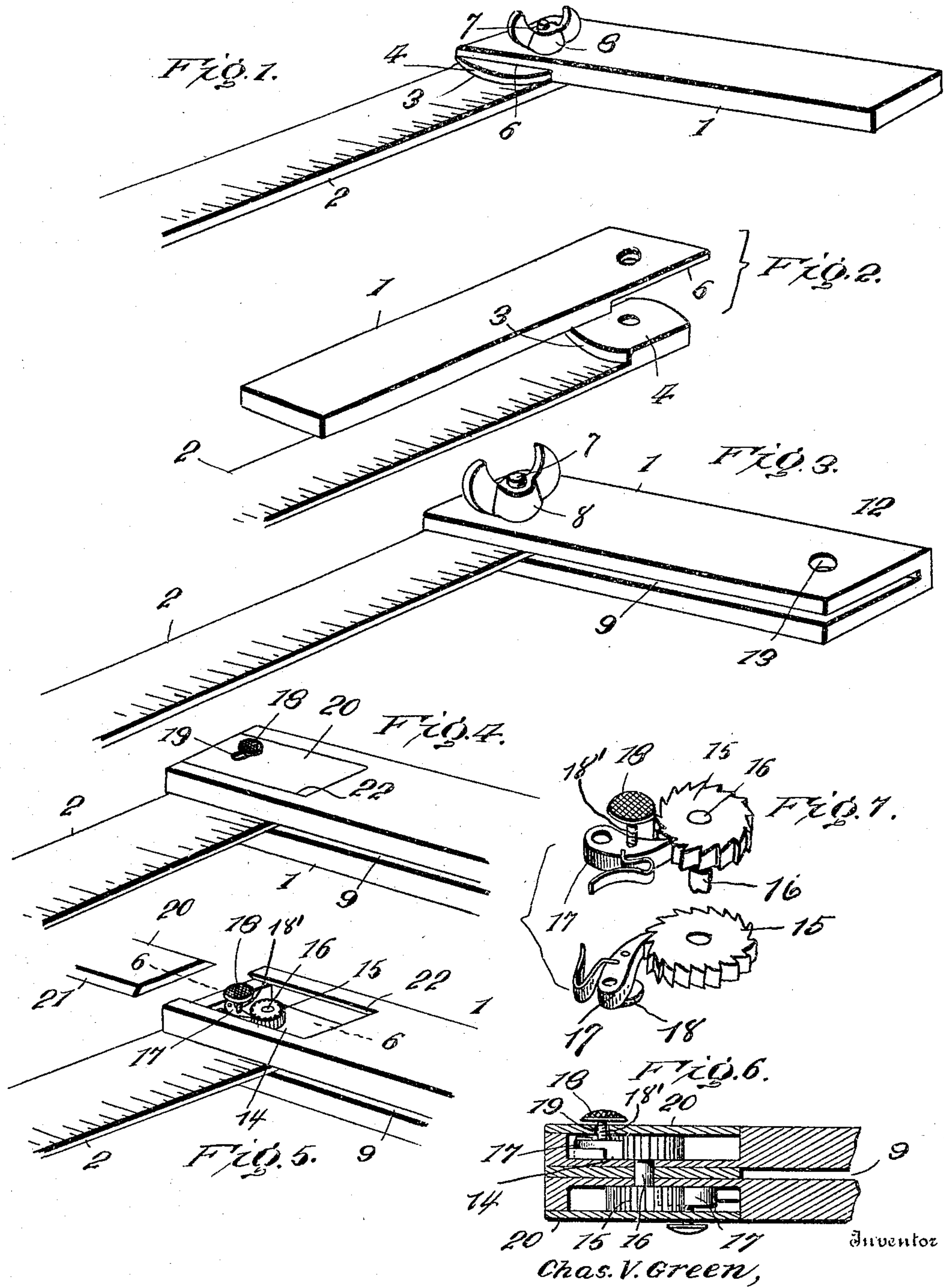


No. 814,690.

PATENTED MAR. 13, 1906.

C. V. GREEN.
COMBINED RULE AND SQUARE.

APPLICATION FILED JUNE 15, 1905.



Witnesses

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COMBINED RULE AND SQUARE.

No. 814,690.

Specification of Letters Patent.

Patented March 13, 1906.

Application filed June 15, 1905. Serial No. 265,380.

To all whom it may concern:

Be it known that I, CHARLES VALENTINE GREEN, a citizen of the United States, residing at Bradford, in the county of McKean and State of Pennsylvania, have invented a new and useful Combined Rule and Square; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

This invention relates to certain new and useful improvements in combined rules and squares; and the object of the invention is to provide a device of this character whereby the blade of the square may be set at various angles.

Furthermore, the invention provides a device of this character which is simple in construction, durable in practice, and comparatively inexpensive in production.

