OPINION UNDER SECTION 74A

Patent	GB 2447281
Proprietor(s)	Susie Lind
Exclusive Licensee	
Requester	Susie Lind
Observer(s)	
Date Opinion issued	04 September 2014

The Request

- 1. The comptroller has been requested to issue an opinion as to whether Challs International are infringing GB 2447281 (the Patent) based on their "Bin Buddy" products.
- 2. No observations have been filed in relation to this request.
- 3. The Patent was granted on 29 May 2012 and remains in force.
- 4. The request was accompanied by a sample of a "Bin Buddy" product in the form of a 550 gram container of "Kitchen Bin Buddy Citrus" (illustrated below).



"Kitchen Bin Buddy Citrus."

¹ "Bin Buddy" is a registered trademark of Challs International Ltd.

Infringement

- 5. Section 60 Patents Act 1977 (the Act) governs what constitutes infringement of a patent; Section 60(1) relates to direct infringement and Section 60(2) relates to indirect infringement. These sections of the Act read as follows:
 - (1) Subject to the provisions of this section, a person infringes a patent for an invention if, but only if, while the patent is in force, he does any of the following things in the United Kingdom in relation to the invention without the consent of the proprietor of the patent, that is to say -
 - (a) where the invention is a product, he makes, disposes of, offers to dispose of, uses or imports the product or keeps it whether for disposal or otherwise:
 - (b) where the invention is a process, he uses the process or he offers it for use in the United Kingdom when he knows, or it is obvious to a reasonable person in the circumstances, that its use there without the consent of the proprietor would be an infringement of the patent;
 - (c) where the invention is a process, he disposes of, offers to dispose of, uses or imports any product obtained directly by means of that process or keeps any such product whether for disposal or otherwise.
 - (2) Subject to the following provisions of the section, a person (other than the proprietor of the patent) also infringes a patent for an invention if, while the patent is in force and without the consent of the proprietor, he supplies of offers to supply in the United Kingdom a person other than a licensee or other person entitled to work the invention with any of the means, relating to an essential element of the invention, for putting the invention into effect when he knows, or it is obvious to a reasonable person in the circumstances, that those means are suitable for putting, and are intended to put, the invention into effect in the United Kingdom.

The Patent

- 6. The Patent discloses a method of slowing or reducing the rotting process in food waste by covering the food waste with a dehydrating powder comprising a perfume and an anti-bacterial agent.
- 7. There are only two claims and they read as follows:
 - 1. A method of slowing or reducing the rotting process of human food waste by adding powder in alternating layers with human food waste so that the food waste is covered by the powder, wherein the powder comprises a perfume and an anti-bacterial agent, the powder also being a dehydrating powder.
 - 2. A method as claimed in claim 1 wherein the powder is sprinkled over the human food waste using a container with holes.
- 8. No argument has been put forward regarding how the claims should be construed and I shall do so according to established principles.
- 9. The claims must be construed purposively following the well known House of Lords

authority on claim construction *Kirin-Amgen v Hoechst Marion Roussel and others*². This requires that I interpret the claims in the light of the description and drawings, to decide what a person skilled in the art would have understood the patentee to have used the language of the claim to mean.

- 10. I consider that the claims are generally straightforward to construe but that I have to consider what a person skilled in the art would understand the terms *covered* and *dehydrating* to mean.
- 11. I believe the person skilled in art would be a specialist designer and formulator of household cleaning and related products.
- 12. Page 1 of the patent description sets out the "Background" which specifies:

"In order for food to rot ... oxygen, H2O and nitrogen need to be available. This invention interrupts the rotting process by making one or more of the necessary components unavailable or less available".

