

COMMISSIONER'S DECISION

INSUFFICIENT CLAIM - S. 36(2): Fail to Distinguish the Prior art.

The Final Action refused one of several conflict claims under S. 45(4). The principle of using "pivotal action joints" to provide for "hinging" of the two frame sections of a rectangular railway truck frame on a diagonal axis, using rubber bushings sufficiently non-resilient to permit hinging without noticeable loss of rectangular tram was shown in the citation. The limitation in the claim using "non-resilient" means instead of the rubber bushings, to permit hinging of the frame sections while maintaining rectangular tram, held not to distinguish unless limited to a "non-resilient ball-joint type" hinge means.

FINAL ACTION: Affirmed; amendment permitted.

This decision deals with a request for review by the Commissioner of Patents of the Office letter written under Section 45(4) of the Patent Act dated March 13, 1973 on application 944,834, to determine whether the Commissioner of Patents ought to refuse the claims under Section 42 of the Patent Act during conflict proceedings. This application was filed on November 8, 1965 in the name of Gustav B. Sundby and refers to "Railway Trucks". The Patent Appeal Board conducted a Hearing on January 16, 1974 at which Mr. R.D. McKenzie represented the applicant.

The present application relates to a frame assembly for railway-car trucks. The assembly includes a pair of side frames and a pair of cross members or transoms extended therebetween. One end of each of the cross members is rigidly secured to the frame, the other end is connected to the frame by means of a universal joint at diagonally opposed points. This allows pivoted movement about the diagonal axis passing through the center of each bearing present at the universal joint.

In the prosecution terminated by the Office letter claim C1 was refused for failing to distinguish patentably over a patent to Rossell, and for being indefinite.

The Office letter stated in part:

Reference Re-Applied

United States Patent
2,976,819 Mar. 28, 1961 Cl. 105-138 Rossell

Conflicting claim C1 is again rejected in view of the patent identified above.

...

The applicant must reply to this letter and either cancel the rejected claim C1 or show how their subject matter is patentably different from the subject matter of the reference. In this regard applicant may rely on his arguments as presented in his October 16, 1972 letter or he may provide a new presentation of argument.

If an argument is presented that the subject matter of the rejected conflicting claims is patentable, the patentability of such claims will be reviewed by the Patent Appeal Board before a final decision is made by the Commissioner. In view of this, the applicant should submit a full statement of his reasons why the cited prior art is not pertinent, and if an oral hearing is desired before the Patent Appeal Board such must be requested within the time limit of 3 months set for response to this letter.

The applicant in response to the Office letter dated June 13, 1973 stated in part:

As mentioned in the response of October 16, 1972 claim C1 calls for first and second independent non-resilient means for so connecting the first same section to the second same section as to permit vertical displacement of any one of the wheels relative to the remaining wheels while substantially maintaining said side frames substantially in rectangular tram and substantially preventing lateral tilting of said side frames.

This feature of the present invention is not taught by the Rossell Patent, which discloses an assembly including rubber bushings 5. The rubber bushings cannot be said to be non-resilient. This is the essence of the argument advanced in the response of October 16, 1972, and nothing further is being added to such argument at present.

As to the reasons why the cited prior art is not pertinent reference is made to the response of October 16, 1972.

The question to be decided is whether the subject matter of claim C1 defines explicitly the advance in the art alleged to have been made over the reference to Rossell. Claim C1 reads:

A vehicle truck assembly, comprising:

- (a) a first frame section comprising a first side frame and a first transom rigidly fixed to said first side frame and extending laterally therefrom;
- (b) a second frame section comprising a second side frame and a second transom rigidly fixed to said second side frame and extending laterally therefrom;
- (c) the transoms of said first and second frame sections being spaced from each other longitudinally of said truck;
- (d) wheel and axle assemblies journaled in said frame sections at opposite ends of the truck and providing wheels at locations corresponding generally to the four corners of said truck;
- (e) first and second independent non-resilient means for so connecting said first frame section to said second frame section as to permit vertical displacement of any one of said wheels relative to the remaining wheels while substantially maintaining said side frames substantially in rectangular tram and substantially preventing lateral tilting of said side frames;
- (f) said first and second connecting means comprising means confining the relative movement between said first and second frame sections to an axis extending diagonally across said truck adjacent the ends of said first and second transoms.