Furthermore, the invention provides a device comprising two sections pivotally connected together, as shown in the drawings and as hereinafter set forth.

The invention comprises, further, other objects and advantages, combinations of elements, and arrangements of parts, which will be hereinafter more fully described and then specifically defined in the appended claims.

The invention is illustrated in the accompanying drawings, which, with the figures of reference marked thereon, form a part of this application, in which drawings—

Figure 1 is a perspective view of the improved combined rule and square in readiness for use. Fig. 2 is a perspective view, showing the parts disassembled. Fig. 3 is a perspective view showing a modification of the improved combined rule and square. Fig. 4 is a perspective view of still another form. Fig. 5 is a view of the form shown in Fig. 4 with the sliding plate removed. Fig. 6 is a sectional view on line 6 6 of Fig. 5; and Fig. 7 is a detail view of the shaft detached, carrying the serrated wheels thereon.

Referring to the accompanying drawings by figure, 1 designates the section which forms the base of the square, and 2 represents the movable section, which may be set at various angles, said section 2 having the usual graduations thereon. Provided upon the section 2, as at 3, is an enlargement 4, which is adapted to be received by the recessed portion 6 in the base portion 1. This enlargement is cir-

cular in plan view, so as to allow the same to close in order that the square can be folded into a small compass. To hold the base-section 1 and the movable section 2 in pivotal relation, a screw 7 is provided, which is inserted through registering apertures in the two sections, one end of said screw having a winged nut 8 for the purpose of adjusting the square at various angles.

In Fig. 3 the base-section 1 is longitudinally recessed, as at 9, for the purpose of receiving the section 2 when the same is closed. In Fig. 3 the screw and winged nut 7 and 8 hold the two sections pivotally together, as shown in Figs. 1 and 2. Also in Fig 3, as at 12, the base-section 1 is provided with an aperture 13 to receive another movable section similar to the section 2, if desired.

In Fig. 4 the base-section is recessed, as at 14, which recess contains serrated wheels 15, which are firmly fixed to a shaft 16. The shaft 16, which firmly moves with the section 2, is provided with one of these serrated wheels at each end thereof, the teeth of which run in opposite directions, and pivotally mounted in each of the recessed portions 14 is a spring-actuated pawl 17, which pawls are provided each with a thumb-piece 18, said thumb-pieces being connected to said pawls by threads 18' upon the shank portions thereof. Said shank portion of each thumb-piece projects through a slot 19 in a plate 20, the edges of which are beveled, as at 21, and adapted to engage a beveled portion 22 of the recess 14. Said plate is adapted to be held in proper position by frictional engagement of the cooperating beveled portions. The plate 20 is for the purpose of giving a neat appearance to the base portion of the square and also to obscure the serrated wheels and spring-actuated pawls from view.

When it is necessary to adjust the movable section 2 in one direction or the other, one of the thumb-pieces mounted upon the spring-actuated pawls is moved away from the serrated wheel, after which the movable section is moved in the direction desired to obtain the requisite angle. Each one of the spring-actuated pawls is operated likewise.

In Figs. 4 and 5 the base portion is also provided with a recess 9, as shown in the other figures, which receives the movable section 2 when the same is closed.

The plate 20 is placed in proper position after the serrated wheels and spring-actuated

pawls are fixed within the said recesses, after which the thumb-pieces are connected to the pawls by the screw-threads upon the shank portions thereof.

5 Of course it is distinctly understood that various changes may be made in the details of construction and combinations of parts other than those illustrated in the accompanying drawings without in any way departing from the spirit and scope of the invention.

Having thus fully described my invention, what I claim as new, and desire to secure by Letters Patent, is—

15 1. A combined rule and square, comprising a base-section having a beveled recess in one end and a movable section, a longitudinal recess in the base-section to receive the movable section, a shaft keyed to the movable
20 section, a serrated wheel mounted at each end of said shaft, adapted to be engaged by spring-pressed pawls, for the purpose of limiting the movement of said wheels to hold the movable section at various angles, a
25 beveled plate to be received by the beveled

portion of the base-section to hide the serrated wheels, substantially as specified.

2. A combined rule and square, comprising a base-section, having a recess adapted to receive a movable section, said sections being
30 pivoted together by a shaft, ratchet or serrated wheels mounted on each end of said shaft, pawls adapted to hold said wheels against rotation, substantially as described.

3. A combined rule and square, comprising a base-section, having a longitudinal recess, a movable section adapted to engage
35 said recess, a rod pivoting the two sections together, ratchet-wheels mounted on each end of said rod, pawls engaging said ratchet-
40 wheels, in opposite directions, plates fitting over said wheels, substantially as and for the purpose described.

In testimony whereof I have hereunto
affixed my signature in the presence of two
45 witnesses.

CHARLES VALENTINE GREEN.

Witnesses:

J. MUSSY,
W. D. MCINTYRE.