

BETWEEN:

CALIDAD PTY LTD
ACN 002 758 312 First Appellant

CALIDAD HOLDINGS PTY LTD
ACN 002 105 562 Second Appellant

CALIDAD DISTRIBUTORS PTY LTD
ACN 060 504 234 Third Appellant

BUSHTA TRUST REG
Fourth Appellant

- and -

SEIKO EPSON CORPORATION
First Respondent

EPSON AUSTRALIA PTY LTD
ACN 002 625 783 Second Respondent



APPELLANTS' SUBMISSIONS

Part I: Suitable for publication

1. This submission is in a form suitable for publication on the internet.

20

Part II: Issues presented by the appeal

2. Stated generally, the issue presented by this appeal is whether, and if so, the extent to which, a patentee can control or limit what may be done with a patented product after it has been sold by or with the licence of the patentee.
3. More particularly, the appeal presents the following issues for consideration:
 - (a) Are the exclusive rights of a patentee under s 13 of the *Patents Act 1990* (Cth) (the Act) to “*exploit the invention*” and to authorise persons to do so, exhausted at the point of first sale of a patented product, or does a purchaser of the product acquire an implied licence or other right to use the product subject to any conditions imposed by the patentee at the time of sale?

Date of document: 3 January 2020

Filed on behalf of the Appellants by:

GILBERT + TOBIN

L35, Tower Two, International Towers Sydney
200 Barangaroo Avenue
BARANGAROO NSW 2000

T +61 2 9263 4013
F +61 2 9263 4111
Ref: Michael Williams

- (b) To what extent can a patentee, by reason of the grant of rights in s 13 of the Act, prevent a person who has acquired title to a patented product from modifying that product or using, importing or selling the modified product?
- (c) In considering that question, is it appropriate to direct attention to whether the modifications involve changes to features of the product that embody the invention as claimed, considered as a matter of substance, as opposed to other features that do not form part of the invention as claimed?
- (d) If a patentee establishes that there has been an infringement of its rights in this context, what is the appropriate form of any injunctive relief?

10 **Part III: *Judiciary Act 1903* (Cth)**

- 4. The appellants (together, **Calidad**) have considered whether notice should be given under s 78B of the *Judiciary Act 1903* (Cth). In their view, no notice is required.

Part IV: Citations

- 5. The principal reasons of the primary judge (Burley J) are published as *Seiko Epson Corp v Calidad Pty Ltd* (2017) 133 IPR 1; [2017] FCA 1403 (**PJ1**). His Honour's supplementary reasons dealing with declaratory relief and costs are published as *Seiko Epson Corp v Calidad Pty Ltd* [2018] FCA 104 (**PJ2**).
 - 6. The principal reasons of the Full Court (Greenwood, Jagot and Yates JJ) are published as *Calidad Pty Ltd v Seiko Epson Corp* (2019) 370 ALR 563; (2019) 142 IPR 381; [2019] FCAFC 115 (**FCJ1**). The Court's supplementary reasons dealing with relief are published as *Calidad Pty Ltd v Seiko Epson Corp (No 2)* [2019] FCAFC 168 (**FCJ2**).
- 20

Part V: Relevant facts

- 7. Calidad participates in the “*aftermarket*” for printer consumables by importing and selling used, original printer cartridges, first sold by Original Equipment Manufacturers, which have been refilled with ink and restored to working condition. The used cartridges are acquired by a third party, Ninestar, who (with the assistance of another third party, Apex) performs ink refilling and associated work to enable the cartridges to be reused instead of being discarded. Calidad acquires the refilled and restored cartridges from Ninestar, imports them into Australia and sells them.¹

¹ PJ1 [64], [67], [75] (CAB 31-32, 35).

8. The respondents (together, **Seiko**) supply original printer cartridges under the brand name Epson, compatible with printers also supplied under that name. The second respondent is the patentee of Australian Patent Nos 2009233643 and 2013219239 (the **Patents**). Seiko alleged that Calidad had infringed the Patents by importing and selling a range of used Epson printer cartridges which had been refilled with ink and restored to working condition in the manner described above. The original Epson printer cartridges had been sold by, or with the licence of, the patentee without any restriction at the time of sale as to the use to which they could be put.²

The Patents

- 10 9. Printer cartridges existed before the priority date of each of the Patents. The Patents disclose that it was common practice to equip such cartridges with a memory for storing information relating to the ink, together with a higher voltage device such as a circuit used to detect the ink level remaining in the cartridge. The Patents also disclose that a printer cartridge and the printer with which it was to be used could be electrically connected through terminals but that, in such arrangements, there was a risk that shorting could occur between the terminals for the memory and the higher voltage device, for example if a drop of ink was deposited on the terminals. The Patents propose a solution to this problem involving a particular layout of the electrical terminals on the cartridge so as to reduce the risk of shorting.³
- 20 10. As the Courts did below, it is sufficient to focus on claim 1 of Australian Patent No 2009233643 (the **643 Patent**), which is as follows (with integer numbers added):⁴

[1] *A printing material container adapted to be attached to a printing apparatus by being inserted in an insertion direction, the printing apparatus having a print head and a plurality of apparatus-side terminals, the printing material container including:*

[2] *a memory driven by a memory driving voltage;*

[3] *an electronic device driven by a higher voltage than the memory driving voltage;*

[4] *a plurality of terminals including a plurality of memory terminals electrically connected to the memory, and a first electronic device terminal and a second*

² PJ1 [3]-[4], [46], [134] (CAB 15-16, 25, 51).

³ PJ1 [182]-[188], [194]-[199] (CAB 62-63, 65-66); FCJ1 [120]-[124], [214] (CAB 209-211, 243); 643 Patent, [0002]-[0003] (AFM 8); see further, eg 643 Patent [0004], [0006A] and Fig 3C (AFM 8, 14, 72).

