

same practical result which we have reached. The judgment of the circuit court is reversed, and the case is remanded to that court, with directions to set aside the verdict and to proceed thereafter according to law, unless the plaintiff below shall, within such time as that court may direct, remit all damages in excess of one dollar; and the costs in this court are awarded to the plaintiff in error.

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SANDWICH ENTERPRISE CO. et al. v. JOLIET MFG. CO.

(Circuit Court of Appeals, Seventh Circuit. January 3, 1899.)

No. 510.

PATENTS—CLAIMS CONSTRUED—IMPROVEMENTS IN CORN SHELLERS.

The Gillet patent, No. 247,388, for improvements in corn shellers, which describes a device for separating the shelled corn from the cobs and husks, consisting of a combination in an elevator of movable combs with loose rods hinged at their lower ends, is novel and discloses patentable invention only in having the rods hinged or movable at their lower ends, and is not infringed by a machine in which the rods are rigidly attached at their lower ends to a cross-bar.

Appeal from the Circuit Court of the United States for the Northern District of Illinois, Northern Division.

This was a suit in equity, brought by the Joliet Manufacturing Company against the Sandwich Enterprise Company, J. L. Rodgers, E. Doan, H. N. Woodard, S. F. Sedgwick, A. D. Wallace, and William Radley for the infringement of a patent. From a decree for complainant, defendants appeal.

John R. Bennett, for appellants

J. W. Munday, for appellee.

Before WOODS and JENKINS, Circuit Judges, and BUNN, District Judge.

BUNN, District Judge. This is a suit brought for the infringement of letters patent No. 247,388, granted to Louis Gillet, September 20, 1881, for improvements in corn shellers. There was a decree in favor of the complainants in the court below sustaining the validity of the patent, finding infringement by defendant, and granting an injunction. The appeal is from this decree, the alleged grounds of error being that the court erred in finding in favor of the validity of the patent and in finding infringement by the defendant. There are four claims in the patent, only three of which are in suit. These claims are as follows:

"(1) In a corn sheller, the combination of a screen of loose rods with movable comb-shaped cob carriers, which support said rods between their teeth, substantially as specified. (2) The combination of the combs, endless chains, sprocket wheels, and screen composed of loose rods, substantially as specified. (3) The combination of the movable combs with the loose rods hinged at their lower ends, whereby the rods are given a slight quiver or motion, for the purpose of better separating the corn from the cobs and husks, substantially as specified."

This device for separating the corn from the cobs and husks is more particularly described in the patent as follows:

"The separator or mechanism for separating the corn from the cobs and husks consists of a screen or series of loose rods, d, hinged at their lower ends to the transverse rod, d<sup>1</sup>, and resting freely upon the comb-shaped cob carriers, d<sup>2</sup>, between the teeth thereof, the teeth serving at the same time to keep the rods parallel to and equi-distant from each other. The upper ends of the rods, d, are curved downwards, as shown at d<sup>3</sup>, so that when the combs pass over the sprocket wheels, d<sup>4</sup>, the teeth will project the cobs well into the second separator or cob carrier, D, by which the cobs are conveyed to the cob elevator, B<sup>1</sup>. The combs, d<sup>2</sup>, are riveted or otherwise secured at each end to corresponding links of the two endless chains, d<sup>5</sup>, one on each side of the separator, the chains being carried upon and driven by the sprocket wheels, d<sup>6</sup>. The upper ends of the rods, d, are entirely free, being simply supported by the combs as they are carried along on the endless chains, d<sup>5</sup>, the teeth of the combs serving to keep the rods apart and in place, and to clean out and keep open the space between the rods, so that the shelled corn will readily drop through the screen, as well as to carry away the cobs and husks. By this arrangement, as the screen is always kept perfectly clean by means of the combs, and as the rods are also loose and slightly movable under action of the moving combs, the corn is very thoroughly separated from the cobs and husks without the necessity of giving to the screen any shaking or vibratory motion, as has heretofore been usually done. By thus dispensing with this vibratory or shaking motion, I am on that account enabled to run the whole machine at a much greater speed; thus not only increasing the capacity of the machine, but also its efficiency. I also thus avoid the wear and tear of the machine due to the vibration of the entire structure, caused by the shaking motion of the separator. The rods, d, I prefer to make round, as that shape is better adapted to allow the corn to fall through the screen. The corn, after it falls through the screen, drops down upon the inclines, EE<sup>1</sup>, and then into the screw conveyor, C<sup>5</sup>, whence it passes to the corn elevator, B<sup>2</sup>, which is provided with a movable spout, B<sup>3</sup>, for delivering the corn."

