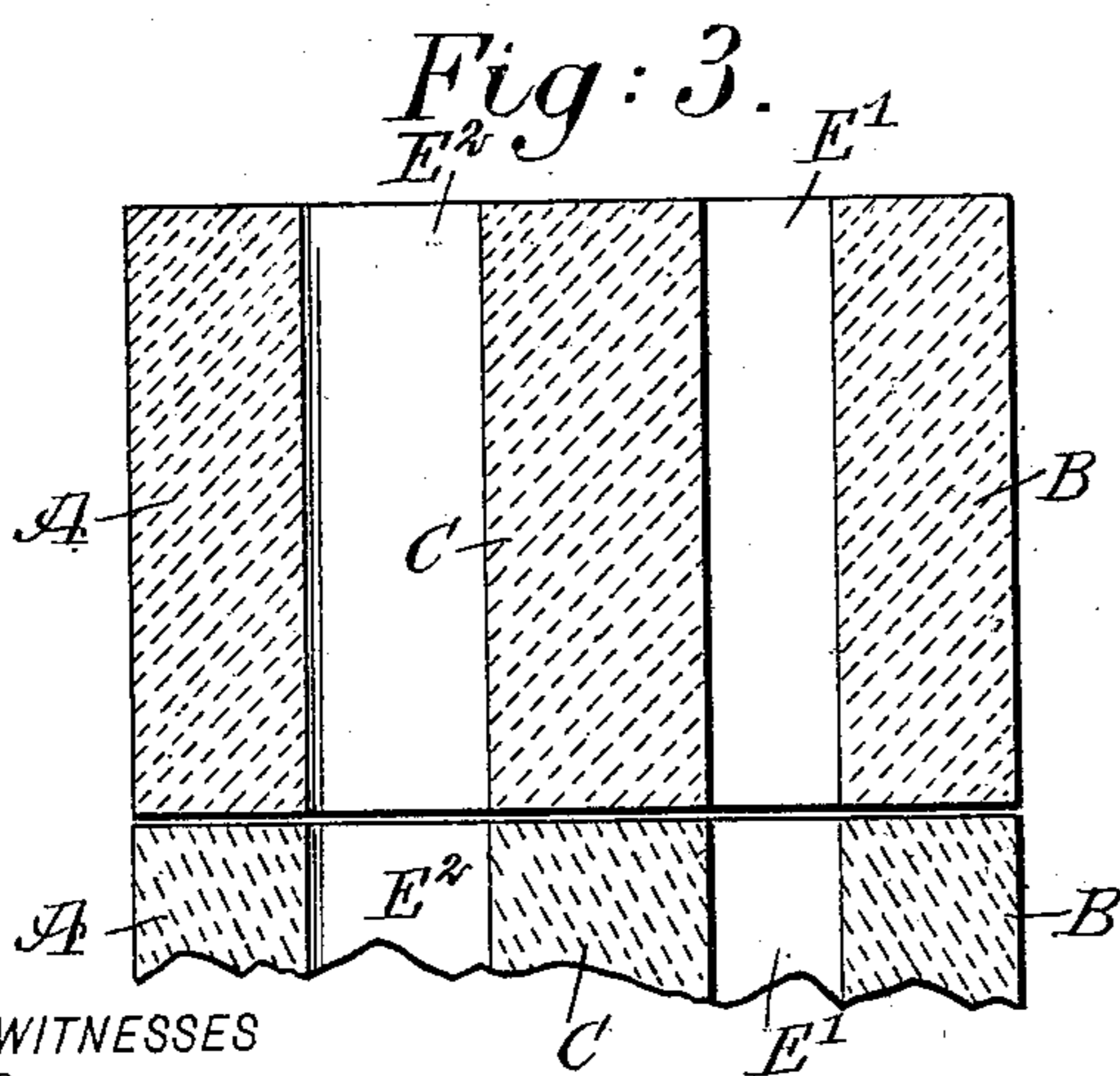
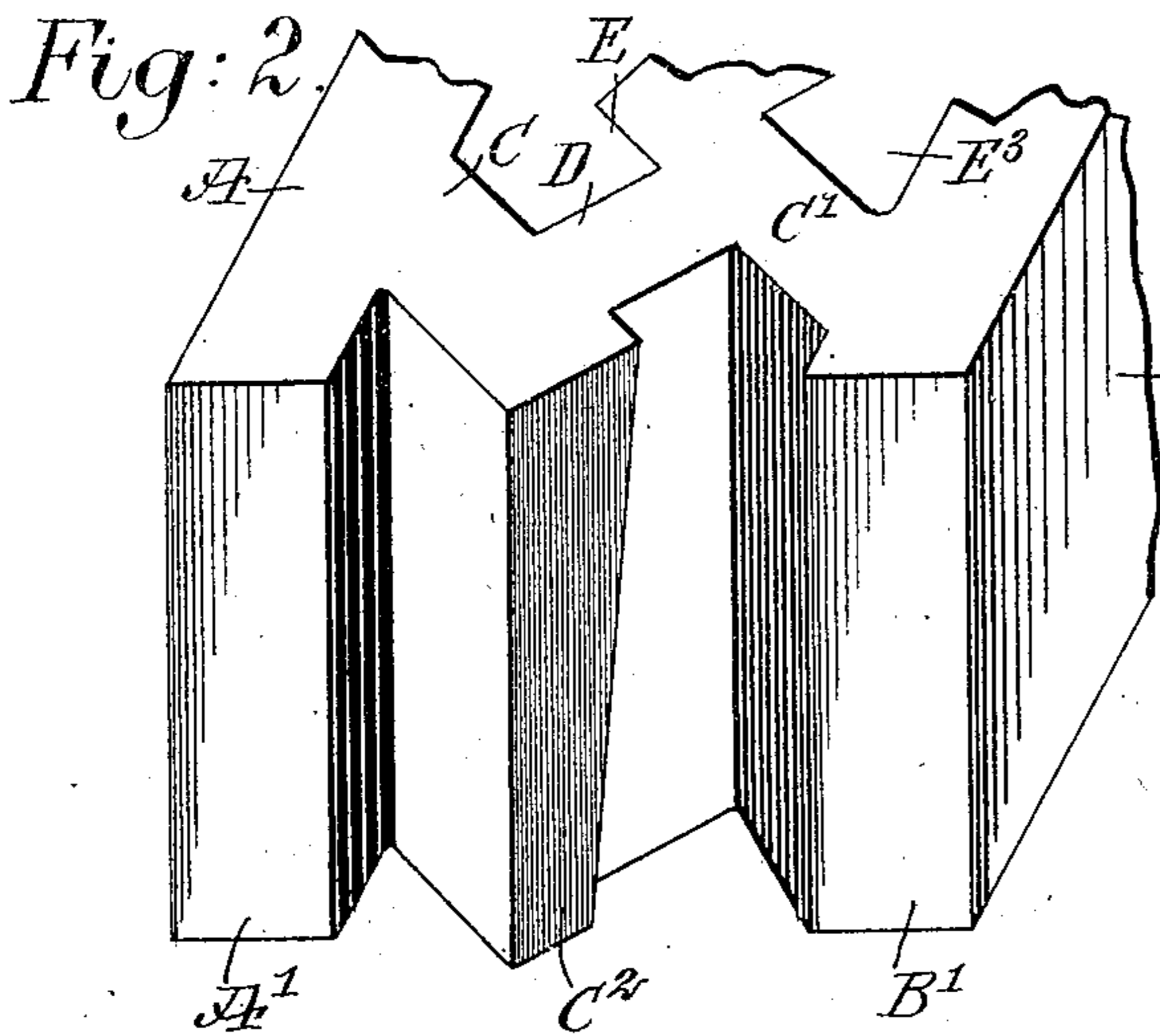
