To whom it may concern:

Be it known that I, THOMAS A. ALLISOP, of Philadelphia, in the county of Philadelphia and State of Pennsylvania, have invented certain new and useful Improvements in Conveyors for Driers, whereof the following is a specification, reference being had to the accompanying drawings.

The invention relates more particularly to endless conveyers which are used for drying fabrics or other materials which are of the flexible nature.

An object of the invention is to provide a conveyor in which the apron is connected to the supporting structure by a novel and extremely simple means.

In the drawings which show by way of illustration one embodiment of the invention, Figure I, is a plan view showing a section of an apron and the supporting devices therefor, wherein apron embodies my improvements. Figure II, is an end view of a section of the same. Figure III is a section on the line III of Figure I. Figure IV, is an enlarged view showing one of the links or members used in the forming of my improved apron. Figure V, is a section through one of the cross bars as indicated at V, V, in Figure I.

As herein shown, the apron is formed of a plurality of interengaging spirally wound transversely extending members, which are preferably slightly flattened so as to give a substantially smooth upper and lower surface to the apron.

Referring more in detail to the drawings, the conveyor consists of a plurality of crosspieces 1, which as herein shown, are secured to links 2, which form one element of a train of interengaging links 3. These links 2, and 3, are constructed in the usual manner, so as to run over sprocket wheels, and thus provide an endless carrier. The apron on which the material to be dried is laid consists of a plurality of members 4. As herein shown, each of these members is formed of a strand of wire, which is spiral in shape, and slightly flattened, so as to form upper members 5, and lower members 6. The adjacent spirally formed members throughout the intermediate members of the belt, are interengaged as clearly shown in Figures II, and III. The member at one end is bent into hook form, and is interlocked with the adjacent member at the same end. These interengaged transversely extending spiral members make up the apron on which the material rests. The apron extends over each cross-piece and the ends of the apron or sections of the apron are secured by locking bars 7, threaded through the meshes at the adjacent edges whereby there is provided a practically continuous apron surface. The locking bars 7, serve the further purpose of securing the apron at intervals to the cross-pieces.

While I prefer to make my apron of members which are spirally wound, it will be obvious that said members may be otherwise formed, provided that they are constructed so as to give a substantial thickness to the apron, and also provide an air space between the upper and lower surfaces of the apron.

From the above description, it will be apparent that I have provided a conveyor wherein the apron is entirely free from any pivot or hinge connection with each cross-piece, as the apron extends over the crosspieces, and merely rests thereon, and the only pivoting as the apron turns with the links about the sprocket, is between the adjacent links or members of the apron.

Cross pieces 1, are made of iron pipe carried on projections formed on the sides of certain of the links and secured thereto by cotter pins 10, whereby the link chains are properly spaced and the cross pieces prevented from turning. Where the ends of the apron are interlinked by the locking bars 7, eye bolts 11, with short shanks are fastened into the cross-piece and the locking bars pass through the eye bolts. These eye bolts may pass entirely through the cross-pieces as shown in Figure V, in order to lessen strain upon the threads of the eye bolts and to secure better wearing qualities for the conveyor, but the end eye bolts where the projections of the links enter into the hollow ends of the cross-pieces, are provided with short shanks screwed into the top of the cross-piece, as shown in Figure III.

Having thus described my invention, I claim:
A conveyer including parallel endless chains, cross pieces spacing the same, an apron resting on said cross pieces, a locking bar connecting the adjacent ends of said apron, and means for attaching the bar to a cross piece, said means comprising eye-bolts having their eyes engaged with said bar and their shanks engaged with said cross bar.

In testimony whereof, I have hereunto signed my name at Philadelphia, Pennsylvania, this 26th day of June, 1912.

THOMAS ALLSOP.

Witnesses:
RALPH M. ERWIN,
GEORGE R. CAULTON.