⁴ PJ1 [200] (CAB 67); FCJ1 [26], [125], [212] (CAB 179-180, 211-212, 242-243); 643 Patent, p 54 (AFM 61).

electronic device terminal electrically connected to the electronic device, wherein:

[5] *the plurality of terminals each include a contact portion for contacting a corresponding terminal of the plurality of apparatus-side terminals,*

[6] *the contact portions are arranged in a first row of contact portions and in a second row of contact portions, the first row of contact portions and the second row of contact portions extending in a row direction which is generally orthogonal to the insertion direction,*

10 [7] *the first row of contact portions is disposed at a location that is further in the insertion direction than the second row of contact portions,*

[8] *the first row of contact portions is longer than the second row of contact portions, and,*

[9] *the first row of contact portions has a first end position and a second end position at opposite ends thereof,*

[10] *a contact portion of the first electronic device terminal is disposed at the first end position in the first row of contact portions and*

[11] *a contact portion of the second electronic device terminal is disposed at the second end position in the first row of contact portions.*

20 11. As can be seen, integers [1] to [3] are generally expressed, and relate to generic features of printer cartridges that existed before the priority date: the printer cartridge itself (here called a “*printing material container*”); memory (but not its content); and a higher voltage device (such as an ink level detection circuit). Integer [4] is also generally expressed and requires the presence of electrical terminals through which the cartridge is electrically connected to the printer with which it is to be used. As is apparent from the Patents, such terminals were also, at that level of generality, generic features of printer cartridges before the priority date. The existence of cartridges with such terminals gave rise to the problem of shorting to which the Patents are directed.⁵

30 12. On the other hand, integers [5] to [11] define the particular layout of the electrical terminals that addresses the problem of shorting. That layout is characterised by the terminals having “*contact portions*” arranged physically so as to reduce the risk of shorting occurring due to a drop of ink being deposited across the terminals for the memory and the higher voltage device. Thus, as Yates J observed, the “*solution*” to the

⁵ PJ1 [182]-[188], [194]-[199] (CAB 62-63, 65-66); FCJ1 [120]-[124], [214] (CAB 209-211, 243); 643 Patent, [0002]-[0003] (AFM 8); see further, eg 643 Patent [0004], [0006A] (AFM 8, 14).

problem of shorting resides in integers [4] to [11].⁶ More particularly, it resides in the particular layout of the terminals defined by integers [5] to [11].

The applicants' products

13. There is no dispute that the original Epson cartridges sold by Seiko and the refilled and restored cartridges sold by Calidad, fall within the scope of claim 1.

14. The primary judge divided the cartridges into nine categories, according to the nature of the work done to refill them with ink and restore them to working condition. In general, Ninestar had to undertake at least two steps for this purpose. First, it had to drill a small hole in the cartridge, insert ink, and reseal the hole. Secondly, for the refilled cartridge to work with a compatible printer, Ninestar had to rewrite a small piece of information in the memory chip of the cartridge to record that the cartridge was no longer empty. In some cases, other steps were taken. The primary judge made detailed findings as to the steps taken for each category, none of which were challenged in the Full Court.⁷

15. The primary judge provided a table at PJ1 [73] summarising the modifications made in relation to each category of cartridges. In general terms:

(a) **Category 1** involved the two steps of refilling the cartridge with ink and rewriting data in the memory chip, as outlined above.

(b) **Categories 2 and 3** were similar, in that they involved the same two steps. The rewriting of data in these categories was slightly more involved than that for Category 1, but not materially different for present purposes.⁸

(c) In **Category 4**, instead of rewriting data in the existing memory chip on the cartridge, that chip was replaced with a compatible “*generic*” memory chip containing the data required to enable the cartridge to be reused.

(d) **Categories 5 and 6** involved an additional step of removing an “*interface pattern*”, a physical feature on the side of the cartridge, to allow the cartridge to be inserted into and used with a different Epson printer.

(e) **Category 7** involved an additional step of replacing the “*integrated circuit assembly*” on the cartridge with an equivalent assembly sourced from another

⁶ See FCJ1 [215] (CAB 243); see also PJ1 [188] (CAB 63).

⁷ PJ1 [68]-[69], [71]-[73], [226]-[294] (CAB 32-35, 72-76); FCJ1 [92] (CAB 197).

original Epson cartridge. This entailed replacing not just the memory chip but also that part of the circuitry which contained the electrical terminals that would connect the cartridge to the printer with which it was to be used. The particular layout of the electrical terminals remained the same.

(f) **Categories A and B** were the same as some of the earlier categories,⁹ save that they did *not* involve the cutting and resealing of a “gas membrane” on the cartridge. That step was undertaken in relation to the earlier categories in order to improve gas exchange within the cartridge when used.

10 16. As the primary judge explained, the cartridges in Categories 1, 2, 3 and A were sold by Calidad after April 2016 (and as at the date of the hearing before his Honour), while the other cartridges had been sold prior to April 2016 (and were no longer sold as at the date of that hearing). In general, Categories 1, 2, 3 and A involved a lesser amount of work to refill the cartridges and restore them to working condition.¹⁰

The proceedings below

17. The proceedings below were conducted on the basis that the Federal Court was bound by the decision of the Privy Council in *National Phonograph Co of Australia Ltd v Menck* (1911) 12 CLR 15, (*Menck*) or, if not strictly bound, would follow it.¹¹

20 18. In *Menck*, the Privy Council held that the sale by a patentee of a patented product carries with it the “full right of ownership” in that product, subject to any restrictive conditions imposed by the patentee at the point of sale.¹² This has been treated as a kind of implied licence of the patentee’s rights.¹³ On this approach, by virtue of its patent rights, a patentee may impose restrictive conditions as to what a purchaser or subsequent owner may do with a patented product, of a kind that would not apply in relation to ordinary chattels. The Privy Council overturned a decision of this Court in *National Phonograph Co of Australia Ltd v Menck* (1908) 7 CLR 481 (*NPCAL*), in which the majority held that a patentee selling a patented product exhausts all patent

⁸ In particular, the rewriting of data in Categories 2 and 3 required the memory chip to be put into a particular mode called “Test Mode”, rather than “Normal Mode”: PJI [132] (CAB 50-51).

