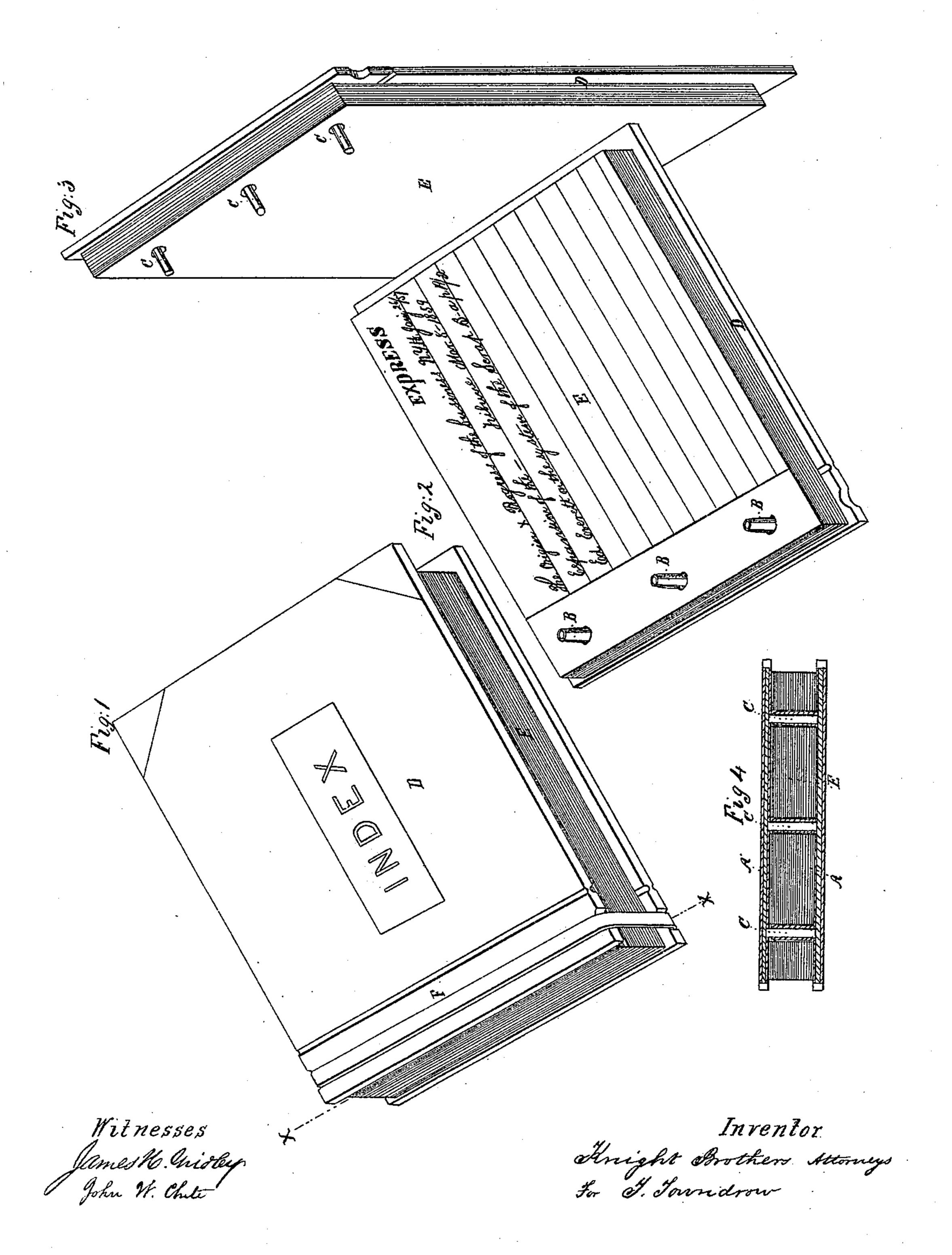
## T. TOWNDROW. BOOK BINDER.

No. 28,521.

Patented May 29, 1860.



## UNITED STATES PATENT OFFICE.

THOMAS TOWNDROW, OF NEW YORK, N. Y.

Specification of Letters Patent No. 28,521, dated May 29, 1860.

To all whom it may concern:

Be it known that I, Thomas Townbrow, of the city, county, and State of New York, have invented a new and useful Improve-5 ment in Bookbinding; and I hereby declare the following to be a full and exact description of the same, reference being had to the accompanying drawings, making part of

this specification.

The object of my said improvement is to produce a binding of durable and convenient character, adapted to admit of taking the book apart for the insertion or removal of leaves in any part, and particularly appli-15 cable to the binding of common-place, index and memorandum books, catalogues, pamphlets, sheet music and analogous uses.

In the accompanying drawings Figure 1, is a perspective view of a complete book em-20 bodying my improvement. Fig. 2 is a perspective view of the same as opened for the insertion or removal of leaves. Fig. 3, is a

section at  $x \times x$  Fig. 1.

A and A' represent narrow metallic 25 plates, equal in length to the width of the articles to be bound.

B are tubes projecting from one side of

the plate A.

C, are pins projecting in corresponding 30 positions from one side of the plate A' and adapted to fit loosely in the tubes B.

The plates A and A' are incased in paste board and are connected to the covers D of the book, by leather, cloth or other covering 35 in manner familiar to bookbinders, and so as to allow free motion to the covers without changing the position of the plates.

E, represents the leaves of the book.

F, is a band of gum elastic or other suit-40 able material passed around the plates A

and A' as shown in Fig. 1, to hold the parts firmly in position. Cavities to receive this band are formed in the ends of the plates A and A' or in the pasteboard with which

they are covered.

The operation is as follows. The articles to be bound being first perforated with a suitable punch are placed in position on the tubes B. The upper cover is then applied by inserting the pins C in the tubes B and 50 the band F clasped around the whole as shown in Fig. 1. When it is desired to insert or remove leaves at any part of the book the band is removed and the book being taken apart at the place desired one portion 55 of it will remain upon the tubes B, while the other portion is held in position by the pins C, so as to be preserved from displacement. One or more leaves may then be placed upon or withdrawn from the tubes and the upper 60 portion of the book restored to its position.

In cases where great accuracy of edge is required and the changes are expected to be frequent the holes of the exterior sheets are made of oval form with the larger diameter 65 parallel to the back of the book, so as to accurately fit the tubes in one direction and at the same time permit the leaves to curve without tearing as they are drawn apart.

I claim as new and of my invention herein 70 as an improvement in binding books.

The combination of the plates A and A', tubes B, and pins C, constructed and arranged substantially as and for the purposes set forth.

## THOMAS TOWNDROW.

Witnesses:

ROBT. JACKSON. JOHN HOPPER.