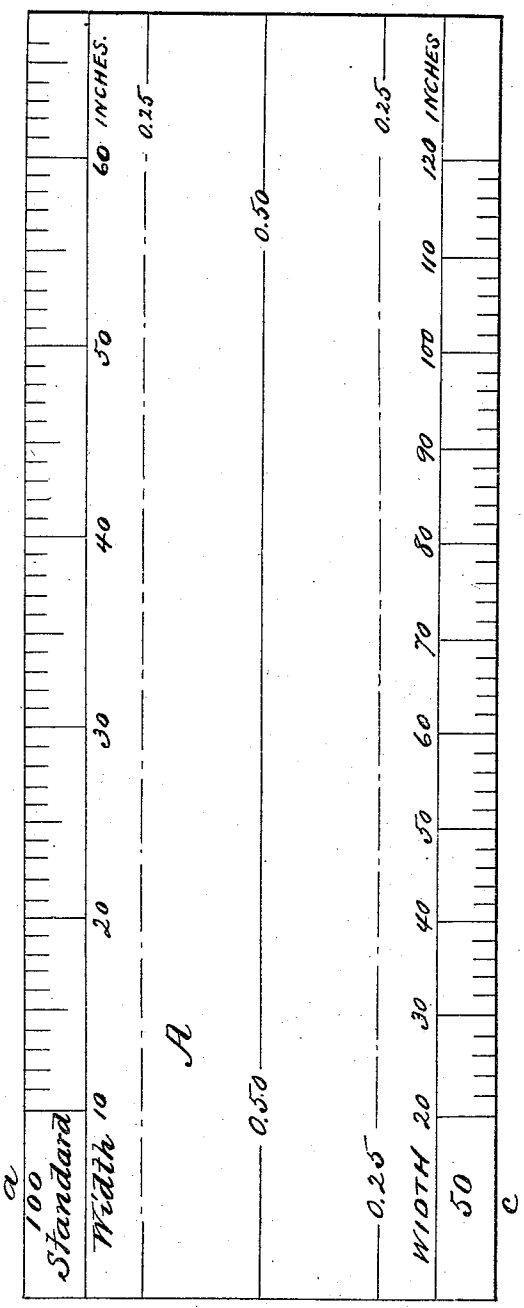
(No Model.)

A. SCHAER.

GRADUATED CLOTH WEIGHT TEMPLET.

No. 543,897. Patented Aug. 6, 1895



Witnesses.
Charles Hannigan.
E. B. Read

Inventor.
Arnold Schaer
by Benj Arnold
Atty.

UNITED STATES PATENT OFFICE.

ARNOLD SCHAER, OF WARREN, RHODE ISLAND.

GRADUATED CLOTH-WEIGHT TEMPLET.

SPECIFICATION forming part of Letters Patent No. 543,897, dated August 6, 1895.

Application filed February 7, 1895. Serial No. 537,572. (No model.)

To all whom it may concern:

Be it known that I, ARNOLD SCHAER, of Warren, in the county of Bristol and State of Rhode Island, have invented certain new and useful Improvements in Graduated Cloth-Weight Templets; and I do hereby declare that the following is a full, clear, and exact description thereof, reference being had to the accompanying drawing, and to the letters of reference marked thereon, which forms a part of this specification.

The object of this invention is to produce a templet or gage so divided by lines that a sample from a roll of cloth cut to a certain dimension indicated by the division on the plate bearing the same number that the cloth is inches in width will give the number of yards per pound of the cloth in the roll by weighing the sample.

The templet, as seen on the drawing, consists of an oblong piece of sheet metal A cut to a given width and divided by lines into spaces on each side or edge, the spaces between the lines on the lower side *c* being equal to each other, but only one-half the width of the spaces on the upper side *a*, marked "standard," which are also equal to each other and are numbered by tens up to sixty or higher. These lines represent the width of the cloth in inches to which the sample belongs that is to be tested—that is, they indicate the length the sample must be cut to for weighing.

For example, a merchant receives a sample of cloth which he is informed is forty inches wide. He takes the sample and cuts it to the width of the plate A and the length from the left end to the line on the *a* side of the plate marked "40." The piece cut to these dimensions is then weighed on grain-scales, and the number of grains the sample weighs—suppose it is twenty grains in this case—is divided into one hundred, the standard number, and the result, five, is the number of yards to the pound that the cloth weighs. The standard number, one hundred, according to the width of the plate and of the spaces between the lines, has been calculated, to produce a given result. If the templet were twice as wide the standard number to divide the number of grains in weight into would be two hundred, and any change in the widths of the spaces between the lines would necessitate a change in the standard number, or a second operation of dividing or multiplying of the result. This is illustrated in the lines on the *c* side of the plate and the proportional lines marked "50" and "25."

Sometimes the sample available is not large enough to cut to the "standard." Then the proportional divisions can be used. For example, if a sample is as wide as the plate, but not long enough to reach the line the width in inches of the cloth requires, it can be cut to the line of the same number on the *c* side of the plate, which are one-half the width of those on the *a* side, and when weighed the weight in grains divided into fifty. If the sample is not so wide as the plate, but is long enough to reach the line of width in inches on the *a* side, it can be cut to the width of the line marked "50" in the middle of the plate. Then the resulting weight can be divided into one hundred and the result divided by two or divided into fifty and the number of yards per pound found.

Other proportional lines marked "25," &c., are made, and it will be readily seen that by use of these lines samples of very small size and most any shape can be utilized.

Of course the full standard size of sample, when it can be had, will give a more accurate result than can be obtained with smaller samples.

Having thus described my improvement, I claim as my invention and desire to secure by Letters Patent—

1. A templet or gage for ascertaining the number of yards to the pound of cloth by weighing a sample, graduated by lines numbered to indicate in connection with the width of the templet the length the sample should be cut to according to the width of the cloth, substantially as described.

2. A templet or gage for ascertaining the number of yards to the pound of cloth by weighing a sample, graduated by lines numbered to indicate in connection with the width of the templet the length the sample should be cut to according to the width of the cloth, and provided with proportional divisions to

utilize small sized samples, substantially as described.

3. A templet or gage for ascertaining the number of yards to the pound of cloth by weighing a sample, graduated by lines numbered to indicate the length the sample should be cut to according to the width of the cloth, and provided with proportional divisions to utilize small sized samples, substantially as described.

ARNOLD SCHAER.

Witnesses:
BENJ. ARNOLD,
E. B. READ.