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D E C I S I O N
of 13 January 2000

Case Number: T 0323/98 - 3.2.1
Application Number: 86850273.3
Publication Number: 0213101
IPC: B21J 15/04, B25B 21/00

Language of the proceedings: EN

Title of invention:

A tool, especially for drawing of blind rivets provided with upsetting pins, but also for drilling and screw driving

Patentee:

Nordström, Curt, et al

Opponent:

SFS Stadler Befestigungs- und Umformtechnik AG

Headword:

-

Relevant legal provisions:

EPC Art. 123(2), (3)

Keyword:

"Addition of subject-matter (no)"
"Extension of scope (no)"

Decisions cited:

-

Catchword:

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Boards of Appeal

Chambres de recours

Case Number: T 0323/98 - 3.2.1

D E C I S I O N
of the Technical Board of Appeal 3.2.1
of 13 January 2000

Appellant: Nordström, Curt et al
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Respondent: SFS Stadler Befestigungs- und
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Decision under appeal: Decision of the Opposition Division of the
European Patent Office posted 30 January 1998
revoking European patent No. 0 213 101 pursuant
to Article 102(1) EPC.

Composition of the Board:

Chairman: F. Gumbel
Members: S. Crane
J. van Moer

Summary of Facts and Submissions

- I. European patent No. 0 213 101 was granted on 27 April 1997 on the basis of European patent application No. 86 850 273.3.

Claim 1 of the granted patent reads as follows:

"A tool for drawing blind rivets provided with upsetting pins, comprising an inner sleeve (3) attached to a driving axle (2) of a manual driving tool (1), an outer mantle (5) surrounding the inner sleeve (3), a nozzle (8) attached to the end of the outer mantle (5) facing away from the driving axle (2) and having a through hole (9) for receiving the upsetting pin of a rivet, and a drawing device (10, 12) inside of the nozzle (8) for grasping the upsetting pin of the rivet, said drawing device comprising two conical chucks (12) and a drawing member (10) surrounding these,

characterised

- in that the drawing member (10) is provided with an external threading (11) adjacent the inner sleeve (3),
- in that the inner sleeve (3) is provided with an internal threading adapted to engage the external threading (11) of the drawing member (10),
- in that the inner sleeve (3) is rotatable in relation to the outer mantle (5) such that rotation in a first direction of rotation of the inner sleeve (3) via the threaded engagement with drawing member (10) causes axial displacement of the drawing member (10) towards the driving axle (2) thereby causing the chucks (12) to grip and draw along the rivet upsetting pin, whereas

rotation in the opposite direction of the inner sleeve (3) causes axial displacement of the drawing member (10) away from the driving axle (2), and

- in that the outer mantle (5) is provided with means for preventing rotation of the mantle (5) in relation to the inner sleeve (3) in a first direction of rotation of the driving axle (2) but to allow rotation of the mantle (5) in relation to the inner sleeve (3) in the opposite direction of rotation of the driving axle (2)."

- II. The granted patent was opposed by the present respondents on the grounds that its subject-matter lacked inventive step (Article 100(a) EPC) and that it contained added subject-matter (Article 100(c) EPC).
- III. With its decision posted on 30 January 1998 the Opposition Division revoked the patent. The reasons given in the decision were that granted claim 1 contained subject-matter extending beyond the content of the application as filed (Article 100(c) EPC); that the amendments made to claim 1 according to the main request had extended the protection conferred, in contravention of Article 123(3) EPC; and the amendments according to the subsidiary request again introduced subject-matter which was not initially disclosed (Article 123(2) EPC).
- IV. An appeal against this decision was filed on 23 March 1998 and the fee for appeal paid at the same time.

The statement of grounds of appeal was filed on 28 May 1998. The appellants (proprietors of the patent)

requested maintenance of the patent in amended form on the basis of an amended claim 1 submitted with the statement of grounds, this claim corresponding to claim 1 of the subsidiary request rejected by the Opposition Division.

- V. In a communication posted on 30 March 1999 the Board indicated its provisional view that the amended claim 1 offended against Article 123(3) EPC and was also unclear in a number of respects.

The Board also stated that in the event of a formally admissible claim 1 being filed it intended to remit the case to the first instance in order to allow the latter to complete its examination of inventive step.

- VI. In response to this communication the appellants submitted, with a letter dated 25 May 1999, a new amended claim 1 with the following wording:

"A tool for drawing blind rivets provided with upsetting pins, comprising an inner attached to a driving axle (2) of a manual driving tool (1), an outer mantle (5) surrounding the inner sleeve (3), a nozzle (8) attached to the end of the outer mantle (5) facing away from the driving axle (2) and having a through hole (9) for receiving the upsetting pin of a rivet, and a drawing device (10, 12) inside of the nozzle (8) for grasping the upsetting pin of the rivet, said drawing device comprising two conical chucks (12) and a drawing member (10) surrounding these,
c h a r a c t e r i s e d

- in that the drawing member (10) is provided with an

external threading (11) adjacent the inner sleeve (3),

- in that the inner sleeve (3) is provided with an internal threading adapted to engage the external threading (11) of the drawing member (10),

- in that the drawing member (10) is arranged non-rotatable but axially displaceable in relation to the outer mantle (5),

