the specification and claims would have to be read as addressed to the dyer rather than to the skein-maker. This would involve a complete change of what was covered by the specification and claims, which must be held controlling.

The most that can be said of this Grant patent is that it is a discovery of a new use for an old device which does not involve patentability However useful the nature of the new use to which the skein is sought to be confined by the disclaimer, compared with the former uses to which the old skein was applied at the date of the improvement, it forms only an analogous or double use, or one so cognate and similar to the uses and purposes of the former cross-reeled and laced skein as not to involve anything more than mechanical skill, and does not constitute invention, as is well settled by authorities already referred to.

The advantages claimed for it, and which it no doubt possesses to a considerable degree, cannot be held to change this result, it being well settled that utility cannot control the language of the statute, which limits the benefit of the patent laws to things which are new as well as useful. The fact that the patented article has gone into general use is evidence of its utility, but not conclusive of that and still less of its patentable novelty. *McClain* v *Ortmayer*, 141 U S. 419, 425, and authorities there cited.

Our conclusion is that there was no error in the decree of the court below, and the same is accordingly

Affirmed.

KREMENTZ *v.* THE S. COTTLE COMPANY.

APPEAL FROM THE CIRCUIT COURT OF THE UNITED STATES FOR THE SOUTHERN DISTRICT OF NEW YORK.

No. 161. Argued and submitted March 23, 1893. — Decided April 10, 1893.

Letters patent No. 298,303, issued May 6, 1884, to George Krementz for a new and improved collar button, protect a patentable invention, which was not anticipated by the invention described in letters patent No. 171,882

issued to Robert Stokes January 4, 1876, nor by the invention described in letters patent No. 177,253, issued May 9, 1876, to John Keats.

When the other facts in the case leave the question of invention in doubt, the fact that the device has gone into general use, and has displaced other devices which had previously been employed for analogous uses, is sufficient to turn the scale in favor of invention.

IN EQUITY to restrain the infringement of letters patent. Decree dismissing the bill, from which plaintiff appealed. The case is stated in the opinion.

Mr Louis C. Raegener and *Mr Charles E. Mitchell* for appellant.

Mr Edwin H. Brown, for appellee, submitted on his brief.

MR. JUSTICE SHIRAS delivered the opinion of the court.

This is an appeal from a decree of the Circuit Court of the United States for the Southern District of New York, dismissing a bill filed to restrain the infringement of letters patent of the United States, No. 298,303, granted May 6, 1884, to George Krementz, of Newark, New Jersey, for a new and improved collar button.

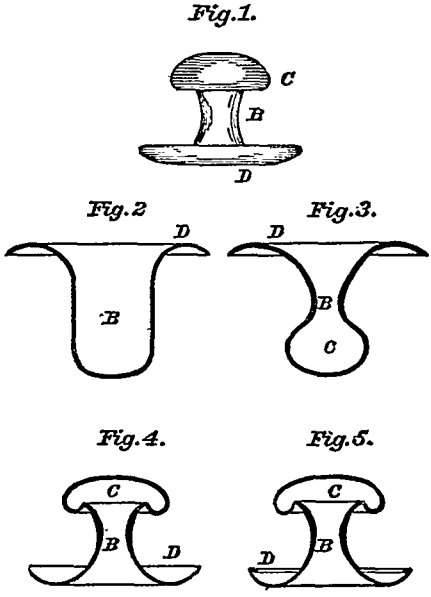
Complainant's evidence, tending to show that the collar button made by the defendants was within the claim of the patent in suit, and constituted an infringement, was not contradicted or disputed, but it was held by the court below that the patent was invalid for want of novelty 39 Fed. Rep. 323.

In his specification the patentee states that his invention consists in a collar button having a hollow head and stem, the said button being formed and shaped out of a single continuous plate of sheet metal. The method or process of making the button is thus described.

"By means of suitable dies a metal plate is pressed into the shape shown in Figure 2 — that is, the plate is provided with a hollow stem, B, the sides of which are pressed together at about the middle, in some suitable manner, to form a head, C, at the end of the stem, as in Figure 3, then the head is pressed toward the base plate or back, D, whereby the head will be upset, and will have the shape shown in Figures 4 and 5. By

this operation the head is hardened. The base plate or back, D, is then rounded out and finished, and its edge is turned over, as shown in Figure 5."

In the accompanying diagram Figure 1 is a side view of the completed button. Figures 2, 3, 4 and 5 are cross-sectional elevations of the same in the different stages of the operation of making it.



The advantages attributed to the invention are the doing away with soldered joints, the lightness of the hollow stem and head as compared with buttons having solid stems and head, and the cheapness arising from the use of less material, with equal or superior strength, which, when gold is used, is quite appreciable.

The learned judge in the court below contented himself with comparing Krementz's invention with two earlier patents, one to Stokes, No. 171,882, granted January 4, 1876, and one to Keats, No. 177,253, granted May 9, 1876, in which patents, he thinks, are to be found the special features claimed by Krementz.

