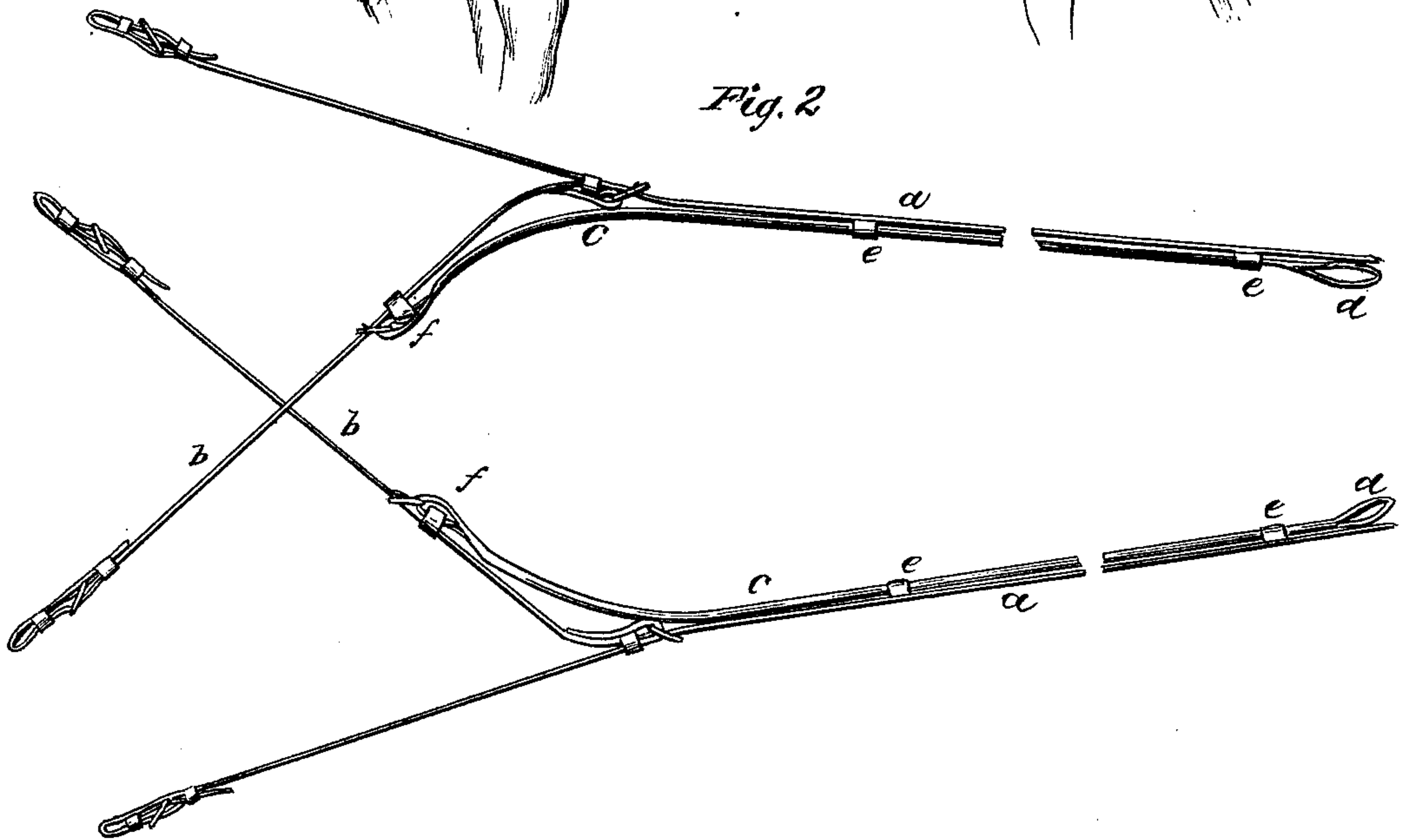
