division under Article 123(2) EPC were incorrect.

Reasons for the Decision

1. The parties have requested oral proceedings only if the Board does not issue a decision remitting the case to the opposition division for further consideration. As the Board's intention is to remit the case to the opposition division and the decision is based on grounds and evidence on which the parties had ample opportunity to present their comments, the decision can

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be taken in writing. In fact, the following conclusions were communicated to the parties well in advance of the date scheduled to hold oral proceedings (see Board's communication under Article 15(1) RPBA 2020). Considering that no counter-arguments were put forward in reaction to that communication, there is no reason for the Board to deviate from the views expressed therein.

- 2. Admittance of document D25
- 2.1 Document D25 was submitted by the appellant with the statement of grounds of appeal. Its admission to the proceedings, which is contested by respondent 1, is subject to the discretionary power of the Board in accordance with Article 12(4) RPBA 2007 which applies in view of the transitional provisions in Article 25(2) RPBA 2020.
- 2.2 According to the appellant D25 was filed:

as a reaction to the surprising decision of the opposition division (ignoring the Comonomer Distribution Constant (CDC) in its argumentation on inventive step), taking into account that the preliminary opinion of the opposition division was favourable to the appellant,

to provide the CDC of representative polymers of D5 (see statement of the grounds of appeal, page 5, first paragraph) and

to allow a comparison between process claim 13 and the prior art.

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2.3 The admittance of D25 is contested by respondent 1 for the following reasons (see rejoinder of respondent 1, page 5, section 4 in combination with page 3, second full paragraph):

D25 is not a true reproduction of example 1 of D5,

D25 does not constitute a direct response to the findings of lack of inventive step because the opposition division relied on the process of D5 and not on a modified process as set out in D25,

the decision based on D5 as the closest prior cannot be seen as surprising and

the appellant could have initiated the experimental evaluation of D5 earlier in the proceedings.

2.4 Under Article 12(4) RPBA 2007, the Board may hold inadmissible any evidence which could (and should) have been submitted in the first instance proceedings (see Case Law of the Boards of Appeal, 10th edition 2022, V.A.5.11.1). In the present case, the Board considers that there was no reason for the appellant to file D25 at an earlier stage for the following reasons:

Under point 6.1.2 of the contested decision, the opposition division came to the conclusion that the CDC parameter (as well as the unsaturation level) was not mentioned in D5 and could not be deduced therefrom (since the polymer preparation process in D5 was different from the process claimed in the opposed patent). The subject-matter of granted claim 1 was therefore considered to be novel over D5.

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However, in their assessment of inventive step of process claim 13 (see point 7.2 of the decision), the opposition division ignored the properties of the polymer (in particular the CDC parameter) and focused instead only on the process features of granted claim 13. Furthermore the opposition division did not explain why the polymer properties were left out although claim 13 was clearly limited by these properties (as claim 13 referred to claim 1). Moreover, such an assessment was not present in the preliminary opinion of the opposition division. The Board therefore recognises that the assessment of inventive step could have come as a surprise to the appellant.

The experimental study D25 was conducted by the appellant to provide evidence that the CDC parameter should not have been ignored by the opposition division. In view of the fact that the full assessment of inventive step (including the fact that the polymer properties were ignored) was only made available to the appellant with the decision, the Board does not consider that D25 could and should have been filed during opposition proceedings.

- 2.5 Under these circumstances, the Board does not find it appropriate to exercise its power under Article 12(4) RPBA 2007 to hold document D25 inadmissible.
- 2.6 As to whether or not the examples of D25 are a valid reproduction of example 1 of D5, the Board is of the opinion that this matter is not relevant to the issue of admittance under Article 12(4) RPBA 2007 but is to be dealt with once D25 is admitted into the proceedings.

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- 3. Admittance of the new requests (main request and auxiliary request 1)
- 3.1 The new requests were filed with the statement of grounds of appeal. Their admission to the proceedings, which is contested by the respondents, is also subject to the discretionary power of the Board in accordance with Article 12(4) RPBA 2007.
- 3.2 These requests were filed by the appellant in reaction to:

the unexpected findings of the opposition division with regard to inventive step (see statement of the grounds of appeal, pages 3-4, bridging paragraph and letter of 15 December 2020, page 1, penultimate paragraph) and

the experimental report D25 reporting CDC values of 75 to 80 for the prior art (see statement of the grounds of appeal, page 5, second full paragraph).