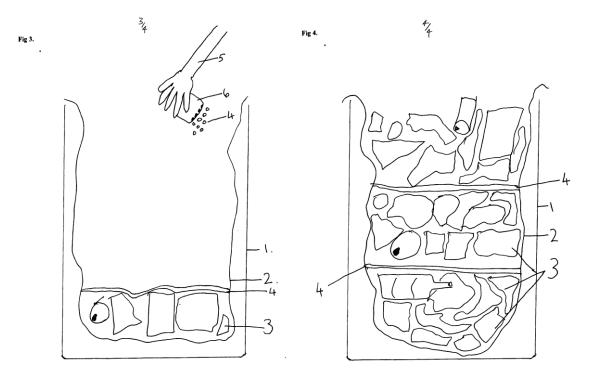
13. The description then sets out the "Essential Technical Features" of the invention which also states that air and water contribute to the rotting process and that:

"This invention blocks or reduces access to either of these [air or water] by covering the rotting foods with powder that includes the following properties-

- It is dehydrating, it absorbs water
- Antiseptic, i.e. it includes antibacterial properties, and
- Includes perfume to mask offensive smells."
- 14. In relation to the term *dehydrating*, I conclude that the skilled man would understand that this means the powder must be capable of absorbing or adsorbing a significant quantity of moisture from food waste in order to reduce the amount of water available to microbes and to thereby contribute to reducing the rotting process.
- 15. With regard to *covered*, whilst the description also refers to blocking access to air, and figures 3 and 4 (reproduced below) show a continuous thick layer between separate layers of waste which might act to block air, I do not consider that the skilled person would construe the term *covered* to mean completely covered in this way. The reference to the powder being sprinkled from a container with holes in claim 2 suggests that only a light covering is anticipated. Furthermore, I consider that the skilled person would consider it impractical to block access to air by covering the food waste with powder. Finally, the description specifies that the invention works by making one or more of air or water unavailable, and claim 1 is clearly directed to removing water. I therefore consider that the skilled person would understand that a relatively light covering sufficient for the powder to act effectively to reduce rotting would be within the scope of the term *covered*.

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² Kirin-Amgen v Hoechst Marion Roussel and others [2005] RPC 9.



Figures 3 & 4 from the Patent showing sprinkling of powder on waste (3) to form layers (4).

The Product

- 16. Although the request refers to "Bin Buddy" powder in general terms, I have formed my opinion on the basis of the particular product supplied, i.e. "Kitchen Bin Buddy Citrus" (the Product).
- 17. The Product is a powder (illustrated below) for sprinkling in bins to keep them fresh. It is marketed by Challs International and is available in the UK from various retailers, including supermarket chains, and is labelled as being made in the UK.



18. The Product packaging has only the following two statements regarding its composition:

"Contains d-LIMONENE and CITRAL."

"Contains less than 5% perfume, disinfectant."

19. Although these are the only ingredients listed on the packaging, an ingredient data sheet is available on the Challs International website³. This lists the ingredients in the following order:

Calcium carbonate

Ultrasil⁴ AS7

Parfum

Alcohol ethoxylate

D-limonene

Citral

Bronopol

20. I have used this additional information in forming my opinion.

Analysis

- 21. The claims are directed to a method or process and not to a product. Furthermore the method claimed is not for making or otherwise obtaining a product. Consequently Sections 60(1)(a) and 60(1)(c) of the Act are not relevant to this opinion.
- 22. Section 60(1)(b) of the Act is only relevant if the potential infringer uses the process or offers the process for use. There is no suggestion that Challs International are using the process nor that they are offering the process for use, and I consider that this section of the Act is also irrelevant for the purpose of this opinion.
- 23. Having established that Section 60(1) is not applicable in this instance I must therefore consider whether there has been indirect infringement by virtue of the provisions of Section 60(2).
- 24. Section 60(2) is only relevant if the potential infringer supplies any of the means, relating to an essential element of the invention, for putting the invention into effect. I therefore need to consider whether the "Bin Buddy" product constitutes such means.
- 25. What constitutes an essential element of the invention has been considered by the court in *Nestec SA v Dualit Ltd*⁵. In that decision it was stated that an essential

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³ http://www.challs.com/en/content/download/1119/4928/Kitchen-Bin-Buddy-IDS.pdf

⁴ Ultrasil is a registered trademark of Degussa AG / Evonik Degussa GmbH.

⁵ Nestec SA v Dualit Ltd [2013] RPC 32.

element must contribute to the implementation of the technical teaching of the invention and must not be of completely subordinate importance. I consider that the Product is clearly not of subordinate importance but I must determine whether or not it contributes to the implementation of the technical teaching of the invention. In order to do this I must compare the Product with the powder of claim 1 and determine whether or not it is a powder comprising a perfume and an anti-bacterial agent, the powder also being a dehydrating powder as required by claim 1.