It is apparent from the many patents for threshers and corn shellers introduced in evidence by the defendant that Gillet was by no means a pioneer in the art, or even a radical improver; and, if the patent can be sustained, it can only be by giving it a construction which shall confine the complainants to the particular mechanism and structure set forth in the patent. It is in evidence that corn shellers and grain threshers have been patented and in common use for many years, operating substantially in the same manner as the complainants', except in one particular, which relates to the manner of constructing and arranging the screen or series of rods through which the corn is dropped and is separated from the cobs and husks which are being carried away by the moving screen in its ascending course. The specifications in the patent provide that these rods shall be hinged at their lower ends to a transverse rod. The third claim in terms makes this a requisite. The first and second claims do not, in terms, require this particular construction, but we think, as interpreted in the light of the specifications and drawings, they do require it. "Fast" and "loose" are relative terms, and might mean one thing in one place and quite another thing in another place; but in this case the patentee has clearly and succinctly defined what he means by making the rods loose. His rods, forming the sieve or screen, are to be wholly loose at their upper ends, where they are bent over, and loosely affixed to a cross-rod or pintle at their lower end by means of a hinged joint, which will allow a lateral movement from one side to the other of the space between the teeth of the iron comb where the rods are placed. This arrangement was different from anything that had appeared in any thresher or corn sheller up to that time.

The idea seemed to be a good one. At least it was new, and might prove valuable, and probably the mechanism which Gillet devised to effectuate it was patentable. That idea seemed to be to make the rods free, both in their lateral and up and down movement, by leaving them entirely free at the upper ends, and free within a certain space at the lower ends, depending wholly on the teeth of the combs to keep the rods apart and in place, and to clean out and keep open the space between the rods, so that the kernels of corn as they came from the cob would readily drop through the screen, leaving the husks and cobs to be carried away. By this arrangement, as specified in the patent, the screen was kept clean by means of the combs, and the looseness of the rods at both ends allowed them to be movable under the action of the moving screens, thus shaking the corn through the screen, and enabling the operator to dispense with the vibratory or shaking motion of the shoe which had before been used in some of the machines, thus increasing the speed, capacity, and durability of the machine. This was the improvement which Gillet effected, but his assignees, the complainants, in their manufacture of machines, seem to have abandoned the idea of having the rods constituting the screen loose at both ends, as designed in the patent, and are making them fast and immovable at their lower ends, precisely as defendant is doing in its manufacture. Why they have so departed from the patent under which they profess to be manufacturing does not appear. They no doubt had a right to change their manufacture, but it is not so easy to change the patent. If their patent was like their manufactured machines, one of which has been brought into court as an exhibit by the defendant, it is quite evident that the defendant's machine, being substantially like it, would involve an infringement, except for the fact that several of the patents so introduced in evidence, and which were long prior to complainants', present the same thing. The only way in which the complainants' patent can be differentiated from the prior art is by the device for leaving both ends of the wires constituting the screen loose in the manner substantially as stated in the specifications of the patent. The complainants' expert admits—as he must—that the Gillet patent in each of the three claims sued upon requires the lower ends of the wires to be hinged, and they are so shown in the patent and drawings, but he thinks that the defendant's method of attaching the wires by running them through a solid iron, and riveting them down on the under side, making the wires at one end wholly immovable, is the equivalent of the device in the patent which leaves them loose by stringing them upon an iron rod or pintle which allows free lateral movement at the lower end, and something of a vertical one as well; and the circuit court seems to have adopted that view. This, we think, was error. The only possible way the complainants' patent can be sustained is by confining it to the particular improvement and structure set out in the patent. By giving it a construction which would cover the defendant's machine it is brought within the scope of several old patents, which have long ago expired, and the inventions covered by them become public property. The court below, in its opinion, says a piece of leather, or a piece of tough flexible wood, or even metal, may serve to some extent the purposes and function of a hinge. This is, no doubt,