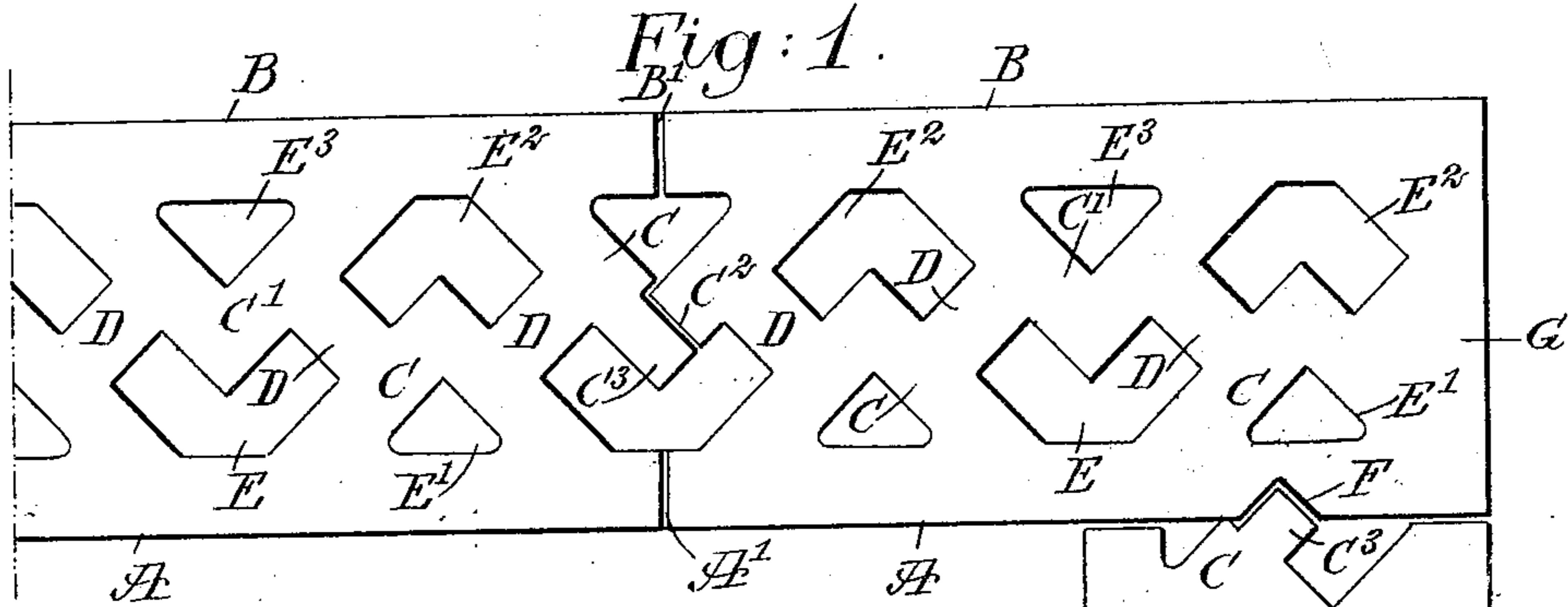


