D. W. SIMMONS.

Improvement in Carpenters' Gauges.

No. 115,368. Patented May 30, 1871.

Fig. 1.

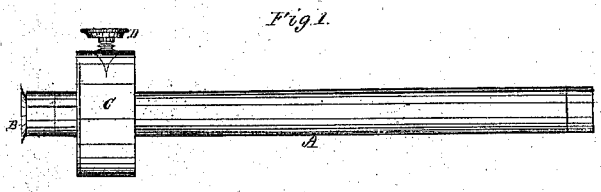


Fig. 2.

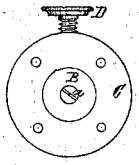
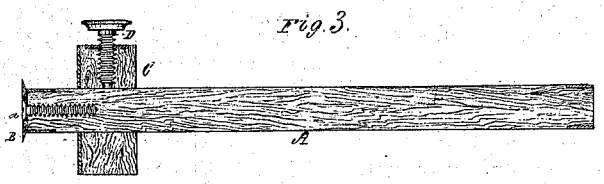


Fig. 3.



Witnesses.

S. N. Piper

L. N. Möller

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by his attorney.

R. Wm. Clay

UNITED STATES PATENT OFFICE.

DANIEL WEBSTER SIMMONS, OF LYNN, MASSACHUSETTS.

IMPROVEMENT IN CARPENTERS' GAGES.

Specification forming part of Letters Patent No. 115,368, dated May 30, 1871.

To all persons to whom these presents may come:

Be it known that I, DANIEL WEBSTER SIMMONS, of Lynn, of the county of Essex and State of Massachusetts, have invented a new and useful Improvement in the Joiner's Gage; and do hereby declare the same to be fully described in the following specification and represented in the accompanying drawing, of which—

Figure 1 is a side elevation, Fig. 2 a front end view, and Fig. 3 a longitudinal section, of a gage made in accordance with my invention.

In joiner's gages as usually constructed the scoring-tool or cutter is inserted and fixed in the stock at a short distance from its end, the part of the stock which extends beyond the scorer or knife frequently rendering it difficult to use the gage in a rebate.

In carrying out my improvement I apply the scorer or knife directly to the end of the stock, and make such knife in the shape of a wheel or disk, and to revolve on a pivot extending from the stock, the edge of the periphery of the wheel or disk-knife being ground sharp and beveled entirely from the outer side of the knife.

In the drawing, A denotes the stock or bar, and B the rotary disk-knife or scorer, the pivot or journal of the latter being shown at *a*. The gage-slide is exhibited at C as applied to the stock in the usual way, and provided with a clamp-screw, D.

The aforesaid new arrangement of the cutter and its form and mode of operation (it revolving on its pivot while in use) renders the implement more durable and advantageous than the common gage, as provided with the stationary cutter.

The cutter, by revolving, maintains its edge sharp longer, and is not liable to become heated while in use so as to draw its temper, as it is constantly presenting a fresh portion of its edge to the wood while drawn along such.

I am aware of the gage shown and described in the United States Patent No. 12,861, granted to F. P. Hart, and make no claim to anything, construction, or arrangement of parts thereof. An important difference between my gage and that of Hart is that the rotary cutter of my gage has the bevel on its edge sloping toward the end of the shank, and no projection extending beyond the outer face of the cutter, such improvement enabling my gage to be used in a rebate, when that of Hart could not be so employed, owing to its journal-screw and nuts being extended beyond the outer face of its cutter, and the edge of the cutter being beveled in a direction contrary to what is the case with that of the rotary cutter of my gage.

I claim, therefore, as my invention—

An improvement in the joiner's gage as made with the stock A, the adjustable slide C, and rotary conic frustum-cutter B, the said cutter, as arranged, with its lesser base against or at the end of the stock, and with its pivot applied so as not to project beyond the outer face or larger base of the cutter, all being as described and represented.

DANIEL W. SIMMONS.

Witnesses:

R. H. EDDY,

J. R. SNOW.