⁹ Categories 2 and 3 (for Category A) and 5, 6 and 7 (for Category B): PJI [73] (CAB 34-35).

¹⁰ PJI [73] (CAB 34-35).

¹¹ FCJ1 [5]-[10] (CAB 174-175).

¹² *National Phonograph Co of Australia Ltd v Menck* (1911) 12 CLR 15 at 28.

¹³ See *Interstate Parcel Express Co Pty Ltd v Time-Life International (Nederlands) BV* (1977) 138 CLR 534 at 541-542.

rights in the product, and has no power to impose restrictions on what may be done with the product. That reflects the position in the US, as affirmed by the Supreme Court in *Impression Products, Inc v Lexmark International Inc* 137 S Ct 1523 (2017).

19. Calidad reserved its right to argue, should the matter proceed further, that the decision of the Privy Council in *Menck* should not be followed, and the doctrine of exhaustion recognised by this Court in *NPCAL* and the US Supreme Court in *Impression Products* should apply. That presents an “important question” for this Court.¹⁴

20. Applying the decision of the Privy Council in *Menck*, the primary judge held that an implied licence arose upon Seiko’s unrestricted sale of the original Epson cartridges. In that context, his Honour made a factual finding that neither Ninestar nor Calidad had acquired the cartridges subject to notice of any restriction imposed by Seiko as to the use to which the cartridges could be put.¹⁵ His Honour rejected an argument made by Seiko, referred to as the “inbuilt restrictions argument”, to the effect that the technical limitations inherent in the cartridges and programmed into their memory chips were such as to give notice that they were not to be reused.¹⁶ These factual findings made by the primary judge were undisturbed in the Full Court.¹⁷

21. Against that background, the primary judge and the Full Court gave consideration to whether the refilled and restored cartridges sold by Calidad were covered by the implied licence. The primary judge held that the cartridges in Categories 1, 2, 3 and A were covered by the licence, such that Calidad’s acts in respect of those cartridges did not infringe the Patents.¹⁸ On the other hand, his Honour held that the licence had been extinguished in respect of the cartridges in Categories 4, 5, 6, 7 and B, such that Calidad’s acts in respect of those cartridges did infringe.¹⁹ The Full Court, in three separate sets of reasons, held that none of the cartridges, in any of the categories, were within the scope of the implied licence, and that all of Calidad’s acts infringed.²⁰ The reasoning that led to these conclusions is addressed in Part VI below.

¹⁴ FCJ1 [5]-[10] (CAB 174-175).

¹⁵ PJ1 [144] (CAB 53).

¹⁶ PJ1 [120]-[121], [127]-[143] (CAB 48, 49-53).

¹⁷ See FCJ1 [181], [295] (CAB 233-234, 261).

¹⁸ PJ1 [238]-[246], [256]-[259], [264]-[265], [267]-[268] (CAB 75-76, 79, 80, 81).

¹⁹ PJ1 [275]-[277], [280]-[283], [285]-[286], [289]-[293] (CAB 82-86).

²⁰ FCJ1 [85], [166], [179]-[180], [294] (CAB 194, 228, 233, 261).

22. In supplementary reasons, the Full Court dealt with a debate as to the form of injunctive relief to be granted against Calidad consequent upon that Court's findings of infringement. Their Honours considered it appropriate to grant a general form of injunction, restraining Calidad in terms from infringing the Patents. In so doing, their Honours disagreed with the views of an earlier Full Court in *Christian v Société Des Produits Nestlé SA (No 2)* (2015) 327 ALR 630, to the effect that a general form of injunction of this kind is generally not appropriate.²¹

Part VI: Argument

- 10 23. The first question is whether a doctrine of exhaustion of patent rights on first sale should be recognised. A second and related question is what that doctrine encompasses, if it is to be recognised. For the reasons outlined below, Calidad respectfully submits that the decision of the Privy Council in *Menck* should not be followed, and that the decision of this Court in *NPCAL* should be preferred. Seiko's patent rights in this case were exhausted by its sale of the original Epson cartridges.
24. The resolution of those questions is important, because the adoption of an implied licence and analysis of its terms were central to the reasoning below. In any event, whether the correct analysis is one of exhaustion or implied licence, Calidad submits that both the primary judge (insofar as his Honour found infringement) and the Full Court erred in their conclusions. In either case, it is necessary, when considering 20 infringement, to have regard to the invention as claimed in the Patents, considered as a matter of substance. The reasoning of the Full Court²² wrongly extends a patentee's rights beyond the scope of the claims, by assessing whether the modified product infringes by reference to whether it was sold with the intent it would not be reusable, not by reference to features that form part of the invention as claimed.
25. Finally, the general form of injunction granted by the Full Court was inappropriate.

Recognition of a doctrine of exhaustion

26. The issue in *Menck* has not arisen squarely before this Court since 1908. Although the decision of the Privy Council was discussed in *Interstate Parcel Express Co Pty Ltd v Time-Life International (Nederlands) BV* (1977) 138 CLR 534, those observations were

²¹ FCJ2 [20]-[25], [44]-[50] (CAB 275-277, 282-284).

²² FCJ1 [292] per Yates J (CAB 260).

obiter.²³ Indeed, the Court in *Time-Life* held that the implied licence did not apply in the context of copyright, with which *Time-Life* was concerned. Further, *Menck* was decided under the *Patents Act 1903* (Cth) (the **1903 Act**). While the provisions of the present Act are to the same general effect, they differ from those of the 1903 Act.

27. In Calidad’s submission, the doctrine of exhaustion of patent rights recognised by this Court in *NPCAL* should be preferred. It best reflects the proper construction of the Act and strikes a balance between the monopoly rights of a patentee, on the one hand, and principles of personal property and competition, on the other.