The reference to Rossell discloses a railway-car truck assembly having independent side frames connected so as to give diagonal flexibility. The assembly includes a pair of side frames, and a pair of cross members or transoms extended therebetween. One end of each of the cross members is rigidly secured to the frame, the other end is connected to the frame by means of a flexible connection at diagonally opposed points. This allows pivotal movement about the diagonal axis passing through the center of the flexible connection. Claim 1 of this patent reads:

A railway truck comprising truck side frames, two spaced cross members connecting said side frames intermediate the ends of said side frames, each of said side frames being resiliently connected to one of said cross members and rigidly connected to the other thereof, said cross members and their connections to said side frames being of sturdy construction and maintaining said side frames in tram, each of said side frames having a circular opening each and thereof, a journal bearing positioned in each of said circular openings and separated from the walls thereof by a ring of rubber, and axles connecting said journal bearings in pairs.

The flexible connector shown in the drawings of Rossell is composed of a cylindrical end piece 6 aligned with the cross member 2 in a cylindrical bushing 5 and attached to the frame by a cylindrical portion including cap 8, and all of these cylindrical elements are centered on a common axis at a right angle to the fore-and-aft direction. However, the hinge axis in Rossell is about 40° to the cross member 2 in a diagonal direction. When one wheel lifts or drops at a track joint, the other three wheels do not lift or drop. The end piece 6 angles out of alignment with the cap 8 because of the resilience of the rubber bushing. The piece 6 then rotates slightly relative to the cap 8 by straining the rubber bushing 5 in torsion.

From a consideration of claim C1 it is noted that parts a, b, c, d, and f read directly on the reference to Rossell. Part "e" is the only feature which distinguishes over the reference. The applicant utilizes a "non-resilient means," whereas Rossell employs a "resilient means". Consequently we must determine whether the "non-resilient means" of the applicant defines explicitly the alleged advance in the art.

The applicant stated in response to the Office letters that he would rely on the arguments presented in his response of October 16, 1972 for his reasons as to why the cited prior art is not pertinent.

In that response he argued that Rossell's truck bushing would permit more than "the maximum acceptable movement of the side frames of the truck out of tram." The applicant did not indicate the source of his figure that this movement should exceed 1/16 of an inch, nor in what manner that figure should be applied. An acceptable out-of-tram dimension appears to be a larger figure than that for the most commonly used truck, in which type the two side frames are aligned

by a vertically slidable bolster. For example, pages 951 and 952 of the nineteenth edition of "Car Builder's Cyclopedia" reproduces the A.A.R. standards for car trucks. The standards show that the variation in wheel base from one side of a truck to the other can be more than 1/16 of an inch. The tolerance in the distance between column guide surfaces can be 1/8 of an inch. The minimum clearance between the axle box and the pedestal jaws is 1/8 of an inch. The applicant's figure of 1/16 of an inch for out of tram, which must be the result of all clearances and permitted dimension tolerances, cannot be accepted as persuasive. Nor are there any proven facts which evoke disbelief in Rossell's statement at lines 16 and 17 of column 2 of the patent that, "The bushings 5 have slight resiliency, insufficient to permit a noticeable loss of tram." The inventor also discussed this point in his affidavit, filed November 15, 1973. It is agreed, however, that the bushing must be sufficiently resilient to permit diagonal flexibility, but insufficient to permit a noticeable loss of tram.

The applicant has also argued that the frames of the Rossell truck cannot be maintained in tram because "the rubber bushings 5 in Rossell's truck must have sufficient resilience to accommodate irregularities in the track...." Applicant is obviously assuming that the movement of the cross-members 2 is vertical or radial at the bushing when a wheel moves up or down to follow track irregularities. This argument appears to ignore the Rossell disclosure, lines 16 to 20 of column 2, which describes the same kind of hinging action which the applicant describes as a pivotal motion. That is, the action is almost entirely one of relative rotation at the joint between Rossell's cross-member 2 and his frame 1 which provides a diagonal hinge axis passing through the two resilient joints.

