



THE SUPREME COURT OF APPEAL
OF SOUTH AFRICA

Not Reportable

CASE NO: 278/07

In the matter between :

NORTHPARK TRADING 3 (PTY) LTD

Appellant

and

AUSPLOW (PTY) LTD

Respondent

Before: STREICHER, NUGENT, HEHER JJA, HURT &
SNYDERS AJJA

Heard: 14 MARCH 2008

Delivered: 31 MARCH 2008

Summary: Patent – revocation – not involving an inventive step

Neutral citation: Northpark Trading v Ausplow (278/07) [2008] ZASCA 46
(31 March 2008)

J U D G M E N T

NUGENT JA

NUGENT JA:

[1] This is an appeal from the Court of the Commissioner of Patents (Southwood J) where the appellant was the defendant in an action brought by the respondent for patent infringement. I will refer to the parties as they were referred to in the court below. The defendant was alleged to have infringed South African Patent No. 95/0812 registered in the name of the plaintiff under the Patents Act 57 of 1978, with a priority date 3 February 1994. The defendant denied infringement, denied the validity of the patent, and counterclaimed for its revocation on the grounds that the invention claimed was not new, did not involve an inventive step, and was unclear. The court below dismissed the defences and the counterclaim hence the present appeal, which is before us with the leave of that court.

[2] It is convenient to deal at the outset with the validity of the patent because in my view that is decisive of this appeal. The dispute in that regard falls within a decidedly narrow compass. I think that the point of dispute can most conveniently be identified by briefly summarising the description of the invention as it appears in the specification before turning to the claims.

[3] The invention is entitled ‘Improvements in or Relating to Seeding Machinery.’ A brief description of the machinery of the prior art will assist to understand the claims. The machinery is designed for planting seeds in untilled soil. It is essentially a frame that is dragged behind a tractor on which a series of tools are mounted in a line one behind the other each performing one of a series of functions. First in line is a tine (or share) that cuts a slot in the untilled soil. Optionally, a tube might be mounted behind the tine, through which fertiliser may be deposited in the slot. Behind the tube is a device of one kind or another that collapses soil into the slot so as to partially fill it, which serves a dual purpose: the collapsed soil separates the fertiliser (if

fertiliser is used) from the seed and avoids the seed being burnt, and it forms a suitable bed upon which to deposit the seeds. Behind that tool is another vertically-mounted tube through which seeds are deposited on the bed. And behind that is a wheel, wider than the slot, which dislodges more soil from the sides of the slot, covering the seed, and simultaneously tamping it down to ensure that the seed is in good contact with the surrounding soil.

[4] Under the heading 'Background to the Invention' the specification describes a problem that may be encountered with seeding machinery of that kind:

'It has been found in practice that tined seeding machinery and attachments have difficulty in penetrating soil deeply whilst at the same time maintaining accurate placement of seed and fertilizer. Due to the undulating ground conditions nearly always encountered, and with seeding depth controlled by widely spaced ground wheels, seeding depth cannot be maintained, often with seed and fertilizer placed together on a hard impenetrable barrier causing poor seed germination, loss of plant vigour, low yields, poor water infiltration, waterlogging and fertilizer toxicity and a greater incidence of disease.'

The specification records that the object of the invention is 'to overcome or substantially ameliorate the above disadvantages.'

[5] While that is said to be the object of the invention the claims are not confined to a means of overcoming the difficulty described in the specification. Claim 1 reads as follows:

'A seeding assembly to be used with a plough frame supporting at least one plough tine, said assembly comprising:

 a seeding tube to extend downwardly into a slot formed in a soil layer by the tine, said tube having a lower extremity through which seed is delivered into the soil layer;

 a closing tool fixed with respect to said lower extremity and having a leading surface forward thereof relative to the normal direction of travel of the frame over the soil layer, said closing tool being aligned in said direction with respect to said lower extremity so that it engages soil adjacent said slot to dislodge the soil to partly close the slot and provide a seed bed onto which seed leaving said lower extremity is delivered;

mounting means to attach the tube and closing tool to the frame to permit height adjustment of the tube and the closing tool with respect to the frame; and

ground engaging means operatively associated with the tube and closing tool to engage the soil layer to cause said height adjustment.’

