To all whom it may concern:

Be it known that I, EZEKIEL GROSS, of Goshen Hill, Union district, and State of South Carolina, have invented certain new and useful Improvements in the Construction of Subsoil-Plows; and I do hereby declare the following to be a full, clear, and exact description of the construction of the same, reference being had to the accompanying drawing, making a part of this specification, and which represents a side view of the plow, with a portion of the beam and one of the handles cut away to show the parts behind them.

My invention consists in the particular manner in which I brace the several parts of the plow to the beam and to each other, so as to make them all rigid and firm, but still admit of adjusting the subsoil-plow as circumstances may require.

To enable others skilled in the art to make and use my invention, I will proceed to describe the same with reference to the drawing.

A represents the beam of the plow, to which the standard B, that carries the ordinary furrow or surface plow, C, is attached in any of the usual ways. In rear of the standard B a mortise is made in the beam to receive the standard D that carries the subsoil-plow E, which is set several inches deeper than the surface or furrow plow C immediately in advance of it.

F F are the handles, secured to the beam at 4, and toward their rear a cross-base, b, supports and strengthens them.

G is a circular brace, which may be united to the beam in front at 4, to the standard B at 5, to the adjustable standard D at 6, to the rear of the beam at 7, and finally to the cross-brace b at 8, so as to hold and brace all these several parts firmly to the beam and to each other.

A key, a, or wedge holds the top of the standard D firmly to the beam A, and at the same time allows said standard to be raised or lowered on the beam, and the center portion of the standard D, in height, is furnished with a series of adjusting holes, 1 2 3, through which the bolt 6 may pass to hold it when adjusted to the circular brace G, and instead of the key or wedge a at its top, there may be a series of adjusting-holes, so that by a pin or bolt it may be adjusted and held to the beam. The portion of the circular brace G that is in advance of the standard B acts like and serves as a false colter, and the rear portion, from the beam to the cross-brace b, may, as it is simply a brace to the handles, be in a separate piece. By this construction I make a very simple, cheap, and effective subsoil-plow.

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

In combination with the furrow-plow and subsoiler, the curved brace uniting the beam, the standards, and the handles together, and when the subsoiler is made adjustable on the brace and beam, substantially in the manner and for the purpose herein set forth and explained.

EZEKIEL GROSS.

Witnesses:
A. B. STOUGHTON,
THOS. H. UPPERMAN.