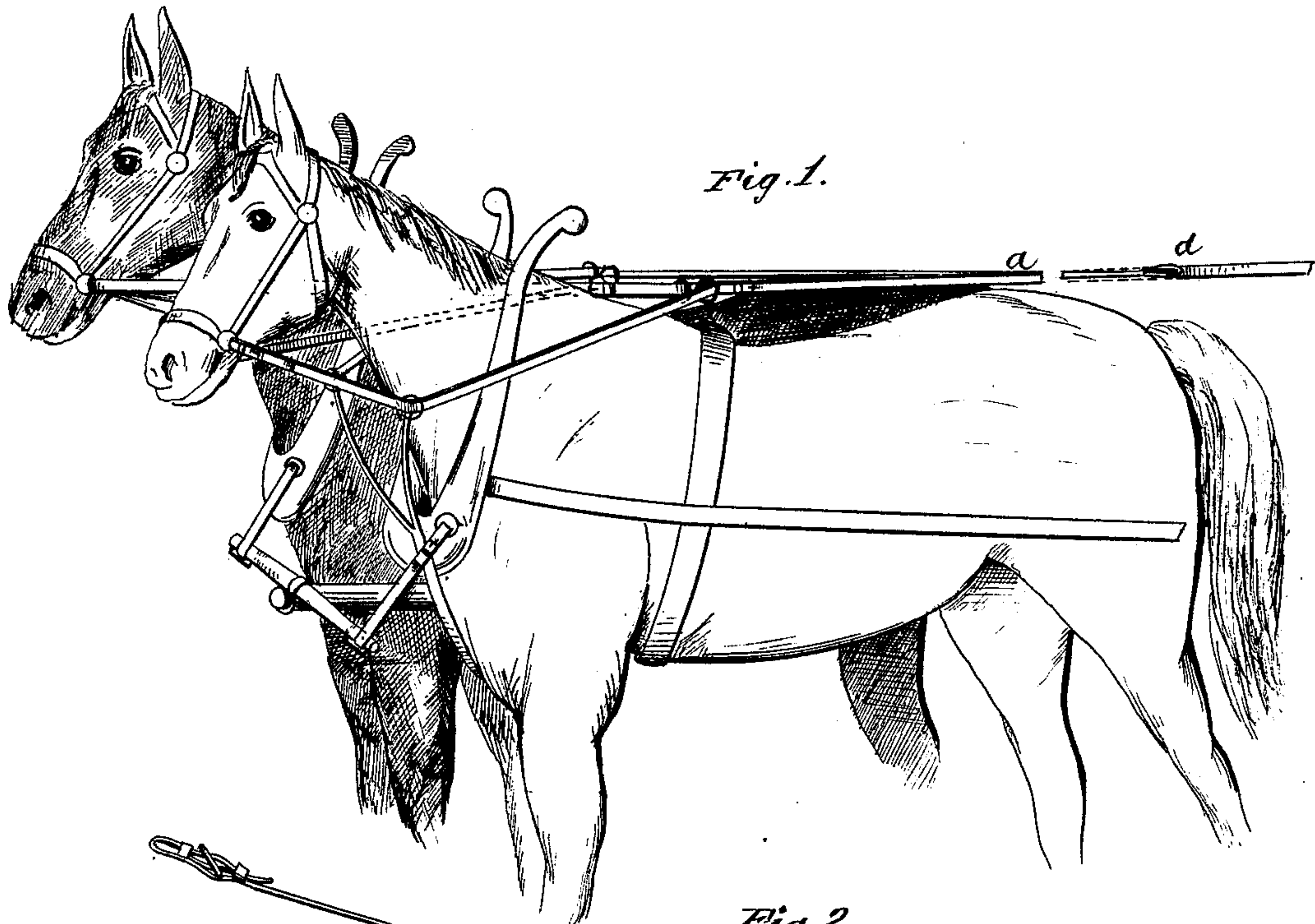