3.3 The admittance of the new requests is contested by the respondents for the following reasons (see rejoinder of respondent 1, page 2, paragraph 2 to page 4, paragraph 10; rejoinder of respondent 2, page 2):

the new requests bring an entirely fresh case before the Board,

admitting these requests would deprive the respondents of having the case reviewed by two instances,

the limitation of the CDC in the claims of the new requests raises new issues and

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the appellant could have filed these requests during opposition proceedings.

3.4 In that respect, the Board agrees with the appellant:

As mentioned previously, the experimental study D25 was conducted to show that the CDC parameter was a distinguishing feature between the granted claims and D5. However, the data reported by the appellant in good faith provide evidence of the contrary, namely that the CDC of example 1 of D5 was in fact around 75 to 80 and therefore within the range of granted claim 1 (see D25, table 2). Therefore on a prima facie basis, D25 appears to show that the CDC value did not constitute a distinguishing feature between the granted claims and D5.

The new requests of the appellant further limit the scope of the claims in view of the CDC parameter (now greater than 95). In view of the fact that document D25 was admitted into the proceedings, the filing of these requests is seen as a legitimate reaction to the new experimental evidence reporting CDC values of 75 to 80 for the closest prior art (which itself is a legitimate reaction to the decision).

Furthermore, the Board finds that there was no reason for the appellant to submit these new requests during opposition proceedings because there was no experimental evidence that the polymers of D5 were characterised by a CDC value in the range of 45 to 400.

3.5 The respondents take the view that the objection of lack of inventive step, as set out in the contested

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decision, had already been raised in writing during opposition proceedings.

The Board cannot agree with this for the following reasons:

It is acknowledged that D5 was contemplated as a possible document to be used as the closest prior art in the notices of opposition. However the objections raised initially by the opponents appear to be incomplete and based on the assumption that the CDC value was a distinguishing feature (see grounds of opposition of opponent 1, paragraphs 7.2 and 7.8 and grounds of opposition of opponent 2, paragraph 8.2.2).

In the letter of 8 February 2019, opponent 2 raised a further objection starting from D5 as the closest prior art (see page 6, paragraph 5.2). With regard to the distinguishing feature, opponent 2 merely stated that the patent proprietor held the multistage process to be the (only) distinguishing feature between granted claim 13 and D5. However, this allegation is not supported by the patentee's submissions.

Consequently, the written inventive step objections raised by the opponents in the opposition proceedings were not sufficiently clear and complete for the arguments to be fully understood by the patentee.

Therefore the written objections provided no reason for the appellant to submit evidence that the CDC parameter was a distinguishing feature between the granted claims and D5 and new requests which limited the range for that parameter.

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- 3.6 Under these circumstances, the Board does not find it appropriate to exercise its power under Article 12(4) RPBA 2007 to hold the new requests inadmissible.
- 3.7 While it is acknowledged that the new requests may represent a fresh case, this fact is not considered to be a decisive criterion for the question of admittance under Article 12(4) RPBA 2007.
- 4. Admittance of documents D28 to D31 and D31a
- 4.1 Documents D28 to D31 and D31a were filed by respondent 1 with its rejoinder to the statement of grounds of appeal. Their admission to the proceedings is also subject to the discretionary power of the Board in accordance with Article 12(4) RPBA 2007.
- The appellant contests the admission of D28 to D31 and D31a into the proceedings because these documents were late filed and no reason was given for their latefiling. The appellant further holds that these documents could have been submitted in front of the opposition division.
- 4.3 In that respect, the Board agrees with respondent 1 that these documents specifically address the new submissions of the appellant including the new feature introduced in the main request and auxiliary request 1 (see rejoinder of respondent 1, page 7, points 6 and 7). Consequently, in view of the fact that D25 and the new requests were admitted into the proceedings, the Board does not find it appropriate to exercise its power under Article 12(4) RPBA 2007 to hold documents D28 to D31 and D31a inadmissible.
- 5. Objections raised against the new requests

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- 5.1 Under point 6. below the Board addresses an objection which was raised during opposition proceedings, dealt with by the opposition division and maintained in appeal.
- 5.2 The remaining objections will be briefly addressed under point 7.3.
- 6. Findings of the opposition division under Article 123(2) EPC

Claim 13 of the main request was amended with respect to claim 13 as originally filed $inter\ alia$ by the insertion of a reference to the composition defined in any one of claims 1-6, 8 and 10-12. At the same time, the wording "especially where the reaction of step (B) occurs by graft polymerization" was deleted from the definition of the group R^D . These amendments were already present in claim 13 as granted and the opposition division held in the contested decision that they complied with the requirement of Article 123(2) EPC.