Finally, the applicant argued that the "statements of expected result" mentioned in the last four lines of part "e" of claim 1 were definitions of non-resilient means. The applicant did not provide any argument to support his allegation that the operative words are in fact definitive. The operative terms from part "e" read: "... means for so connecting said first frame section to said second frame section as to permit vertical displacement of any one of said wheels relative to the remaining wheels while substantially maintaining said side frames substantially in rectangular tram and substantially preventing lateral tilting of said side frames." These terms, however, are clearly recognizable as those commonly used to describe an action, but in the instant circumstances they describe the known result provided by Rossell.

Of significance in the present determination is the rationale of the Court in Cluett Peabody & Co. Inc. v. Dominion Textiles Co. Ltd. (1938) Ex.CR. 47 at 79 wherein Maclean J. stated:

It has been well and concisely stated in the text book, Terrell on Patents, that inventions may be divided roughly into two classes in respect to subject-matter. First, there is that kind of invention which consists in the discovery of a method of application of a new principle- here what has been invented is in effect the new principle, and, generally speaking, the Court will regard jealously any other method embodying that principle, for the patentee was not bound to describe every method by which his invention could be carried into effect. Second, there is that kind of invention which consists in some particular new method of applying a well known principle, and in this case the use of other methods is not contemplated by the patentee, and should not be included within the ambit of his claim. That describes an accepted doctrine in patent law....A patent for carrying a principle which is new into effect protects the grantee against all other modes of carrying that principle into effect. (underlining added).

The new principle referred to in the above case related to a method of treating fabric to prevent shrinkage.

From a study of the cited prior art to Rossell it is found that the broad principle or idea of "a pivotal action joint" is known.

Rossell discloses a railway-car truck having a pair of transoms each rigidly connected at one end to one frame and pivotly connected at its other end to the other frame to provide a diagonal hinging action.

In our view this application involves that kind of invention which consists in some particular new mode of applying a known principle, and in this case the use of other modes is not contemplated by the inventor, and should not be included in the ambit of his claim.

Also of interest is the rationale of the court in Mecro Nordstrom Valve Co. v. Comer (1942) Ex.C.R. 138 at 148 wherein Maclean J. stated:

The claims here are directed to the combination only and they are only for an improved method of attaining on old object, in which case the use of other methods is not contemplated by the patentee, and the monopoly is limited to the particular mode described.

In our view while a patentable advance may have been made in the art, the contribution to the art, however, does not justify the scope of monopoly covered by claim C1. In the circumstances therefore any allowable claim must be restricted to the particular mode described, i.e. a non-resilient ball-joint type connector.

Vide, Cluett Peabody v. Dominion Textiles, supra.

The Board is satisfied that claim C1 is unduly broad, and does not distinctly define the real advance made in the art, taking into consideration both Section 36(2) of the Patent Act and the known concept disclosed in Rossell.

The Board therefore recommends that the decision in the Office letter refusing claim C1 be upheld. The Board also recommends that an amendment to claim C1, along the guidelines set out herein, be considered acceptable as overcoming the particular objections made. Such a claim should, however, be subject to further examination for other objections. Consideration will have to be given, for example, to whether as amended claim C1 is substantially the same as C3.



J.F. Hughes,
Assistant Chairman,
Patent Appeal Board.

I concur with the findings of the Patent Appeal Board. Accordingly, I refuse to allow claim C1, but will accept an amended claim C1 drawn in accordance with the suggested guidelines and subject to further examination. The applicant has six months within which to amend or cancel claim C1, or appeal this decision under the provisions of Section 44 of the Patent Act.

Decision accordingly,



A.M. Laidlaw,
Commissioner of Patents.

Dated and Signed in
Hull, Quebec this
8th of February, 1974.

Agent for Applicant

Marks & Clerk,
Ottawa, Ontario.