10 28. The starting point is the Act. Section 13(1) provides that a patent gives the patentee the exclusive rights to “*exploit the invention*” and to authorise others to do so. Where the invention is a product, Schedule 1 defines “*exploit*” as including to “*make, hire, sell or otherwise dispose of the product, offer to make, sell, hire or otherwise dispose of it, use or import it ...*”. It is well-established that the Act is to be construed in the context of the state of the law that existed when it was enacted.²⁴ That state of the law included, relevantly, the common law concerning personal property rights in chattels, which cannot be sold subject to conditions that will “*run with the product*”. Thus, where a patentee elects to exercise its exclusive rights in s 13(1) by “*selling or otherwise disposing of*” a patented product, or authorising others to do so, it should be taken to have exhausted its exclusive rights in that embodiment of the invention.

20 29. This construction of the Act is consistent with the Explanatory Memorandum that preceded the introduction of the Act, which made it clear that the proposed s 13 was not intended to modify the operation of “*what is often known as the doctrine of ‘exhaustion of rights’ so far as it applies under Australian law*”.²⁵

30. The construction also reflects the sense in which the majority of this Court in *NPCAL* understood the reference to “*vend the invention*” in the corresponding but differently worded provision in s 62 of the 1903 Act. As Griffith CJ explained, “*the words ‘vend the invention’ mean to put the product of the invention in the possession of the public, and do not refer to any sale of the article after it has once, without violation of the*

²³ *Interstate Parcel Express Co Pty Ltd v Time-Life International (Nederlands) BV* (1977) 138 CLR 534 at 541-542 per Gibbs J; 548-553 per Stephen J.

²⁴ See, eg, *CIC Insurance Ltd v Bankstown Football Club Ltd* (1997) 187 CLR 384 at 408; *Alphapharm Pty Ltd v H Lundbeck A/S* (2014) 254 CLR 247 at [42].

²⁵ Explanatory Memorandum to the *Patents Bill 1990* (Cth) at [24].

monopoly, become part of the common stock".²⁶ This gave effect to the "elementary principle of the law of personal property that the owner of chattels has an absolute right to use and dispose of them as he thinks fit".²⁷ Put another way, the word "vend" was taken against the background of the common law to have been used in its ordinary sense in relation to chattels, as referring to a sale without restriction as to what the purchaser may do with the product. The other members of the majority agreed.²⁸

31. Griffith CJ also referred to US authority for the following proposition, said to have been derived from *Crane v Price* (1842) Web Pat R 393 at 413:²⁹

10 *Hence it is obvious, say the Court, that if a person legally acquires a title to that which is the subject of letters patent, he may continue to use it until it is worn out, or he may repair it or improve upon it as he pleases, in the same manner as if dealing with property of any other kind.*

32. The above proposition is significant for present purposes. It contemplates that the purchaser of a patented product is entitled not merely to deal with the product as sold by the patentee, but also to repair, modify or "improve upon" the product "in the same manner as if dealing with property of any other kind". Such acts are outside the territory of the patentee's right to "make" the claimed invention.³⁰

- 20 33. This is on all fours with the position in the US, as confirmed by the Supreme Court in *Impression Products*. Significantly, in reaching its decision, the Supreme Court referred to the same line of US authority as that cited by Griffith CJ in *NPCAL*.³¹ The Supreme Court also rejected the proposition that the doctrine was based on an implied licence. Instead, the doctrine was one of exhaustion, being "a limit on 'the scope of the patentee's rights'".³² Further, the facts in *Impression Products* are significant. Like the present case, it concerned the sale of "single use" printer toner cartridges acquired and refilled by a third party, including by the use of "methods to counteract the effect of ... microchips" which had been installed in the cartridges to prevent them being reused

²⁶ *National Phonograph Co of Australia Ltd v Menck* (1908) 7 CLR 481 at 512.

²⁷ *National Phonograph Co of Australia Ltd v Menck* (1908) 7 CLR 481 at 510.

²⁸ *National Phonograph Co of Australia Ltd v Menck* (1908) 7 CLR 481 at 523 per Barton J; 531 per O'Connor J; 543 per Higgins J.

²⁹ *National Phonograph Co of Australia Ltd v Menck* (1908) 7 CLR 481 at 509-510, citing *Crane v Price* (1842) Web Pat R 393 at 413 and *Bloomer v Millinger* 1 Wall 340 at 351 (1864).

³⁰ See *United Wire Ltd v Screen Repair Services (Scotland) Ltd* [2001] RPC 24 at [71] per Lord Hoffman, referring to "repair ... like modifying or adapting" being outside the territory of "making".

³¹ *Impression Products, Inc v Lexmark International Inc* 137 S Ct 1523 at 1531-1532, 1534 (2017).

³² *Impression Products, Inc v Lexmark International Inc* 137 S Ct 1523 at 1534 (2017).

once the toner ran out.³³ The sale of the refilled and restored cartridges for reuse (with the environmental benefits that that entailed) did not infringe, because the patentee's rights had been exhausted upon its sale of the original patented products.

34. As submitted, this strikes an appropriate balance between the monopoly rights of a patentee, and principles of personal property and competition. The Supreme Court gave a useful illustration, in which a shop that restores and sells used cars is able to work *"because the shop can rest assured that, so long as those bringing in the cars own them, the shop is free to repair and resell those vehicles. That smooth flow of commerce would sputter if companies that make the thousands of parts that go into a vehicle could keep their patent rights after the first sale"*.³⁴

10

35. The implied licence analysis adopted by the Privy Council in *Menck*, by allowing a patentee to impose restrictive conditions that qualify the *"full right of ownership"* conveyed by the sale of a patented product, fails to strike that balance. Further, there is an artificiality inherent in an implied licence analysis in this context. In *Time-Life*, after referring to the Privy Council's decision in *Menck*, Gibbs J said:³⁵

These statements seem to accord more with general principles than to say that a sale of an article imports a licence to use it. The sale of an article confers on the buyer all the rights of ownership including the right to use the article, but it seems a misuse of words to say that a person who sells an article consents to it being used in any way that the buyer wishes.

