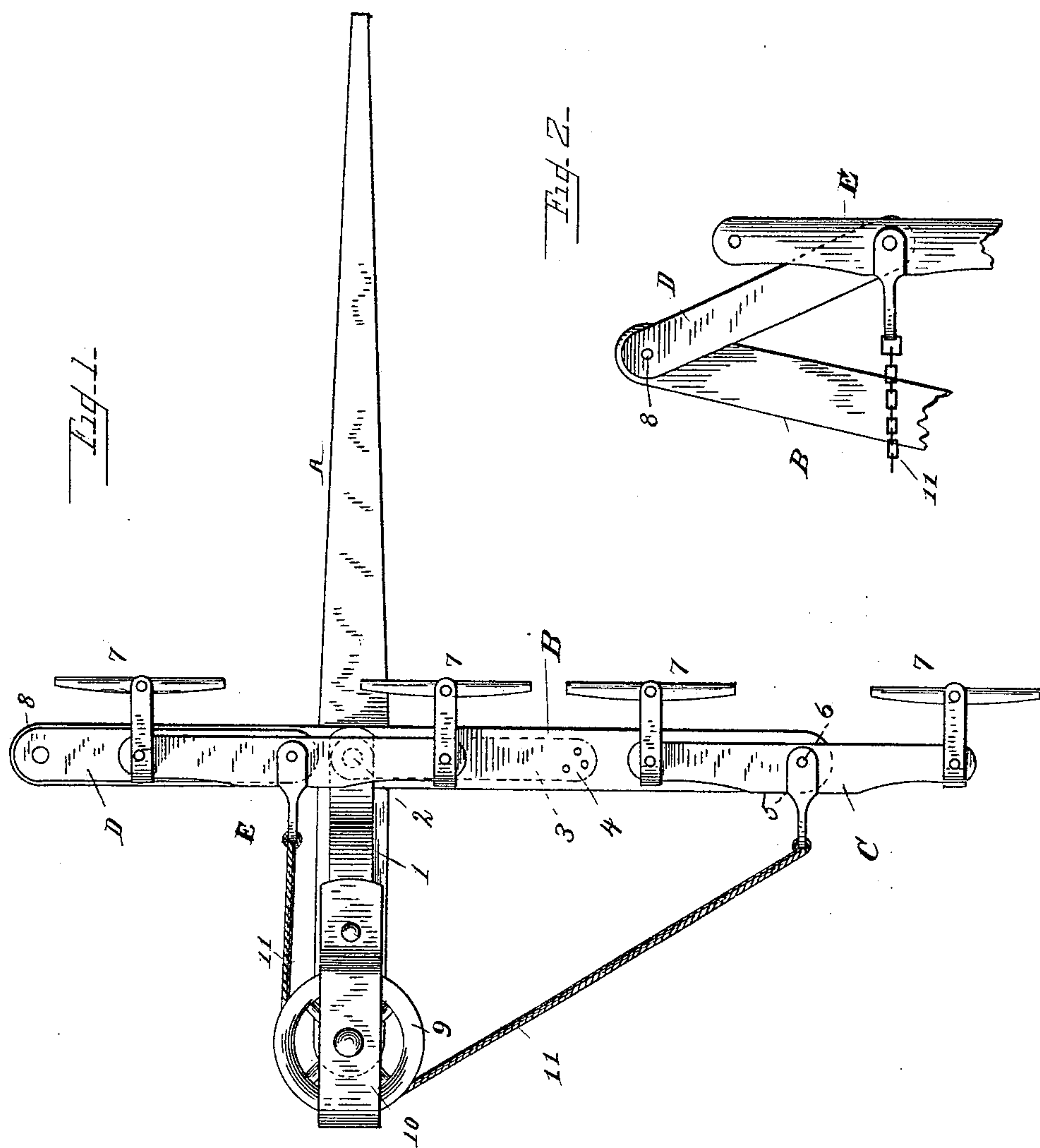


(No Model.)

