

“RF” SERIES DRYERS FOR TEXTILE FIBRES AND YARNS

Reduce drying time, improve quality, cut costs

More than 1800 “RF” (Radio Frequency) model dryers, the well-known, multi-purpose, conveyerised STALAM dryers sold all over the world since 1981, are presently in operation for the drying of textile fibres and yarns to a conditioned weight. Almost all combinations of natural, artificial and synthetic fibres, as loose stock or combed and spun, or as filament fibres, pure or blended, in every count and form, can be dried perfectly, down to the desired residual moisture level, with outstanding efficiency and quality results. Such outstanding results cannot be achieved with any conventional hot air drying system.

The RF drying of loose stock after carbonising, bleaching or dyeing and batch or continuous centrifugal hydroextraction, has many advantages. The reduced losses of product, the uniformity of drying, the improved physical-mechanical characteristics of the fibres, and consequently the more efficient carding - combing - spinning operations, result in a higher yarn metric yield of up to 2%.

Tow slivers, after dyeing and hydroextraction in the form of pressed cakes, and tops slivers, dyed and hydroextracted as bobbins, bumps or “big forms”, after back-washing and roller-squeezing, can all be dried folded up on the conveyor belt of the “RF” series dryers. A perfect residual moisture distribution is obtained within the sliver, and the lamination effects, typical of drum dryers, are eliminated.

Hanks, after dyeing and centrifugal hydroextraction or in-line squeezing, can be perfectly dried without any movement or passing-through strong air flow, thus avoiding yarn entanglement - which is typical in hot air dryers - and making the winding operation much more efficient.

Before being simply laid over the “RF” dryer conveyor belt, tops in bump and bobbin form can be dyed and centrifugally hydroextracted using movable stainless steel basket-type

carriers or directly on centrifugable spindles. Yarn packages, after dyeing, can be centrifugally hydroextracted or may be simply pre-dried in a pressure (rapid) dryer.

Automatic handling systems for the whole dyeing - hydroextraction - drying sequence of operations can be studied and supplied directly by STALAM in co-operation with the most specialised European manufacturers.

Work frequency of generators	(I.S.M.) 27.12 MHz ± 0.6%
Cooling system of generators	water or air
Average evaporation rates	1.2 ÷ 1.3 kg (H ₂ O)/kW(RF)h



BENEFITS

- Rapid and uniform drying
- Perfect residual moisture content control (+/-1%)
- No influence of atmospheric conditions on drying
- No thermal or mechanical stress on the product
- No discolouring, no yellowing, no hairiness, no strength loss
- More softness, better touch, minimum conditioning time
- Outstanding operational flexibility (one machine for all products)
- Modular construction to meet every production requirement
- User- and environmentally- friendly operation
- Continuous and “just in time” operation
- Instantaneous start / stop (no need for pre-heating / cooling)
- Outstanding reliability even in harsh working environments
- Low overall running cost

MODELS

OUTPUT RF POWER	PRODUCTION CAPACITY (KG/H) *			DIMENSIONS L(m) x W(m) x H(m)
	synthetics (acr, pes, ny, etc.)	wool and blends (wo/acr, cot/pes, pes/visc, etc.)	silk, cotton, linen viscose	
10 kW	80 ÷ 110	35 ÷ 50	20 ÷ 25	6.0 x 1.7 x 2.8
20 kW	130 ÷ 220	70 ÷ 105	40 ÷ 55	7.5 x 1.8 x 3.3
30 kW	240 ÷ 330	105 ÷ 155	60 ÷ 80	7.5 x 1.8 x 3.3
40 kW	320 ÷ 440	140 ÷ 205	80 ÷ 105	7.5 x 1.8 x 3.3
50 kW	400 ÷ 550	170 ÷ 265	100 ÷ 135	9.0 x 2.4 x 3.3
60 kW	480 ÷ 660	205 ÷ 315	120 ÷ 160	9.0 x 2.4 x 3.3
70/75 kW	580 ÷ 790	250 ÷ 375	145 ÷ 195	9.0 x 2.4 x 3.3
85 kW	680 ÷ 920	290 ÷ 430	170 ÷ 225	9.0 x 2.4 x 3.3
105 kW	over 1000	360 ÷ 510	210 ÷ 280	9.5 x 2.4 x 3.5

* Production capacity may vary depending on product type, loading density, actual moisture content, etc. Contact us for specific information about your product.



CONTACT US

Via dell'Olmo 7
36055 Nove (VI) Italy

T. +39 0424 597400
F. +39 0424 590722

E. stalam@stalam.com
I. www.stalam.com