20

36. Gibbs J felt constrained by the longstanding nature of the authorities to accept the implied licence analysis.³⁶ For the reasons given above, this Court should not. A doctrine of exhaustion of patent rights should be recognised by the Court.

Scope and application of a doctrine of exhaustion

37. If a doctrine of exhaustion is recognised, it would follow that none of Calidad's acts in issue in this case, involved any infringement of the Patents. Seiko's patent rights were exhausted by its sale of the original Epson cartridges. Calidad was at liberty to import and sell those cartridges after they had been refilled and restored to working condition.

³³ *Impression Products, Inc v Lexmark International Inc* 137 S Ct 1523 at 1530 (2017).

³⁴ *Impression Products, Inc v Lexmark International Inc* 137 S Ct 1523 at 1532 (2017).

³⁵ *Interstate Parcel Express Co Pty Ltd v Time-Life International (Nederlands) BV* (1977) 138 CLR 534 at 541.

³⁶ *Interstate Parcel Express Co Pty Ltd v Time-Life International (Nederlands) BV* (1977) 138 CLR 534 at 542.

The modifications made by Ninestar to the cartridges for that purpose were within its right as owner of the cartridges to modify, improve or repair them “*in the same manner as if dealing with property of any other kind*”.

38. Calidad accepts that a doctrine of exhaustion would not permit the purchaser of a patented product to make or supply a *completely new embodiment* of the invention, as distinct from *modifying* the particular product sold by the patentee or supplying that modified product. The making or supply of a new embodiment of the invention would remain within the patentee’s exclusive rights to “*exploit the invention*”, notwithstanding its sale of the patented product. Thus, to take an extreme example, Calidad could not
10 melt down one of the original Epson cartridges into its constituent raw materials and use those materials to extrude or construct a completely new and different cartridge embodying the features of the claimed invention. Nor could Calidad use entirely different materials to make a new original cartridge that embodied those features.
39. This is reflected in the US authorities, which recognise a distinction between the “*reconstruction*” of a patented product, on the one hand, and the making of *modifications*, improvements or repairs to an existing patented product, on the other hand. The latter acts are permissible. Only “*reconstruction*” in the sense of making a “*substantially new article*” impinges upon the patentee’s rights.³⁷
40. In the present case, none of the modifications made by Ninestar to the original Epson
20 cartridges involved the making of a new embodiment of the invention as claimed, or the “*reconstruction*” of the patented product. For this purpose, it is necessary to have regard to the invention as claimed, which defines the scope of Seiko’s monopoly. That claim must be considered as a matter of substance, not form.³⁸ The claim defines a printer cartridge comprising a number of generic features and a particular layout of electrical terminals to address the problem of shorting. The work done by Ninestar did not involve the making of a new combination of these features. Indeed, it did not involve any material change to that combination of features as present in the original Epson cartridges sold by Seiko. Thus, for the cartridges in Categories 1, 2, 3 and A, Ninestar merely drilled and resealed a small hole, inserted ink and reprogrammed the
30 memory chip, where no claim was made to the ink or the data on the chip.

³⁷ See, eg, *Varex Imaging Corporation v Richardson Electronics Ltd* 2019 WL 4034662 at *2-*5 (ND Ill 2019); see also *Aro Mfg Co v Convertible Top Replacement Co* 365 US 336 (1961).

41. These matters may be illustrated further by reference to the reasoning of the primary judge and the Full Court in the context of the implied licence.

The reasoning of the primary judge

42. Having held that an implied licence arose upon Seiko's unrestricted sale of the original Epson cartridges, the primary judge considered whether the modifications made to the cartridges had extinguished that implied licence.³⁹ Noting the absence of authority directly on point, his Honour said (emphasis in original):⁴⁰

10 *For the reasons developed below, in my view the threshold question to consider is whether or not the modified product is materially the same embodiment of the invention as claimed as the product that the patentee sold without restriction. That is not an inquiry that is at large. The right of the patentee to impose restrictions upon sale arises because the product is an embodiment of an invention as claimed. The question is not whether or not the product was altered or repaired, but whether the product, insofar as it is an embodiment of the invention as claimed, was materially altered, such that the implied licence can no longer sensibly be said to apply.*

43. In adopting that approach, the primary judge recognised that the extent to which the modifications to the cartridges were relevant had to be assessed in the context of the patentee's rights conferred by s 13 of the Act.⁴¹ As his Honour said:⁴²

20 *In short, the exclusive rights of a patentee to constrain the conduct of the owner of a patented product can only arise insofar as that product is an embodiment of the invention as claimed. Otherwise the scope of the patentee's rights would exceed the rights conferred by the Act.*

44. The primary judge thus considered "*how the modifications in question relate to the features of the patented product that are defined by the claim*".⁴³ Modifications that did not concern a claimed feature were irrelevant to the analysis.

45. The primary judge was right to have regard to the claimed features in this way. This must be so, whether the analysis is, as Calidad submits, one of exhaustion, or alternatively, one of implied licence. A patentee's rights in relation to an invention are
30 determined by the claims of its patent. So much follows from s 13 of the Act, which

³⁸ *D'Arcy v Myriad Genetics Inc* (2015) 258 CLR 334 at [87]-[88], [94], [144]-[145] (*Myriad*).

³⁹ PJ1 [144]-[145] (CAB 53).

⁴⁰ PJ1 [164] (CAB 57-58).

⁴¹ PJ1 [167] (CAB 58).

⁴² PJ1 [169] (CAB 59).