M. FRAMBACH.
DRAFT EQUALIZER.

No. 388,353.

Patented Aug. 21, 1888.



Witnesses.
S. A. Tauberschmidt,
J. Thomson Cross

Inventor,
Matt Frambach.
By his Attorney
A. G. Huffman.

UNITED STATES PATENT OFFICE.

MATT FRAMBACH, OF CHEROKEE, IOWA.

DRAFT-EQUALIZER.

SPECIFICATION forming part of Letters Patent No. 388,353, dated August 21, 1888.

Application filed December 9, 1887. Serial No. 257,368. (No model.)

To all whom it may concern:

Be it known that I, MATT FRAMBACH, a citizen of the United States of America, residing at Cherokee, in the county of Cherokee and State of Iowa, have invented a new and useful Draft-Equalizer, of which the following is a specification.

My invention has relation to improvements in means for equalizing the draft, of that character wherein levers of different lengths are utilized in a common line of draft with the weight or resistance, and the object is to construct a four-horse draft-equalizer in which three horses are hitched to walk abreast on one side of the tongue and a single animal on the other side. The device is particularly applicable to harvesters to permit the single animal to travel on the side next the standing grain; but the device may be used wherever similar circumstances of restriction of space occur.

I have fully illustrated my improvements in the accompanying drawings, wherein—

Figure 1 is a top plan view of the device. Fig. 2 is a view of the evener drawn at an angle, the main lever and doubletree being broken off to better show the connection.

Reference being had to the drawings, A designates the tongue, which may be of any of the usual and approved constructions. On the tongue is pivotally attached the lever B which has a keeper, 1, arranged over it, as shown, and through which the bolt 2 passes which holds the lever to the tongue. To strengthen the long arm of the lever B, a plate, 3, is arranged in line therewith on the upper side, and has one end rigidly secured to the lever, as at 4, and the other end is held by the bolt 2.

On the long end of the lever is coupled a doubletree, C, which is preferably mounted on the face of the lever and held by a clevis, 5, and pivot-bolt 6, substantially as shown. The bow of the clevis is arranged to extend backward to afford convenient means to which the cord or chain may be connected. The doubletree C is coupled to the lever in the proportion of two to one as compared with the short

arm thereof. Singletrees 7 are connected to the doubletree C, as usual.

D designates the evener, which consists of a substantial lever having one end pivoted to the end of the short arm of the lever, as at 8, and on the other and inner end has pivotal connection with the doubletree E, which has singletrees 7, connected as shown. The evener D is of such length as to permit the doubletree E to be connected thereto to throw one-half on the opposite side of the tongue, and thus make three horses travel on one side and but one on the other.

On the rear part of the tongue is mounted a sheave, 9, within a proper casing, 10, and over the sheave is arranged a cord or chain, 11, having one end attached to the end of the long arm of the lever and the other end attached to the inner end of the evener, substantially as shown. By means of the cord and sheave connection it will be seen that the couple of two to one directly with the lever is overcome, and the ultimate result of the connection is an equal draft on each side of the tongue or an equivalency of leverages.

What I claim is—

In a four-horse draft-equalizer, the combination, with the tongue A, of the lever B, pivotally mounted on the tongue with the arms two to one and provided with the strengthening-plate 3, the evener D, having its outer end pivoted to the end of the short arm of the lever, the doubletree E, pivoted to the inner or free end of the evener D, the sheave 9, mounted on the rear end of the tongue, the doubletree C, pivoted to the end of the long arm of the lever, and the cord 11, arranged on the sheave and having one end connected to the center of the doubletree on the evener and the other end connected to the clevis of the doubletree on the end of the long arm of the lever.

In witness whereof I have hereunto set my hand in the presence of two attesting witnesses.

MATT FRAMBACH.

Attest:

E. C. HERRICK,
S. L. BODDY.