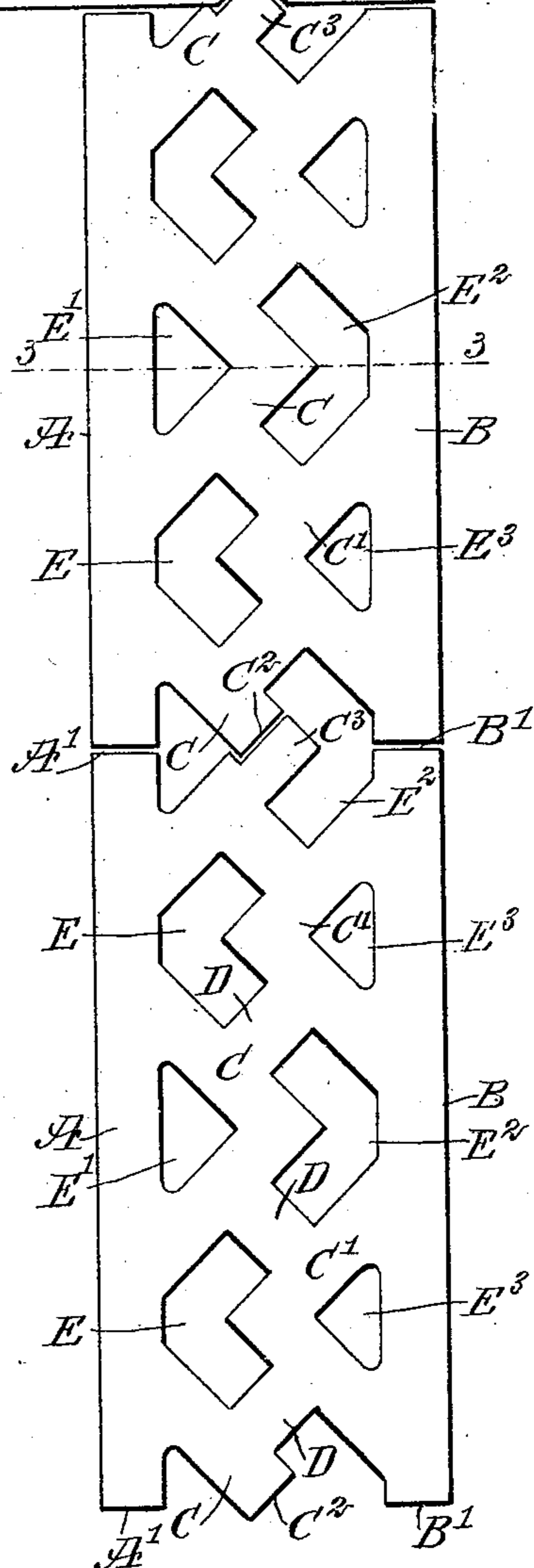
No. 840,893.

