



# RM

## Continuous Resistance Annealer

Expertise, Customer Driven, Service – in Good Hands with NIEHOFF



# RM

## Design:

- DC multi-wire resistance annealer with single-wire path for bare and coated Cu wires
- drawing machine and annealer forming a single unit
- ergonomic machine design with openly accessible wire paths
- driven haul-off capstan (contact pulley) for constant wire tension in the annealer and reduced wire tension to the downstream spooling system

## Energy and cost efficiency:

- high machine availability
- low energy consumption
- reduced costs of production resources
- high product acceptance achieved by perfect quality

- quick return on investment by a high cost-benefit ratio

## Optional:

- individually driven contact pulleys for high wire surface quality and longer service life of the contact tubes

## Increase in quality:

- consistently high finished wire quality achieved through single-wire drying
- speed-controlled uniform wire annealing at speeds from 0 m/s
- contact tube cleaning device for longer service life and high wire quality in the production of tinned wires
- wire oscillating device for longer life of the contact tubes
- optimum wire drying by patented 2/3-zone-system with reheating (RM 141, RM 161, RM 201)

## Increase in productivity:

- fast wire stringing-up with separately driven auxiliary pulley
- easy-to-change contact tubes with long service life

## Technical data

type		RM 121	RM 141	RM 161/RM 162	RM 201/RM 202	RM 301
max. production speed	m/s	31.5	36	40	40	40
	fpm	6,201	7,087	7,874	7,874	7,874
possible no. of wires		8/16	8/16/24	8/16/20	8/16/24/32	8/16/24/32
finished dia.	mm	0.05 ... 0.25/0.25		0.10 ... 0.64/0.50/0.40		0.40 ... 1.35/0.35 ... 1.15
	AWG	44 ... 30/30		38 ... 22/24/26		26 ... 15 ½ / 27 ½ ... 17
	mm		0.10 ... 0.50/0.40/0.32		0.15 ... 1.05/0.72/0.55/0.48	0.25 ... 0.90/0.25 ... 0.70
	AWG		38 ... 24/26/26		34 ... 18/21/23 ½/24 ½	30 ... 19/30 ... 21 ½
contact pulley dia.	mm	140	140	160	200	300
max. annealing power	kW	23	60	80	180	350
max. annealing current	A	500	2,000	2,000	5,000	7,000
annealing principle		3-zone	2/3 zones	2/3 zones	2/3 zones	2/3 zones
separately driven auxiliary pulley		N/A	standard	standard	standard	standard
individual drives		N/A	optional	optional	optional	standard
water-cooled slip rings		N/A	standard 2000 A optional < 1500 A	standard	standard	standard
machine dimensions (W x D x H) without transformer	m	1.80 x 1.00 x 2.10	2.10 x 1.00 x 2.10	2.20 x 1.00 x 2.30	2.80 x 1.40 x 2.30	3.55 x 2.10 x 3.04
weight without transformer	kg	approx. 2,200	approx. 2,500	approx. 3,000	approx. 4,900	approx. 7,000

## Overall integration for superior performance

The entire line delivers technically innovative solutions for your production targets:

- Convincing combinations of individual NIEHOFF components and the excellent quality standards guarantee superb line availability.
- By using a freely programmable PLC control and standardized interfaces, the line can be combined very effectively with different spooling and coiling systems.

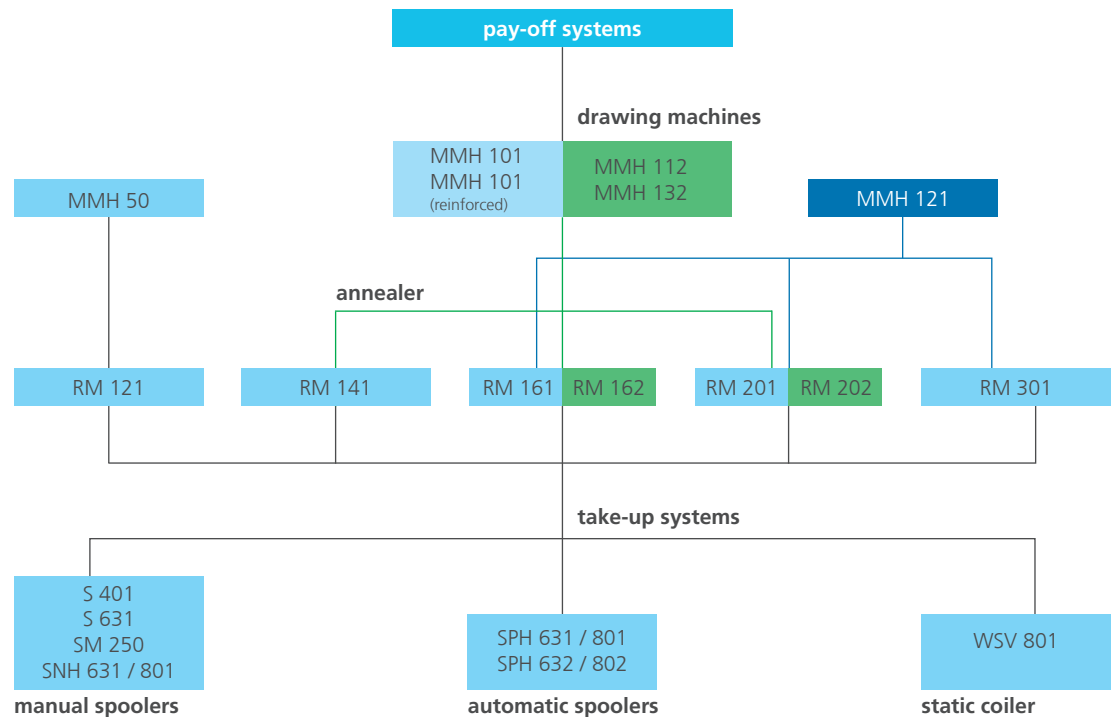
The MMH line concept already incorporates the potential for future integration of systems in overall production processes.

For example for areas such as:

- quality assurance
- operational data acquisition
- materials flow control

**All possible combinations will deliver the ultimate in terms of quality and performance!**

## Suitable for combination and integration



(Further take-up systems are available on request)

# RM



RM 121



RM 141



RM 161



RM 301



RM 201



RM 202

We reserve the right to modify technical specifications according to technical improvement and advances. 05.2022