[6] A patent may be granted for an invention only if – amongst other things – the invention is new and it involves an inventive step.¹ A patent that has been granted for an invention that does not meet those criteria may be revoked.² An invention is not new if it forms part of the state of the art immediately before the priority date of a claim to the invention. The state of the art includes all matter that has been made available to the public, whether in the Republic or elsewhere, by written or oral description.³

[7] In support of its claim of want of novelty the defendant relied on three patents granted in the United States on various dates that precede the priority date of the patent that is now in issue – the Halford patent, the Anderson patent and the Dreyer patent – and on one South African patent. Reliance upon the South African patent was abandoned in the heads of argument. Applying the well-established approach to this question as it was explained by this court in *Gentiruco*⁴ and later summarised in *Netlon*⁵ the court below held that none of the earlier patents described all the integers of the patent that is now in issue. For reasons that will become apparent it is necessary only to consider the Dreyer patent (US Patent No. 4,726,304).

[8] It is not necessary in this case to divide claim 1 of the patent in issue into its constituent elements because there is only one element that is not described in Dreyer. The Dreyer invention is described in summarised form in the specification as follows:

¹ Section 25(1) of the Act.

² Section 61(1)(c).

³ Section 25(6).

⁴ *Gentiruco A.G. v Firestone SA (Pty) Ltd* 1972 (1) SA 589 (A).

⁵ *Netlon Ltd v Pacnet (Pty) Ltd* 1977 (3) SA 840 (A) at 861F-862B.

‘The object of the present invention is to attain a reliably separated deposit of two materials, such as seed and fertilizer, even in heavy soils and especially in zero tillage.

This object is attained in accordance with the invention in that an expansion structure that extends down into the furrow is positioned in the vicinity of the rear outlet of each sowing share, in that the expansion structure is at least somewhat wider than the ripping structure, and in that the bottom end of the expansion structure is higher than the bottom of the point of the ripping structure.

The expansion structure on the sowing share between the forward and rear outlet ensures that the material deposited in the furrow through the first outlet will be covered with soil in such a way that the fertilizer and seed will be separated by a layer of soil even when the soil is very heavy or a lot of soil is thrown up. The expansion structure always pushes at least a little soil ahead, forcing it over the material deposited in the furrow from the first outlet. The material coming from the rear outlet on the sowing share will then always fall on top of the soil covering the first material.’

The Dreyer invention might also have an impact structure mounted on the rear of the expansion structure, which ensures that the second material (ordinarily the seed) is spread in a ribbon, but that is an optional feature that does not limit the description.

[9] Dreyer discloses all but one of the elements of the invention that is now in issue. There was some suggestion in argument that Dreyer does not disclose the ‘closing tool’ of the present invention (the tool of the prior art that functions to partially fill the slot) but I think the apparent distinction is one of nomenclature only. What Dreyer describes as the ‘expansion structure’ in the summary I have given is in all respects the equivalent of the ‘closing tool’ of the present invention. It was also suggested that the apparatus of the present invention has the seed being deposited in a line while Dreyer has it being deposited in a ribbon but I have already pointed out that that feature of the Dreyer invention is optional.

[10] But there is this distinction: the invention that is now in issue has the seeding tube extending downwardly ‘into’ the slot that is formed by the tine,

which is not described by Dreyer. It was submitted on behalf of the appellant that the seed outlet of the Dreyer patent is capable of projecting into the slot but that is not correct. It was accepted on behalf of the appellant that all the integers of the present invention – including that integer – were intended by the inventor to be essential to the claim. It follows that to the extent that the seed-tube of the invention projects into the slot the invention is not described by Dreyer. (All its integers are also not described by the other documents relied upon by the appellant but in view of the conclusion to which I have come it is not necessary to compare those descriptions.)

[11] For a patent to be valid the claimed invention must not only be new but must also involve an inventive step. An invention is deemed to involve an inventive step if it is not obvious to a person skilled in the art, having regard to any matter which forms, immediately before the priority date of the invention, part of the state of the art. It was not disputed that the state of the art immediately before the priority date for this purpose includes the Dreyer and the Anderson patents.

[12] In *Ensign-Bickford*⁶ Plewman JA restated the enquiry in this regard in four parts:

- ‘(1) What is the inventive step said to be involved in the patent in suit?
- (2) What was, at the priority date, the state of the art (as statutorily defined) relevant to that step?
- (3) In what respect does the step go beyond, or differ from, that state of the art?
- (4) Having regard to such development or difference, would the taking of the step be obvious to the skilled man?’

