

Cylinder Stiffening Machine Type 302

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The simple machine has been constructed solidly and efficiently. It is still used today for different operations. We basically deliver two types of design, on request:

- with the stiffening cylinders arranged horizontally. This model is the most popular.
- with the stiffening cylinders arranged slantingly.

This machine has been re-designed according to the latest points of view.

It basically consists of a grey cast iron frame, which takes up the cylinders. A gear motor drives the backward cylinder. The front cylinder is borne in mouth-shaped slide bearings and is driven over double front-toothed wheels made of synthetics. This arrangement guarantees permanent operation without any complaints, does not require any maintenance and is operation- and accident-proof. The machine is very silent.

The cylinders are pressed together by adjustable spiral springs (at especially large pressure also by two plate spring packages, too) and thus receive always the correct pressure required for squeezing out the stiffening liquid.

The strippers are radially re-adjustable. They are not only stripping off the stiffening material correctly, but drain it off to the sides. This way the stiffening material, while dripping off cannot hit the hands of the operator. The front cylinder can be made free by loosening the two front wing nuts and, then,

taken out easily and cleaned without any difficulty.

Appretizing Cylinders

The Cylinders of the appretizing machine can be designed as follows:

- Both cylinders are provided with rubber set. This is the design most commonly used. The rubber set takes up operation uncorrections and causes only few stiffening strips. The rubber set, however, wears off after a certain time and has to be renewed.
- Both rollers are consisting of rust- and acid-resistant steel piping. In order to avoid, as much as possible, any stiffening strips, these rollers are, at their ends, reinforced for 10 mm in a way that on almost their entire operation width a free approx. 2 mm wide slot is resulting. With this design of the cylinders, the rollers are pressed together more than with the rubber set. It, therefore, is suitable, in this case, to choose plate spring packages for the pressing-on of the cylinders.
- The backward cylinder is delivered made of rust- und acid-resistant steel-piping and the front roller is provided with a rubber set. It is advantageous that the backward roller never has to be exchanged. The front cylinder can be replaced quickly by a spare roller if it is worn off.

Stiffening Vat

All tubs consists of rust- und acidresistant steel sheet. Electrical heating of the stiffening bath can be quoted, on request.



The stiffening vat is mounted, at the standard design of the machine, under the machine itself, and also contains the stiffening material itself. This is suitable in cases where the hat bodies are stiffened completely.

The stiffening tub can, however, also be designed with three sections. It permits that the brim as well as the crown can be stiffened on the same machine with different stiffening mixtures. (At the left, crown stiffening liquid, at the right, brim stiffening material). The middle section of the vat is, with this type of design, used merely as catching tub and draining vat for the stiffening liquid.

At the right-hand and left-hand sections of the stiffening tub the hat bodies can also be put in upright

(special design). The brim of the hat body sucks up the stiffening liquid, in opposite to the automatic hat body stiffening machine, where the stiffening liquid is sprayed on the brim of the hat body from the outside.

The following numbers of rotations of the working cylinders can be adjusted:

Normally, the machine is delivered with 64 r.p.m., if not requested otherwise by the customer.

On request, we deliver the machine also with gear motor and V-belt drive. The number of rotations of the cylinders can, with this type of design, be variated by changing the V-Belt pulleys.



Technical Data

Measurements approx.	1400 x 900 x 1400 mm
	55,1 x 35,4 x 55,1 inch
Dimensions seaworthy packed cases	1500 x 1000 x 1500 mm
	59,1 x 39,4 x 59,1 inch
space required	1500 x 1000 x 1500mm
	59,1 x 39,4 x 59,1 inch
Weight	
net approx.	170 kg
	374,79 lbs
seaworthy packed approx.	270 kg
	595,25 lbs