⁴³ PJ1 [178] (CAB 61).

grants exclusive rights “*in relation to an invention*”, and s 40(2)(b), which confirms that the claims “*define the invention*”. His Honour also referred to the reasons of the plurality in *D’Arcy v Myriad Genetics Inc* (2015) 258 CLR 334, which emphasised the “*limiting role*” of patent claims and the need to define the invention clearly so that others can know the boundaries of the monopoly.⁴⁴

46. Applying that approach, the primary judge held that the modifications to the cartridges in Categories 1, 2, 3 and A had not extinguished the implied licence.⁴⁵ His Honour held that the drilling and resealing of a small hole for refilling the cartridges with ink, and the cutting of the “*gas membrane*” where this was done, involved “*minor physical alterations to the cartridge container*” which “*bear no relationship to the invention the subject of the integers of the claim*”.⁴⁶ His Honour also held that, as “*the claim distinguishes between the memory chip and that which is stored upon it (whether it be data, software or otherwise)*”, the contents of the memory did not form part of the claimed combination.⁴⁷ As a result, the rewriting of data in the memory to enable the cartridges to be reused involved no change to any feature of the claimed invention.
47. Calidad submits that, if contrary to its primary submission as to the doctrine of exhaustion, the appropriate analysis is one of implied licence, the primary judge’s reasoning on Categories 1, 2, 3 and A was correct. The same result would follow if, as Calidad submits, a doctrine of exhaustion is recognised. For the reasons given by his Honour, the modifications made by Ninestar to the cartridges in Categories 1, 2, 3 and A did not, either individually or collectively, involve the making of a new embodiment of the invention as claimed, or the “*reconstruction*” of the patented product.
48. On the other hand, the primary judge held that the modifications made to the cartridges in Categories 4, 5, 6, 7 and B went further, and extinguished the implied licence.⁴⁸ In Category 4, his Honour held that the replacement of the memory chip with a compatible memory chip involved a material modification, on the basis that “*Integer [2] of claim 1 directly concerns the memory*”.⁴⁹ In Categories 5 and 6, his Honour held that the

⁴⁴ PJ1 [168], citing *D’Arcy v Myriad Genetics Inc* (2015) 258 CLR 334 at [14], (CAB 58-59). See also the additional authorities cited by the primary judge at PJ1 [170] (CAB 59).

⁴⁵ PJ1 [238]-[246], [256]-[259], [264]-[265], [267]-[268] (CAB 75-76, 79, 80, 81).

⁴⁶ PJ1 [240] (CAB 75).

⁴⁷ PJ1 [243] (CAB 76); see also PJ1 [221] (CAB 71).

⁴⁸ PJ1 [275]-[277], [280]-[283], [285]-[286], [289]-[293] (CAB 82-86).

⁴⁹ PJ1 [276] (CAB 83).

removal of the “*interface pattern*” on the side of the cartridge affected the way in which the cartridge was “*adapted to be attached to a printing apparatus*”, as required by integer [1], although his Honour thought this was a “*borderline*” modification.⁵⁰ In Category 7, his Honour held that “*the removal of the integrated circuit board, which is central to the invention as claimed and which includes within it the layout of the terminals which are described in integers [4]-[11]*” also involved a material change.⁵¹ His Honour’s conclusions on Category B followed from these findings.⁵²

- 10 49. If an implied licence analysis applies, rather than the doctrine of exhaustion, Calidad submits that the primary judge erred by holding that the modifications made to the cartridges in Categories 4, 5, 6, 7 and B extinguished the implied licence. In particular, the primary judge erred in characterising these modifications as involving material changes to the features of the invention as claimed. If a doctrine of exhaustion is recognised, the same reasons indicate that those changes did not involve the making of a new embodiment or the “*reconstruction*” of the product as claimed.
- 20 50. For this purpose, it is necessary to consider the claim as a matter of substance, not merely form, as emphasised in *Myriad* in the context of patentable subject matter.⁵³ As the plurality in *Myriad* recognised, a definition of the invention depends not merely upon the words of the claim, but the construction of the claim read in the context in which it is found.⁵⁴ Further, as Gageler and Nettle JJ observed: “*The way in which a claim is drafted cannot, however, transcend the reality of what is in suit. ... Monopolies are granted for inventions, not for the inventiveness of the drafting with which applicants choose to describe them*” (citations omitted).⁵⁵
51. Thus, in *Myriad*, although the claim as a matter of form was directed to a class of chemical compounds, isolated nucleic acids, as a matter of substance it was directed to the genetic information embodied in the arrangements of nucleotides in those compounds. This was not patentable subject matter. The drafting of the claim as being directed to chemical compounds could not change this.

⁵⁰ PJ1 [281] (CAB 84).

⁵¹ PJ1 [290] (CAB 85).

⁵² PJ1 [293] (CAB 86).

⁵³ *D’Arcy v Myriad Genetics Inc* (2015) 258 CLR 334 at [87]-[88], [94], [144]-[145].

⁵⁴ *D’Arcy v Myriad Genetics Inc* (2015) 258 CLR 334 at [12], [39].

⁵⁵ *D’Arcy v Myriad Genetics Inc* (2015) 258 CLR 334 at [144].

