

C. A. McPhetridge.

Cotton Gin.

N^o 2,068.

Patented Apr. 24, 1841.

Fig. 1.

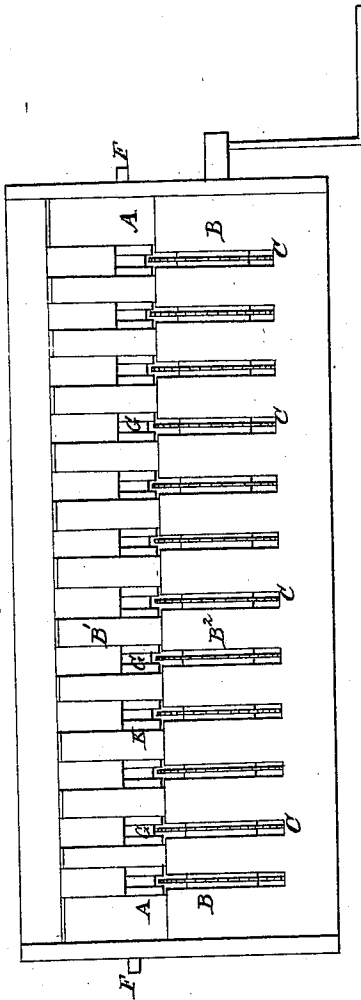


Fig. 2.

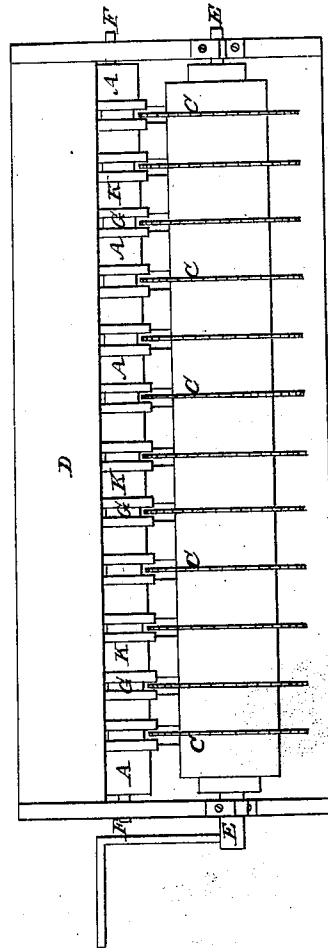
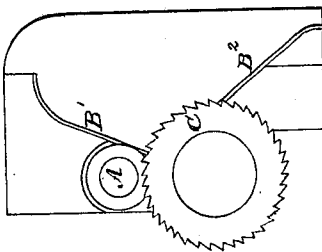


Fig. 3.



UNITED STATES PATENT OFFICE.

C. A. McPHETRIDGE, OF NATCHEZ, MISSISSIPPI.

IMPROVEMENT IN SAW-GINS FOR GINNING COTTON.

Specification forming part of Letters Patent No. 2,068, dated April 2^d, 1841.

To all whom it may concern:

Be it known that I, C. A. McPHETRIDGE, of the city of Natchez, county of Adams, and State of Mississippi, have invented a new and useful Improvement in Cotton-Gins, the description of which is in the following words, reference being had to the annexed drawings, making a part of the same.

Figure 1 is a front section; Fig. 2, a back section; Fig. 3, a cross-section.

Similar letters in the several sections of the drawings refer to similar parts in the specification.

The nature of my invention and improvement consists in a new arrangement of a revolving grooved roller, in the grooves of which the circular revolving saws of the gin revolve, the object being to substitute this grooved roller for the grates in the operation of ginning, which prevents the cutting or otherwise damaging the staple, which it is subjected to by the old arrangement of the permanent grates and revolving saws. It also prevents clashing, and prevents the production of heat or fire by rubbing. The grooved roller lettered A, rests upon each of its gudgeons F horizontally over the saws C. It has as many grooves *e* as there are saws C. The said saws pass into said grooves a suitable distance. In the present case I propose about an inch and a half. This grooved roller is made of metal or any other suitable material. Between each

pair of grooves of the said roller a suitable solidity, K, is left to fit against the bars B' of the grate adjacent. The grate B is made like the ordinary grate for the use of cotton-gins, with this exception, that the inclined part of each bar is wider than the vertical part B', the inclined part B' being arranged between the saws, and the vertical part extending up from the inclined part and passing abreast of the span or solidity K, before mentioned, in the grooved roller. The saws C are made like ordinary saws for the use of cotton-gins, they being inserted into the grooves, as aforesaid, in the roller A.

Operation: The cotton to be operated upon is put on the rack or hopper in front of the saws. By the motion of the saws it is drawn in between the grooves of the rollers, and is taken off by the revolving brush in the rear, as is common in cotton-gins.

What I claim as my invention or improvement, and which I wish to secure by Letters Patent, is—

The peculiar arrangement of the roller, having grooves into which the saws work, in combination with the saws, for the purpose and in the manner specified and set forth.

C. A. McPHETRIDGE.

Witnesses:

WM. P. ELLIOT,
EDMUND MAHER.