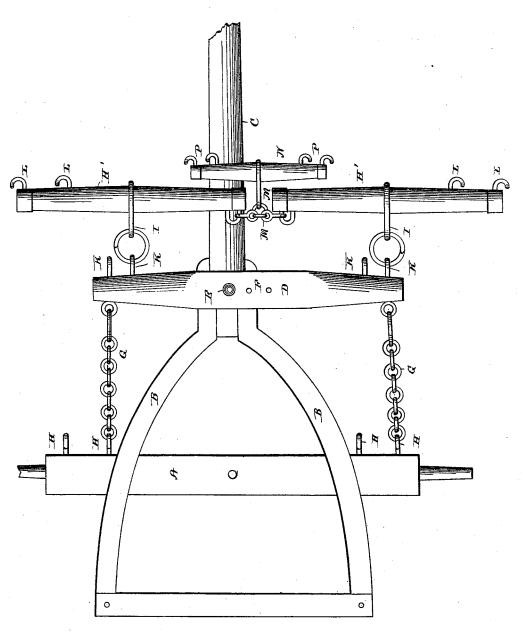
## J. S. DEARING.

DRAFT EQUALIZER.

No. 262,747.

Patented Aug. 15, 1882.



Witnesses Edwin L. Gewill. H. Aubrey Vaulmin

By & m. Alexander. Attorney

## United States Patent Office.

JOHN S. DEARING, OF PULASKI, TENNESSEE.

## DRAFT-EQUALIZER.

SPECIFICATION forming part of Letters Patent No. 262,747, dated August 15, 1882. Application filed April 19, 1882. (Model.)

To all whom it may concern:

Be it known that I, JOHN S. DEARING, of Pulaski, in the county of Giles, and in the State of Tennessee, have invented certain new 5 and useful Improvements in Draft-Equalizers; 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 10 thereon, making a part of this specification.

This invention has for its objects to provide certain means for equalizing the draft between two horses when pulling abreast, and to compel a balky horse to pull truly, as more fully hereinafter specified. These objects I attain by the means illustrated in the accompanying drawing, in which is represented a top view of my improved draft-equalizer.

The letter A indicates the front axle of a 20 wagon, carriage, or other vehicle; B, the tongue-hounds, and C the tongue, all constructed in the usual manner.

The letter D indicates a transverse bar adjustably secured to the tongue by means of a 25 bolt, E, the said bar being provided with a series of apertures, F, through either of which the bolt may be passed for the purpose of adjustment. The bar near its ends is connected to the axle by means of the chains G and hooks 30 H, several of which are employed, so that the connecting points of the chains to the axle may be varied to change the leverage.

The letter H' indicates two whiffletrees, secured to the transverse bar by the links I, the 35 transverse bar being provided near each end with eyes K, to which the links may be attached, two or more such eyes being provided

near each end, so that the position of the whiffletrees may be changed to regulate the draft upon the respective ends. The outer 40 ends of the above-named whiffletrees have secured to them the trace-holding devices L, by means of which the outer traces may be secured to the said whiffletrees, and their inner ends are connected by means of links M to a 45 short whiffletree, N, which is provided with hooks P, to which the inner traces are attached.

It is obvious that by shifting the transverse bar to either side the leverage may be made 50 greater or less, so as to equalize the draft between a weak and a strong horse, and by shifting the connections the same effect may be obtained.

Having thus described my invention, what I 55 claim, and desire to secure by Letters Patent,

The combination, with the tongue of a vehicle, plow, cultivator, or other similar structure, of an adjustable transverse bar and the 60 whiffletrees secured thereto, with connections for the outer traces, and the whiffletree secured to the inner ends of the first-mentioned whiffletrees, having connections for the inner traces, the whole arranged substantially as and for 65 the purposes specified.

In testimony whereof I affix my signature, in presence of two witnesses, this 1st day of

April, 1882.

JOHN S. DEARING.

Witnesses: M. B. HARWELL, P. C. MAGNUS.