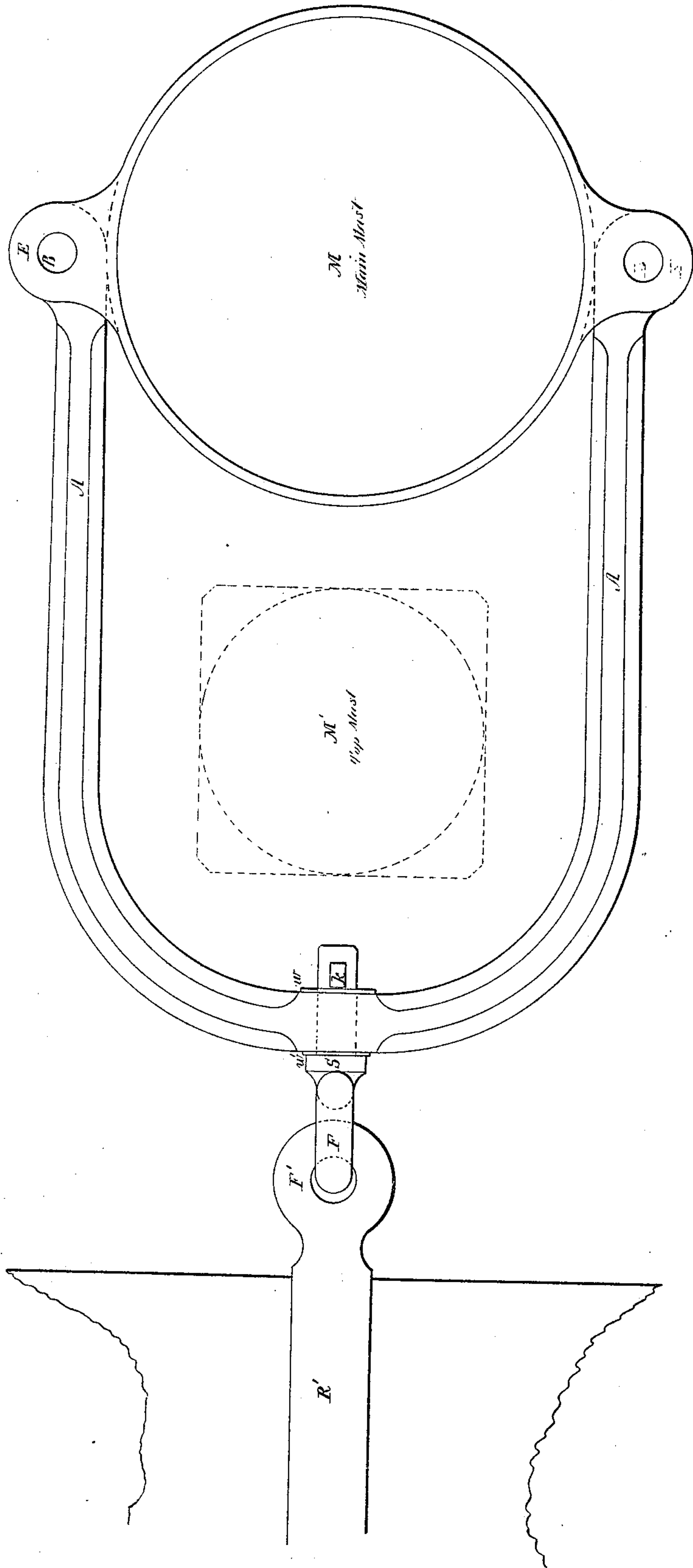


*T. Odeon.*  
*Ship Truss.*

N<sup>o</sup> 7,605.

*Patented Aug. 27, 1850.*



# UNITED STATES PATENT OFFICE.

TILGATH ODEON, OF PORTSMOUTH, VIRGINIA.

## METHOD OF ATTACHING YARDS TO TRUSSES.

Specification of Letters Patent No. 7,605, dated August 27, 1850.

*To all whom it may concern:*

Be it known that I, TILGATH ODEON, of Portsmouth, county of Norfolk, and State of Virginia, have invented a new and useful Improvement in Trusses for Hanging Ships' Yards, and that the following is a full, clear, and exact description thereof, reference being had to the accompanying drawings, which make part of this specification.

I construct my truss by attaching to a ring encircling the mast, a fork or bow of iron of the form of an ox-bow or horseshoe, having at each end an eye through which a bolt is to pass in a vertical direction. The ring or band around the mast has, projecting from each side, a pair of lugs between which the ends of the bow-shaped truss are to pass. These lugs have also holes for the insertion of bolts to pass through and to retain the ends of the truss in place or to allow it to be detached from the ring, when required. The truss stands out horizontally or nearly so from the mast, and is fixed in a permanent position, by the two bolts, coming through the lugs of the ring. I attach to the curve midway between the extremities of the truss, a swivel passing horizontally through a hole in the arch, and place against the shoulders of the swivel on the outside and against a key on the inside of the truss, a washer to enable the swivel to turn with ease. This swivel can be easily detached from the truss without lowering the yard. The eye on the outer end of the swivel receives a corresponding eye of a bolt attached firmly (or by a swivel) to a ring going around the yard. The swivel and eye-bolt thus attach and retain the yard to the truss, sustaining it at the center while they allow it to roll upward or downward around the eye of the swivel, as a center, through an entire semicircle, or more, while the turning of the swivel around on a horizontal axis, permits the yard to be set a-cock-bill, on either side at pleasure, as well when the topmast is let down as at other times.

The peculiar advantages which I derive from the improvements above described are, 1, that the swivel and eye bolt connection between the yard band and the bow truss give universality of motion to the yard about its point of suspension to the bow; 2, that it brings the center of gravity of the yard as near as practicable to the curved extremity of the bow truss, so that when hanging to the truss its weight will have the least possible leverage to derange the lugs

or bolt eyes which fasten the truss to the mast-band; 3d, the swivel and eyes afford facility for drawing the yard inward toward the mast, whereby its center of gravity may be placed still nearer to the mast than when it hangs freely by the bolt eyes, and this may be done by drawing it in, toward the mast, below the truss, or raising it above the truss and then rolling it inward, so as to rest its weight on the two sides of the bow; 4, the eye bolts are simple and cheap in construction and more compact and stronger with the same weight of metal than the rule joints and other contrivances hitherto resorted to, for hanging yards to bow trusses.

In the drawing M' is the topmast when lowered down between the arms of the truss.

S is a swivel bolt passing horizontally through the curve of the truss A A.

E E, are lugs projecting from the ring R two on each side of the ring, between which pass the two eyes on the ends of the bowed truss A A, and are fastened in place by the bolts B, B, which retain the truss firmly in its position.

R is the ring encircling the mast; *w w'* are washers one on the inside and the other on the outside of the curve, and *k* is a key to hold the swivel bolt in place while allowing it to turn.

F, F', are connected bolt rings of which F is on the swivel bolt S, and F' is attached to the ring R' which encircles the yard.

I am aware that various ways of attaching yards to trusses have been devised but that they all differ in one or more important particulars from that which is herein described and that they consequently fail to secure the advantages above pointed out as pertaining to my truss having swiveled eye-bolt connections with the yard band.

I claim—

Suspending the yard to the truss by means of linked and swiveled eye bolts whereby the yard may either be allowed to hang freely below the eye which is swiveled to the truss, or may be slung upward and inward toward the mast, so as to bring its center above the bowed end of the truss, in the manner and for the purposes herein set forth.

TILGATH ODEON.

Witnesses:

WALTER R. JOHNSON,  
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