G. R. WOOLSEY.
Driving-Rein for Two Horses.

No. 206,912.

Patented Aug. 13, 1878.



Witnesses
And G. Critch
Daniel Breed

by

Inventor
Gilbert R. Woolsey
De Witt C. Allen

att'y

UNITED STATES PATENT OFFICE.

GILBERT R. WOOLSEY, OF NORMAL, ILLINOIS.

IMPROVEMENT IN DRIVING-REINS FOR TWO HORSES.

Specification forming part of Letters Patent No. **206,912**, dated August 13, 1878; application filed February 20, 1878.

To all whom it may concern:

Be it known that I, GILBERT R. WOOLSEY, of Normal, in the county of McLean, and in the State of Illinois, have invented certain new and useful Improvements in Adjustable Reins; and 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, making a part of this specification, and in which—

Figure 1 represents my improved lines as applied to use upon a pair of horses; Fig. 2, a detached view of my improved reins.

This invention relates to improvements in reins for driving two horses abreast; and the invention consists in the combination, with the ordinary reins for driving two horses abreast, of two extra reins adjustably connected with the cross-reins, all as will be hereinafter fully described.

In the drawing, *a a* represent the common two-horse reins, and *b b* the long branch or cross-reins thereof. *c c* represent the auxiliary reins, connected at *f f* with the long branch or cross reins *b b*. *d d* represent the loops in the extra reins for the driver's hands, and *e e* the guide-loops on the reins *a a*, through which the extra reins *c c* play.

The common reins *a a* are made flat, and the extra or auxiliary reins *c c* are made round, and provided with long loops or rings in the ends next the driver, by which they can be readily seized.

The length of the extra or auxiliary reins should vary according to the length of the carriage or wagon pole, and the looped ends *d d* of said reins should come just over the dash-board, so as to be easily handled by the driver. The farthest ends of the auxiliary reins are connected to the long branch or cross reins *b b* eight or ten inches, and more, if deemed expedient, nearer the horses' mouths than the place where the two branch or cross reins are united with the reins *a a*. This distance from the union of the branches of the ordinary or common reins *a a* will depend on whether a hame-strap and ring for the long branch reins to pass through is used or not, and, if used, the length of such hame-strap and

ring should be about eleven inches, and in that case the union of the extra reins with the branch or cross reins should be about eight inches from the horses' mouths.

To connect the extra or auxiliary reins with the common ones, I use buckles instead of having them sewed together, so that the reins can be adjusted to harnesses where no hame-straps are used, and where the lengths of the hame-straps vary.

By means of the above-described reins the driver is enabled to drive the horses wide apart or near together, in order to avoid ruts, holes, wet places, and other imperfections or obstructions in the road, and also to hold either horse back and allow the other to go forward.

In using my improved reins, the neck-yoke is required to be made longer, and the metal loops near each end which hold the pole-straps in place should be made to correspond in length therewith, and upon the same plane with the drop which receives the end of the pole, so as to allow the pole-straps to play laterally from end to end in said loops, as the horses are driven wide apart or nearer together, and the neck-yoke, where covered by said loops, should be made of uniform diameter, and polished or oiled instead of painted, to enable the pole-straps to play easily thereon.

The operation of my improved reins is as follows: To drive the horses wide apart the driver has only to draw steadily on both the common reins *a a*; and to cause the near horse only to travel away from the pole the driver has only to draw on the main rein in his left hand, and to cause the off horse only to travel away from the pole, the driver must draw on the main rein in his right hand. To make the near horse travel close to the pole the driver must draw on the right-hand extra rein, and to make the off horse travel close to the pole the driver must draw on the left-hand extra rein. To hold back the near horse and allow the off one to go in advance, the driver must hold with equal tension the main rein in the left hand, and the extra rein attached to the main rein in the right hand, and to hold back the off horse the main rein in the right hand and the extra rein attached to the main rein

in the left hand must be held with equal tension.

I am aware that having the cross or branch reins extend along through loops on the main reins to be within reach of the driver is old, and such I do not desire to claim as my invention; but

I claim as my invention—

The combination, with the common reins *a* *a*, for driving two horses abreast, of the auxil-

iary reins *c c*, adjustably connected with the cross-reins *b b*, substantially as and for the purpose specified.

In testimony that I claim the foregoing I have hereunto set my hand this 5th day of February, 1878

GILBERT R. WOOLSEY.

Witnesses:

PETER FOLSOM,
W. M. HATCH.