

(No Model.)

W. LOREY.  
ANGLE IRON.

No. 280,841.

Patented July 10, 1883.

Fig. 1.

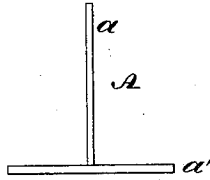


Fig. 2.

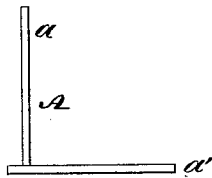


Fig. 3.

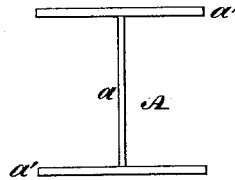


Fig. 4.

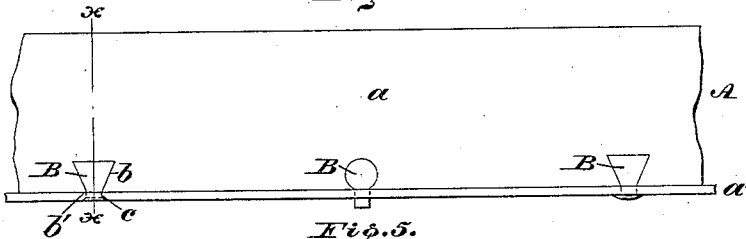


Fig. 5.

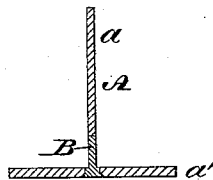


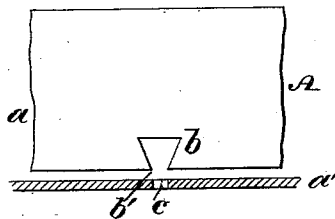
Fig. 6.



Fig. 7.



Fig. 8.



WITNESSES:

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# UNITED STATES PATENT OFFICE.

WILLIAM LOREY, OF PHILADELPHIA, PENNSYLVANIA.

## ANGLE-IRON.

SPECIFICATION forming part of Letters Patent No. 280,841, dated July 10, 1883.

Application filed July 28, 1882. (No model.)

*To all whom it may concern:*

Be it known that I, WILLIAM LOREY, a citizen of the United States, residing in the city and county of Philadelphia, State of Pennsylvania, have invented a new and useful Improvement in Angle-Irons, which improvement is fully set forth in the following specification and accompanying drawings, in which—

Figures 1, 2, and 3 are end views of different forms of angle-iron embodying my invention. Fig. 4 is a side elevation of Fig. 1. Fig. 5 is a section thereof in line *x x*, Fig. 4. Figs. 6 and 7 are views of detached parts. Fig. 8 is a view of the limbs of the angle-iron separated.

Similar letters of reference indicate corresponding parts in the several figures.

My invention consists of a mode of constructing angle-irons whereby their limbs are connected in a simple, convenient, inexpensive, strong, and durable manner, as will be hereinafter set forth.

Referring to the drawings, A represents a piece of angle-iron, which may be of the form of a T, L, I, M, or other figure or shape, and the limbs *a a'* thereof consist of separate pieces of metal, which are united as follows:

In one of the limbs, at the edge thereof, there are openings or recesses *b*, and at the contiguous place of the other limb, at coincident places, are openings *c*. The openings *b* are adapted to receive the heads of rivets B and the openings *c* to receive the shanks of said rivets, said heads being flat to accord with the flat sides of the limbs of the iron, and the shanks being preferably cylindrical and made sufficiently thick for purposes of strength, it being noticed that the openings *b* have necks *b'* at the edge of the limb to receive the necks of the rivets, whereby the heads of the rivets cannot be withdrawn from said openings *a*.

The heads of the rivets are fitted in the openings *b*, and hammered so as to fully occupy or fill said openings and be tightened therein. The shanks of the rivets are then passed through the openings *c* and headed on the back of the limb *a'* of the iron, thus firmly connecting the rivets with said limb *a'*.

It will be seen that as the heads of the rivets are firmly secured to one limb of the iron, and the shanks thereof are firmly secured to the other limb of the iron, the two limbs are reliably connected as one, and thus strong angle-iron is produced.

It will also be seen that I avoid the operation of rolling iron into angular form and construct the iron of flat strips of metal by punching or otherwise forming in them the openings *b c* and applying and securing the rivets B in position, the result being the angle-iron having limbs which are tightly and closely fitted together and firmly connected, the work being accomplished in a simple, convenient, and inexpensive manner.

Having thus described my invention, what I claim as new, and desire to secure by Letters Patent, is—

1. An angle-iron formed of separate limbs connected by a rivet, substantially as and for the purpose set forth.

2. The method of attaching the limbs of an angle-iron together, consisting of inserting in a recess of one limb the end of a rivet, which is attached to or passed through the other limb, and then hammering said rivet to head the ends thereof, substantially as set forth.

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Witnesses:

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