52. In the present case, the substance of the invention resides in the particular layout of the electrical terminals defined by integers [5] to [11] of claim 1. These are the features that address the problem of shorting to which the Patents are directed. As Yates J recognised, it is the layout of the terminals that provides the “*solution*” to that problem.⁵⁶ Thus, what Seiko has invented resides, as a matter of substance, in integers [5] to [11]. The other integers of the claim relate to generic features of printer cartridges that existed before the priority date: the printer cartridge itself; the memory (but not its content); a higher voltage device such as an ink level detection circuit; and the presence of the plurality of electrical terminals.
- 10 53. Had the primary judge given due weight to these matters, his Honour would have concluded that the cartridges in Categories 4, 5, 6, 7 and B were covered by the implied licence. Thus, in relation to Category 4, the step of replacing the memory chip on the cartridge with a compatible memory chip containing the data required to enable the cartridge to be reused did not involve any change to the layout of the electrical terminals defined by integers [5] to [11]. Rather, it involved the replacement of a generic feature of the cartridge, being the memory defined by integer [2], which had no bearing on the substance of the invention as claimed. Considered in that light, the modification was analogous to the rewriting of data in the memory chip in Categories 1, 2, 3 and A.
- 20 54. The same applies in relation to the removal of the “*interface pattern*” in Categories 5 and 6. This also involved no change to the layout of the electrical terminals defined by integers [5] to [11]. The primary judge considered that this step involved a change to that part of integer [1] which required that the cartridge be “*adapted to be attached to a printing apparatus*”. Even so, it was a “*borderline*” modification.⁵⁷ More importantly, integer [1] was a generic feature of printer cartridges before the priority date, and the change had no bearing on the substance of the invention as claimed.
- 30 55. As to Category 7, the step of replacing the “*integrated circuit assembly*” involved a more substantial modification, but it too did not involve any material change to the substance of the invention as claimed. This is because the *particular layout* of the electrical terminals on the cartridge as defined by integers [5] to [11] was not affected by that step. Rather, the existing “*integrated circuit assembly*” was replaced with an

⁵⁶ See FCJ1 [215] (CAB 243); see also PJ1 [188] (CAB 63).

⁵⁷ PJ1 [281] (CAB 84).

equivalent assembly from another Epson cartridge containing the same layout of terminals. This was done to enable the data in the memory to be replaced, and the cartridge to be reused, not to change the layout of the terminals in any way.

56. The same conclusions in relation to Category B follow from the other categories.
57. If, as is Calidad's primary contention, a doctrine of exhaustion applies, the modifications made to the cartridges in Categories 4, 5, 6, 7 and B did not involve the making of a new embodiment of the invention as claimed, or the "*reconstruction*" of the patented product. Rather, the refilled and restored cartridges were merely modified versions of the products sold by Seiko. Further, as the US cases recognise in this context, even replacement of a patented feature does not necessarily mean that the combination as a whole has been "*reconstructed*".⁵⁸ That is particularly so, when the claim is, as it must be, considered as a matter of substance, not merely form. This leads to a conclusion that there was no infringement by any of the categories of cartridges.

The Full Court's reasoning

58. The Full Court upheld the primary judge's finding that an implied licence arose upon the unrestricted sale by Seiko of the original Epson cartridges, but held that Calidad's conduct was outside the scope of that implied licence.
59. In reaching that conclusion, all three members of the Court gave weight to the fact that the cartridges sold by Seiko were "*single use*" products that could not, without modification, be refilled with ink and *reused*.⁵⁹ Thus, their Honours treated the implied licence as though it was limited by the context of the patentee's sale and the particular characteristics of the product as sold. This led their Honours to characterise the modifications made by Ninestar as resulting in the making or manufacturing of "*new*" printer cartridges.⁶⁰ In short, because the "*single use*" products sold by Seiko were modified so that they could be *reused*, they became "*new*" products.
60. This reasoning involved several errors. Adopting an implied licence analysis, the Full Court's emphasis on the original Epson cartridges being "*single use*" products was inapt. That consideration is irrelevant to the invention as claimed. Claim 1 does not

⁵⁸ *Sandvik Aktiebolag v EJ Company* 121 F 3d 669 at 371 (Fed Cir 1997); *Varex Imaging Corporation v Richardson Electronics Ltd* 2019 WL 4034662 at *5 (ND Ill 2019).

⁵⁹ FCJ1 [54], [175], [180], [278], [280]-[281] (CAB 188, 231-232, 233, 257-258).

⁶⁰ FCJ1 [85], [166], [179]-[180], [290], [294] (CAB 194, 228, 233, 259, 261).

relate to whether the “*printing material container*” can be reused, or the environmental benefits that that entails; nor does it extend a monopoly to the supply of ink or anything other than the particular features of a printer cartridge defined by the claim. Further, by treating the implied licence as though it was limited by the context of the patentee’s sale and the particular (unpatented) characteristics of the product as sold, the Full Court failed to apply the “*full right of ownership*” referred to in *Menck*. It should be noted that the Full Court did not overturn the primary judge’s finding that Seiko had imposed no restriction as to the use to which the original Epson cartridges could be put, nor his Honour’s rejection of Seiko’s “*inbuilt restrictions argument*”.⁶¹

- 10 61. If a doctrine of exhaustion is applied, as Calidad submits, the same considerations undermine their Honours’ reasoning. In the context of exhaustion, there is no room for any analysis that turns upon the perceived purpose of the patentee in projecting a product onto the market. Once the focus on the original Epson cartridges as “*single use*” products is put aside, and attention is directed to the invention as claimed, it can be seen that the modifications made by Ninestar did not, individually or collectively, involve the making of “*new*” printer cartridges as opposed to their modification.
62. Additional errors emerge from their Honours’ reasons. Greenwood J held that the implied licence did not include a right to “*make*” a patented product, and characterised the modifications as involving “*a ‘making’ of a product the subject of Seiko’s invention*”.⁶² This set up a dichotomy between “*use*” of a product and “*making*” a *new* product, with no middle ground involving *modifications* to an existing product. His Honour did not contemplate modifications short of “*making*” something new, nor attempt to relate the modifications to the features of the invention as claimed.
- 20 63. Jagot J sought to relate the modifications to the integers of the claim, but her Honour’s approach wrongly favoured form over substance. Her Honour emphasised integer [1], concluding that minor physical alterations associated with drilling and resealing a small hole to refill the cartridges with ink involved making a new “*printing material container*” within the claim.⁶³ Her Honour also held that the “*‘microscopic physical changes’ necessary to reset the memory*” for the cartridges in Categories 1, 2, 3 and A supported the conclusion that refilled and restored cartridges were “*outside the scope of*
- 30

⁶¹ PJ1 [120]-[121], [127]-[143] (CAB 48, 49-53); FCJ1 [181], [295] (CAB 233-234, 261).