The Stokes patent was for an improvement in making a stud fastening known as Thomson's unbreakable busk fastening, and whereby, instead of fastening the parts of the stud together by rivets, the entire busk was made out of one piece of metal, by striking up or raising the stud out of a strip of malleable sheet metal. The structure thus produced is a solid rivet-like and flat head, intended to resist a great strain, and evidently not designed to be used as a collar button where a well-defined round head, adapted to be used where there is no strain, is necessary and essential.

In the Keats process the button is not made of a continuous piece of sheet metal, but has side seams in the post, and ha base plate composed of two separate parts, and the head is open on the under side. It could not be used as a collar button, but is intended to be permanently fastened either to eyelet holes, or to the fabric with which it is connected.

We cannot see in these devices, taken separately or together, an anticipation of the Krementz button. Indeed, the court below concedes that "Krementz was the first to make a stud from a single continuous piece of metal in which the head was hollow and round in shape."

The learned judge was, however, of the opinion that "any competent mechanic, versed in the manufacture of hollow sheet-metal articles, having before him the patents of Stokes and Keats, could have made these improvements and modifications, without exercising invention, and by applying the ordinary skill of the calling."

It is not easy to draw the line that separates the ordinary skill of a mechanic, versed in his art, from the exercise of patentable invention, and the difficulty is specially great in the mechanic arts, where the successive steps in improvements are numerous, and where the changes and modifications are introduced by practical mechanics. In the present instance, however, we find a new and useful article, with obvious advantages over previous structures of the kind. A button formed from a single sheet of metal, free from sutures, of a convenient shape, and uniting strength with lightness, would seem to come fairly within the meaning of the patent laws.

The tools to be used in making the button are not described, but they are not claimed to be new And the method or process of manufacture is described with sufficient particularity to enable any one skilled in the art to follow it. Buttons made of several pieces are liable to break at the soldered joints, and it is stated by an experienced witness that the metal by the process of soldering becomes soft and liable to bend. The different pieces are set together by hand, and are not always uniform or put together truly

The view of the court below, that Krementz's step in the art was one obvious to any skilled mechanic, is negatived by the conduct of Cottle, the president of the defendant company He was himself a patentee under letters granted April 16, 1878, for an improvement in the construction of collar and sleeve buttons, and put in evidence in this case. In his specification he speaks of the disadvantages of what he calls "the common practice to make the head, back and post of collar and sleeve buttons separate, and to unite them by solder." His improvement was to form a button of two pieces, the post and base forming one piece, and then soldering to the post the head of the button as the other piece. Yet, skilled as he was, and with his attention specially turned to the subject, he failed to see, what Krementz afterwards saw, that a button might be made of one continuous sheet of metal, wholly dispensing with solder, of an improved shape, of increased strength, and requiring less material.

It was also made to appear that the advantages of the new button were at once recognized by the trade and by the public, and that very large quantities have been sold.

The argument drawn from the commercial success of a patented article is not always to be relied on. Other causes, such as the enterprise of the vendors, and the resort to lavish expenditures in advertising, may coöperate to promote a large marketable demand. Yet, as was well said by Mr. Justice Brown, in the case of *Consolidated Brake-Shoe Co.* v *Detroit Co.*, 47 Fed. Rep. 894, "when the other facts in the case leave the question of invention in doubt, the fact that the device has gone into general use and has displaced other devices which

had previously been employed for analogous uses, is sufficient to turn the scale in favor of the existence of invention."

Loom Co. v *Higgins*, 105 U. S. 580, 591, was a case where the patented device consisted in a slight modification of existing mechanism, and it was contended that this slight change did not constitute a patentable invention, but this view did not prevail, the court saying

"It is further argued, however, that supposing the devices to be sufficiently described, they do not show any invention; and that the combination set forth in the fifth claim is a mere aggregation of old devices already well known, and therefore it is not patentable. This argument would be sound if the combination claimed by Webster was an obvious one for attaining the advantages proposed, — one which would occur to any mechanic skilled in the art. But it is plain from the evidence, and from the very fact that it was not sooner adopted and used, that it did not for years occur in this light to even the most skilful persons. It may have been under their very eyes, they may almost be said to have stumbled over it, but they certainly failed to see it, to estimate its value, and to bring it into notice. Who *was* the first to see it, to understand its value, to give it shape and form, to bring it into notice and urge its adoption, is a question to which we shall shortly give our attention. At this point we are constrained to say that we cannot yield our assent to the argument, that the combination of the different parts or elements for attaining the object in view was so obvious as to merit no title to invention. Now that it has succeeded, it may seem very plain to any one that he could have done it as well. This is often the case with inventions of the greatest merit. It may be laid down as a general rule, though perhaps not an invariable one, that if a new combination and arrangement of known elements produce a new and beneficial result never attained before, it is evidence of invention. It was certainly a new and useful result to make a loom produce fifty yards a day when it never before had produced more than forty, and we think that the combination of elements by which this was effected, even if those elements were sepa-