PATENTED JAN. 8, 1907.

J. AITKEN.
BUILDING BLOCK.
APPLICATION FILED MAY 10, 1906.



WITNESSES
J. Muesblath
Geo. H. Hooten



INVENTOR
John Aitken
BY Munn & Co
ATTORNEYS

UNITED STATES PATENT OFFICE.

JOHN AITKEN, OF NEW YORK, N. Y.

BUILDING-BLOCK.

No. 840,893.

Specification of Letters Patent.

Patented Jan. 8, 1907.

Application filed May 10, 1906. Serial No. 316,109.

To all whom it may concern:

Be it known that I, JOHN AITKEN, a citizen of the United States, and a resident of the city of New York, borough of the Bronx, in the county and State of New York, have invented a new and Improved Building-Block, of which the following is a full, clear, and exact description.

The invention relates to concrete for cement blocks; and its object is to provide a new and improved building-block for the construction of walls arranged to insure the formation of light and air-tight joints and to reduce the weight to a minimum and still render the block exceedingly strong and durable and to provide the block with air-spaces to prevent the penetration of moisture into a room by way of the wall.

The invention consists of novel features and parts and combinations of the same which will be more fully described hereinafter and then pointed out in the claims.

A practical embodiment of the invention is represented in the accompanying drawings, forming a part of this specification, in which similar characters of reference indicate corresponding parts in all the views.

Figure 1 is a plan view of the improvement. Fig. 2 is a perspective view of one end of a building-block, and Fig. 3 is a cross-sectional elevation of the improvement.

The building-block—made of concrete, cement, or a like material—consists, essentially, of spaced parallel vertical facing-walls A and B, provided at their opposite faces with integral V-shaped webs C and C', connected with each other at their side members by arms D, standing approximately at right angles to the said arms, as will be readily understood by reference to Fig. 1. The webs C and C' alternate and form with the side arms D vertical air-spaces E and E', adjacent to the inner face of the wall A, and similar air-spaces E² and E³, adjacent to the inner face of the other wall B. The air-spaces E and E² are V-shaped, while the air-spaces E' and E³ are approximately triangular, and the air-spaces E and E³ are located in transverse alinement, and in a similar manner the air-spaces E' and E² are in transverse alinement.