⁶² FCJ1 [83]-[85] (CAB 194).

⁶³ FCJ1 [166] (CAB 228).

any possible implied licence”, notwithstanding her apparent acceptance that the contents of the memory were not the subject of the claim.⁶⁴ Similarly, the modifications to the cartridges in Categories 4, 5, 6, 7 and B took them outside the scope of any implied licence.⁶⁵ Further, by adopting such an approach, her Honour failed to recognise that “*modification*” (like “*repair*”) is outside the concept of “*making*”.

64. Yates J went further, holding that the primary judge had erred in confining his attention to the integers of the claim and that the implied licence was limited to the form of the article *as sold by the patentee*. Yates J said that “*a consideration of the materiality of the modifications made by Ninestar to the original Epson cartridges is not confined to only those features of the articles that are claimed features of the invention*”.⁶⁶ On this approach, a modification to a patented product bearing no relationship to the invention would take the product outside the scope of any implied licence. Such reasoning suggests that where, for example, a patent is granted for a car containing a novel kind of airbag, it would enable a patentee to restrain a purchaser from modifying the gear box in the car on the basis that this would result in a car different to the car as originally sold by the patentee. This should be rejected. The Act confers no rights in relation to any feature of a patented product that does not form part of the claims.
65. Thus, the Full Court, either expressly or in substance, approached infringement by asking not whether the modifications related to the integers of the patentee’s claim, but rather by reference to the perceived purpose of the patentee in projecting its product onto the market. That emphasis was wrong in law, both if considering an implied licence analysis, and, on any view, in the context of exhaustion.

Form of injunctive relief

66. As noted, the Full Court granted a general form of injunction restraining Calidad from infringing the Patents; by contrast, the primary judge granted an injunction specific to the infringements in which his Honour found Calidad engaged.⁶⁷ If there has been any infringement, the approach of the primary judge should be preferred, as a matter of

⁶⁴ FCJ1 [172]-[173] (CAB 230-231).

⁶⁵ FCJ1 [167], [170], [171] (CAB 228, 229-230).

⁶⁶ FCJ1 [292] (CAB 260).

⁶⁷ FCJ2 [20]-[25], [44]-[50] (AB 275-277, 282-284); cf PJ2, order 3.

policy: see the reasons in *Christian*.⁶⁸ That is particularly so where infringement turns upon the nature and extent of any modifications made to products sold by Seiko.

Part VII: Orders sought

67. The appeal be allowed with costs.

68. Orders 1 to 5 made by the Full Court of the Federal Court on 5 July 2019 and orders 1 to 4 made by the Full Court of the Federal Court on 29 October 2019 be set aside, and in lieu thereof, an order that the appeal to that Court be allowed with costs and the cross-appeal to that Court be dismissed with costs.

10 69. Orders 1 to 8, 10 and 11 made by the primary judge on 16 February 2018 be set aside and, in lieu thereof, an order that:

(a) the respondents' originating application, including the respondents' claims of patent infringement, breach of clause 2(a)(ii) of the settlement deed, breach of statutory duties under ss 145 and 148 of the *Trade Marks Act 1995* (Cth) and contravention of ss 18 and 29 of Schedule 2 to the *Competition and Consumer Act 2010* (Cth), otherwise be dismissed; and

(b) subject to order 9 made by the primary judge on 16 February 2018, the respondents pay the applicants' costs of the proceeding.

70. The matter be remitted to the primary judge for determination of the respondents' claim for pecuniary relief for breach of clause 2(a)(i) of the settlement deed.

20 **Part VIII: Oral argument**

71. Calidad estimates that approximately 3 hours will be required for its oral argument.

DATED: 3 January 2020



David Shavin QC
Tel: (03) 9225 7970
Email: david@shavin.com.au
Counsel for the appellants

Christian Dimitriadis SC
Tel: (02) 9930 7900
Email: cd@nigelbowen.com.au

⁶⁸ *Christian v Société Des Produits Nestlé SA (No 2)* (2015) 327 ALR 630.

ANNEXURE

RELEVANT STATUTORY PROVISIONS

PATENTS ACT 1903 (CTH)

Provisions as applicable to National Phonograph Co of Australia Ltd v Menck (1908) 7 CLR 481 and National Phonograph Co of Australia Ltd v Menck (1911) 12 CLR 15

- 10 62. The effect of a patent shall be to grant to the patentee full power, sole privilege and authority, by himself, his agents, and licensees during the term of the patent to make, use, exercise, and vend the invention within the Commonwealth in such manner as to him seems meet, so that he shall have and enjoy the whole profit and advantage accruing by reason of the invention during the term of the patent.

PATENTS ACT 1990 (CTH)

The below provisions are still in force, in the same form, at the date of making these submissions.

13 Exclusive rights given by patent

- 20 (1) Subject to this Act, a patent gives the patentee the exclusive rights, during the term of the patent, to exploit the invention and to authorise another person to exploit the invention.
- (2) The exclusive rights are personal property and are capable of assignment and of devolution by law.
- (3) A patent has effect throughout the patent area.

40 Specifications

- (2) A complete specification must:
- ...
- 30 (b) where it relates to an application for a standard patent—end with a claim or claims defining the invention; ...

Schedule 1—Dictionary

In this Act, unless the contrary intention appears:

exploit, in relation to an invention, includes:

- (a) where the invention is a product—make, hire, sell or otherwise dispose of the product, offer to make, sell, hire or otherwise dispose of it, use or import it, or keep it for the purpose of doing any of those things; or
- (b) where the invention is a method or process—use the method or process or do any act mentioned in paragraph (a) in respect of a product resulting from such use.

10

invention means any manner of new manufacture the subject of letters patent and grant of privilege within section 6 of the Statute of Monopolies, and includes an alleged invention.