- 26. Upon visual inspection of the sample of the Product provided I consider it is a powder for the purposes of the claims. The sizes of the particles are roughly equivalent to those of table salt but with a more rounded rather than crystalline shape. Although not as fine as talc or flour, the particles sizes are nevertheless considered sufficiently small that the term powder is an appropriate description.
- 27. D-limonene and Citral, both identified on the Product packaging, are noted for their citrus fragrance and are both used in perfumery. Citral is also known to possess strong anti-microbial qualities. I therefore consider that the Product comprises a perfume and an anti-bacterial agent. Bronopol, identified on the ingredient data sheet, is another anti-microbial agent.
- 28. I must also consider whether the Product is a dehydrating powder in the way I have construed this term. There is no information on the packaging to indicate that it has any dehydrating action and no evidence of such has been provided in the request.
- 29. I presume, based on appearance and the fact that it is listed as the first ingredient on the ingredient data sheet, that calcium carbonate is the major ingredient of the Product.
- 30. I have been unable to find any quantitative data which specifies the hygroscopicity or water sorption potential of calcium carbonate. This appears to be largely because it is very dependent on the size of the particles of calcium carbonate. The finer the calcium carbonate powder, the more surface area there is for the adsorption of water. Nevertheless calcium carbonate is not regarded as a desiccant⁶.
- 31. Looking at the other listed ingredients, Ultrasil AS7 is a sodium aluminium silicate used as a filler in the rubber industry⁷. It is not clear what purpose it performs in the Product. I am unable to find any data regarding its hygroscopicity or water sorption potential. I presume it is added to the Product in relatively small quantities. Alcohol ethoxylate is a surfactant which would improve the wettability of the powder.
- 32. I have made some observations of the Product supplied. In particular, although the powder becomes wet when it is sprinkled onto a damp surface where it is in contact with the water, I did not observe any significant sorption of water. Based on my observations I do not consider that the Product exhibits any significant sorption of water and it is not therefore a dehydrating powder as I have construed that term.
- 33. Although I consider that the Product does not exhibit any dehydrating action, I nevertheless note that page 2 of the patent description refers to the powder of the invention as "containing a water absorbing powder such as ground chalk". As noted above calcium carbonate powder, commonly referred to as chalk, has variable

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⁶ http://en.wikipedia.org/wiki/List_of_desiccants

⁷ http://ultrasil.evonik.com/product/ultrasil/en/products/conventional-silicate/pages/default.aspx

hygroscopicity based on, amongst other things, its particle size. Just because the Product comprises chalk does not mean that it meets the dehydrating requirement of claim 1 as I have construed it. It must act to reduce the moisture content of food waste and this action has not been shown in the Product. If calcium carbonate is to absorb sufficient water then presumably it must be in the form of a much finer powder. Furthermore, the reference to ground chalk in this instance may be considered to be a reference to either *gym or climbing* chalk (magnesium carbonate), well known as a drying agent for drying hands, or blackboard chalk (calcium sulphate), which is known as a dessicant.

- 34. I also note that the requester has not provided any argument or evidence in the request regarding how the Product is dehydrating.
- 35. As the Product does not appear to exhibit the necessary dehydrating action, nor has any evidence of such been made available in the request, I have no basis to conclude that it is a dehydrating powder as required by claim 1. As such it does not contribute to the implementation of the technical teaching of the invention and it is not means, relating to an essential element of the invention, for putting the invention into effect for the purposes of Section 60(2).

Opinion

36. On the basis of my observations and the information available to me, including the composition of the product according to the published information referred to above, I consider that Challs International "Kitchen Bin Buddy Citrus" does not comprise a dehydrating powder as required by claim 1 and it is not therefore an essential element of the invention. Accordingly it is my opinion that any acts in relation to the "Kitchen Bin Buddy Citrus" do not constitute infringement of GB 2447281.

Application for review

37. Under section 74B and rule 98, the proprietor may, within three months of the date of issue of this opinion, apply to the comptroller for a review of the opinion.

Matthew Jefferson Examiner		
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NOTE

This opinion is not based on the outcome of fully litigated proceedings. Rather, it is based on whatever material the persons requesting the opinion and filing observations have chosen to put before the Office.