By the arrangement described an exceedingly strong and durable building-block is provided which is exceedingly light and is provided with double rows of vertical air-spaces, so as to prevent the penetration of

moisture through the block when used as a wall of a building.

The ends A' and B' of the facing-walls A and B break joint with members C² and C³, forming the web C of adjacent blocks, as plainly indicated in Figs. 1 and 2—that is, the joint of the members C² C³ stands at an angle to the joints formed by the ends A' B' of adjacent blocks, and the said joint of the members C² and C³ is preferably made tapering, as indicated in Fig. 2.

By reference to Fig. 1 it will be noticed that the member C³ projects a distance beyond the corresponding ends A' and B' of the walls and this projecting member C³ is adapted to fit into a recess F, formed in the outer face of the facing-wall A, when used as a corner-block, as plainly indicated in Fig. 1. The corner-block shown in Fig. 1 has its outer end G made solid to prevent moisture from passing into the air-spaces which would be formed if the block were not made solid at its outer end.

By arranging the blocks in the manner described successive tiers or layers of blocks may break joint with the preceding ones and still the air-spaces can be rendered continuous in a vertical direction throughout the entire height of the wall, as one of the air-spaces, E', for instance, of a block is located at the middle thereof and a similar one at the joint between adjacent blocks, and consequently the middle air-space E' of a block in the next tier above can register with the air-space E' next below and formed at the joint of two blocks in this lower tier. In a similar manner the remaining air-spaces E, E², and E³ will register with each other in successive tiers.

Thus from the foregoing it will be seen that a wall built with blocks as described is rendered intercellular and air-tight and at the same time the weight of each block is reduced to a minimum and the block is rendered exceedingly strong and durable.

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

1. A building-block comprising inner and outer facing-walls and integral webs connecting the walls with each other, said webs being composed of V-shaped members projecting inwardly from the inner and outer facing-walls, the alternate members projecting from one wall and the intermediate mem-

ber from the other wall, said members being connected by arms extending between the adjacent faces of the V-shaped members.

2. A building-block, comprising spaced
5 parallel facing-walls, a vertical web integrally connecting the said facing-walls with each other, the web consisting of rows of V-shaped webs integrally connected at their
10 ends with the said facing-walls, the said V-shaped webs of the opposite facing-walls being alternately arranged, and arms integrally connecting the sides of alternating webs with each other.

3. A building-block, comprising spaced
15 parallel facing-walls, a vertical web integrally connecting the said facing-walls with each other, the web consisting of rows of V-shaped webs integrally connected at their ends with the said facing-walls, the said V-
20 shaped webs of the opposite facing-walls being alternately arranged, and arms integrally connecting the sides of alternating webs with each other, and the separate members of the end webs of adjacent blocks over-
25 lapping each other at an angle to the joints of the facing-walls of adjacent blocks.

4. A building-block, comprising facing-walls, and a web integrally connecting the

facing-walls with each other, the end of the web extending at an angle to the ends of the
30 facing-walls and having its vertical face tapering.

5. A building-block, comprising spaced parallel facing-walls, a vertical web integrally connecting the said facing-walls with
35 each other, the web consisting of rows of V-shaped webs integrally connected at their ends with the said facing-walls, the said V-shaped webs of the opposite facing-walls being alternately arranged, and arms inte-
40 grally connecting the sides of alternating webs with each other, and the separate members of the end webs of adjacent blocks overlapping each other at an angle to the joints
45 of the facing-walls of adjacent blocks, and the contacting-surfaces of the members of the end webs of adjacent blocks being tapering.

In testimony whereof I have signed my name to this specification in the presence of
50 two subscribing witnesses.

JOHN AITKEN.

Witnesses:

THEO. G. HOSTER,
EVERARD B. MARSHALL.