[13] Courts in this country and abroad have warned on numerous occasions against the danger posed by hindsight in assessing whether a step is inventive.

⁶ *Ensign-Bickford (SA)(Pty) Ltd v AECI Explosives and Chemicals Ltd* 1999 (1) SA 70 (SCA) at 80I-J.

As pointed out in *Windsurfing International Inc v Tabur Marine (Great Britain Ltd)*,⁷ cited with approval in *Ensign-Bickford*:⁸

‘What with hindsight, seems plain and obvious, often was not so seen at the time.’

The extent to which expert evidence is admissible, and the role that it might play in the assessment of whether the invention involves an inventive step, is not necessary to revisit in this case.⁹ Though expert evidence might be necessary in some cases – at least to educate a court in the technology involved – that will not always be so. The proper enquiry has been formulated in various ways in the cases but I do not think it is necessary to repeat them.

As pointed out by *Burrell*,¹⁰

‘the word “obvious” is a much-used word and ... there really is no need to go beyond its primary dictionary meaning of “very plain”’.

[14] Whether the step would be obvious to a person skilled in the art falls to be judged with regard to material that formed the state of the art at the material time, which need not be described in a single document. It is permissible in appropriate cases to draw from more than one document to determine what would be obvious to a person skilled in the art.¹¹

[15] I think it is fair to infer from the background to and object of the invention as it is recorded in the specification that the inventive step that the inventor considered himself to be taking lay in linking the seeding assembly to the tine in such a way that the seeding assembly is capable of moving in a vertical plane relative to the tine and causing the seeding assembly to move in that plane so as to follow the profile of the soil. Implicitly, this would solve the difficulty that the inventor said (in the portion of the specification that I have referred to) was the object of the invention.

⁷ [1985] RPC 59 at 72.

⁸ At 81E-H.

⁹ Cf. T D Burrell *Burrell's South African Patent and Design Law* 3ed para 4.13.3.

¹⁰ Cited above.

¹¹ Burrell, above, para 4.11.4, and cases there cited.

[16] The specification is silent as to any benefits that are to be achieved by extending the outlet of the seeding tube into the slot and that integer is also immaterial to achieving the proclaimed object of the invention. But in argument it was submitted that the inventiveness of projecting the seed tube into the slot lies in the propensity this gives to the seed tube to avoid seed being displaced by wind. If that was why the inventor considered the projection of the tube into the slot to be an inventive step it is remarkable that no reference was made to it when describing the background to and the object of the invention. It seems to me that reliance upon that integer as constituting an inventive step is merely an opportunistic exploitation of the absence of that integer from the description in Dreyer.

[17] I do not think that integer can be said to constitute a step forward upon the state of the art and least of all a step that is inventive. I think there can be little doubt that a person skilled in the art, faced with the problem of wishing to ensure accuracy of the placement of the seed (which was the only reason advanced in argument for why the step is inventive) would extend the outlet of the tube into the slot so as to be as close as possible to the bed upon which it is to be placed. To the extent that he or she might not already know that, it would be apparent from the description in Anderson in which that is disclosed. In my view the invention in the present case does not involve an inventive step.

[18] We were asked by counsel for the respondent, if that were to be our finding, to postpone the order of revocation to enable the patentee to effect amendments to the specification, as contemplated by s 68 of the Act. The appellant's counsel advanced no adequate reason why that should not be done.

[19] The appeal is upheld with costs. The orders of the court below are set aside and the following orders are substituted:

- ‘1. The plaintiff’s action is dismissed with costs.
2. The defendant’s counterclaim for the revocation of South African Patent No. 95/0812 is granted and, subject to the orders below, the patent is revoked.
3. The order in paragraph (2) above is provisional. It will become fully operative if the patentee does not within one month file notice of an application to amend the patent, or, having filed such application, withdraws it. If an application as aforesaid is made and not withdrawn, it shall be decided at the hearing of such application whether or not the revocation order is to be put into operation.
4. The plaintiff is ordered to pay the defendant’s costs in respect of the counterclaim.’

R.W. NUGENT
JUDGE OF APPEAL

CONCUR:

STREICHER JA)

HEHER JA)

HURT AJA)

SNYDERS AJA)