- in that the inner sleeve (3) is rotatable in relation to the outer mantle (5) such that rotation in a first direction of rotation of the inner sleeve (3) via the threaded engagement with the drawing member (10) causes axial displacement of the drawing member (10) towards the driving axle (2) thereby causing the chucks (12) to grip and draw along the rivet upsetting pin, whereas rotation in the opposite direction of the inner sleeve (3) causes axial displacement of the drawing member (10) away from the driving axle (2), and

- in that the outer mantle (5) co-operates with the manual driving tool (1) to limit and thereafter prevent relative rotation therebetween in a first direction of rotation of the driving axle (2), whereby the inner sleeve (3) rotates with respect to the outer mantle (5) in said first direction, and that the outer mantle (5) and the inner sleeve (3) are provided with co-operating means which limit and thereafter prevent relative rotation therebetween in the opposite direction of rotation of the driving axle (2), whereby the outer mantle (5) and the inner sleeve (3) are then rotated together in said opposite direction."

VII. The respondents made no counterstatement to the statement of grounds of appeal and replied neither to the communication of the Board nor to the above-mentioned letter of the appellants.

Reasons for the Decision

1. The appeal complies with the requirements of Articles 106 to 108 and Rules 1(1) and 64 EPC. It is therefore admissible.

2. Although present claim 1 does not specifically state this, the contested patent is particularly concerned with a tool for use with self-drilling blind rivets. For this purpose it is required that the tool have means for holding and rotating the rivet in a forward drilling and driving direction; when the rivet is in position means are provided for drawing the upsetting pin of the rivet to set it. The tool as described comprises three main element groups. The first is the outer mantle having an end section in which a nozzle is mounted for receiving the upsetting pin of the rivet; the second is the drawing device; the third is the inner sleeve which is attached to a driving axle of a manual driving tool. The inner sleeve is rotatably mounted within the outer mantle and is in threaded engagement with the drawing device which is non-rotatable with respect to the outer mantle.

Although the functioning of the tool is not particularly clearly and fully described on page 4 of the original application, this can be derived by reference to general engineering principles and has

been accurately summed up in the communication of the Opposition Division dated 3 July 1996 (see point 15). Of special note is that in a first direction of rotation of the driving axle the rear end of the outer mantle is moved axially into engagement with the front end of the driving tool, preventing further relative rotation therebetween; the inner sleeve is thus rotated with respect to the outer mantle and the drawing device and by virtue of its threaded engagement with the latter displaces it axially to set the rivet. In the opposite direction of rotation of the driving axle the inner sleeve, via the drawing device, moves the outer mantle in the opposite axial direction to engage a shoulder at its rear end with the end of the inner sleeve and thus prevent further relative rotation therebetween; as a consequence the inner sleeve, outer mantle and drawing device all rotate together. In this direction of rotation a self-drilling rivet inserted in the nozzle carried by the outer mantle can be driven into the workpiece.

The objection under Article 100(c) EPC with regard to granted claim 1 was to its requirement that the outer mantle "is provided with means for preventing rotation of the mantle in relation to the inner sleeve" in one direction of rotation of the driving axle. However, as explained above, it is apparent that when the tool is to be used for driving a self-drilling rivet, the outer mantle and the inner sleeve, after a small initial amount of relative rotation, indeed lock together for joint rotation, further relative rotation between them being prevented by means provided on the outer mantle cooperating with means provided on the inner sleeve, these means being as particularly described respective

abutment surfaces. It follows from this, given the very broad ambit of the term "means for preventing rotation", that the reference in granted claim 1 to the outer mantle being provided with such means is an incomplete, but not as such incorrect, statement of the technical state of affairs derivable from the original application. Thus, although the Board takes the view that this feature of granted claim 1 cannot be objected under Article 100(c) EPC to as being a plain addition of subject-matter in the sense that it had no counterpart whatsoever in the original disclosure, it is nevertheless open to the criticism of being an inappropriate intermediate generalisation therefrom and as such objectionable under this provision. This objection has however now been remedied by the amendments made to the present claim 1 in which it is made clear that the outer mantle and the inner sleeve are provided with co-operating means which limit and thereafter prevent relative rotation therebetween in the direction of rotation of the driving axle opposite to that in which the rivet is set. It is self-evident from the above considerations that this amendment is derivable from the original application and therefore conforms with Article 123(2) EPC. Also, since granted claim 1 is not to be understood as requiring that the "means" provided on the outer mantle are exclusively responsible for preventing relative rotation between it and the inner sleeve, it is apparent that the amendment does not offend against Article 123(3) EPC.

A second amendment made to present claim 1 is the addition of the requirement that the drawing member is non-rotatably but axially displaceably arranged within the outer mantle. This feature, clearly originally

disclosed and essential to the functioning of the claimed tool, has been added to meet the requirements of Article 84 EPC.

The last amendment to present claim 1, leaving aside purely editorial improvements, brings into line the designations of the first and opposite directions of rotation of the driving axle mentioned in the last sub-paragraph of the claim with the equivalent first and opposite directions of rotation of the inner sleeve mentioned in the penultimate sub-paragraph of the claim, thus removing an obscurity present in the granted claim.

3. Since the Opposition Division has not yet completed its examination of the question of invention step, the Board makes use of its discretion under Article 111(1) EPC to remit the case for further prosecution.

Order

For these reasons it is decided that:

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

The Registrar:

The Chairman:

S. Fabiani

F. Gumbel