According to respondent 2, there is no support in the application as filed to link the process of claim 13 with any one of the embodiments disclosed in claims 1-6, 8 and 10-12 (see rejoinder, page 3, first paragraph). Furthermore, the deletion of the part "especially where the reaction of step (B) occurs by graft polymerization" would find no support in the application as filed.

In this regard the Board agrees with the opposition division and the appellant (see decision, point 3 of

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the reasons and letter of the appellant dated 15 December 2020, page 5, second paragraph).

It is clear from the whole content of the application as filed that the alleged invention relates to an ethylene-based polymer composition and a process for the preparation of said composition (see page 1, lines 14-16). This is further confirmed in the examples of the opposed patent showing that processes according to claim 13 lead to compositions according to claims 1-6, 8 and 10-12 (see examples 2 and 3).

With regard to the deletion of the feature "especially where the reaction of step (B) occurs by graft polymerization", the Board is of the opinion that said feature was optional and could not affect the scope of claim 13 as originally filed.

Consequently, the Board sees no reason to depart from the findings of the opposition division.

7. Remittal

- 7.1 The appellant and respondent 1 requested that the case be remitted to the opposition division for further consideration. Respondent 2 did not explicitly request a remittal but pointed out that admitting the new requests would deprive the respondents of the possibility of having the present case examined by two instances (see rejoinder of respondent 2, page 2, fifth paragraph).
- 7.2 According to Article 11 RPBA 2020 the Board shall not remit the case to the department whose decision was appealed for further prosecution, unless special reasons present themselves for doing so. In the

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explanatory notes to Article 11 RPBA 2020 (see Supplementary publication 1, OJ EPO 2020, Annex 2, page 215) it is indicated that the aim of the new provision is to reduce the likelihood of a "ping-pong" effect between the Boards and the departments of first instance, and a consequent undue prolongation of the entire proceedings before the EPO. However, it is also specified therein that whether "special reasons" present themselves is to be decided on a case-by-case basis.

- 7.3 In the present case, the Board notes that claim 1 of the main request and of auxiliary request 1 includes a further limitation of the CDC parameter (more than 95 instead of more than 45 in the granted claims). This limitation was not part of the granted claims and not discussed during opposition proceedings. Furthermore the objections under sufficiency of disclosure, novelty and inventive step raised by the respondents all relate specifically to the new limitation of the claims. For instance, although the opposition division already addressed the question of sufficiency in the decision, it is clear to the Board that the respondents' objections of lack of sufficiency focus on the new feature of the amended claims and the differences between examples 1 and 3, example 1 becoming a comparative example (see rejoinder of respondent 1, page 8, point 8 and rejoinder of respondent 2, page 3, point 4).
- 7.4 The Board acknowledges that remitting the case to the opposition division entails a certain extension of the period of legal uncertainty in relation to the validity of the patent. However, not remitting the case to the opposition division would require the Board to perform the assessment of all these objections as both first-

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and last-instance and to effectively replace the opposition division rather than review the contested decision. This would be contrary to the primary object of the appeal proceedings to review the decision under appeal in a judicial manner (Article 12(2) RPBA 2020).

7.5 In view of the above and after having considered the circumstances of the present case, including the explicit requests of the appellant and of respondent 1 for a remittal, and the implicit agreement of respondent 2 with such remittal expressed in the letter of 5 January 2023, the Board is of the opinion that special reasons within the meaning of Article 11 RPBA 2020 present themselves. Therefore the Board considers it appropriate to remit the case to the opposition division for further prosecution according to Article 111(1) EPC, in particular to deal with the objections of lack of sufficiency, novelty and inventive step.

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Order

For these reasons it is decided that:

- 1. The decision under appeal is set aside.
- 2. The case is remitted to the department of first instance for further prosecution.

The Registrar:

The Chairman:



D. Hampe D. Semino

Decision electronically authenticated