

Successful winter service



RAUCH winter service spreader for sand, salt and gravel

Precision is our aim

The advantages of the modern and practice-oriented RAUCH spreading technology come to the fore in day-to-day, hard winter service: it has a high level of operational safety, reliability and a long service life.



Maximum safety in traffic with minimum spreading of application material



2

Winter service requires efficient solutions!

The primary aim is to maintain the safety of through traffic. In addition, spreading material costs must be reduced and the environment must be protected. Modern technology is particulary advantageous in the targeted use of spreading salt.

Losses at the edges or even in green areas are to be avoided, and the even distribution of spreading material without gaps must be guaranteed. The required spreading volume must be reduced to achieve significant savings in the spreading material.







Precise and safe spreading patterns

A RAUCH winter service spreaders are characterised by precise trapezoidal spreading patterns with.

Incorporated volume stability

The spreading patterns remain precise even at high travelling speeds and high levels of spreading volume.

Perfect operating comfort - perfect attention to detail

The simple, logical operation and the high proportion of stainless steel make the handling comfortable and safe, even in hard winter conditions.







The AXEO series fulfils all the requirements of a modern professional winter service: precision, high levels of operational safety, a long service life and maximum flexibility in working width.





Winter service made easy



CDA setting centre - operating terminal

Optimum ergonomic, elegant in its ease of use

A slight easily-controlled turn on the CDA setting centre is enough to set the AXEO going rapidly with precise spreading properties and spreading symmetry. At the same time, the spread volume adjustment also takes place at an ergonomically optimum position on the setting centre. No direct contact with the spreader vanes is needed when applying settings.

Saving costs and protecting the environment

Spreading material savings of up to 30% can be achieved by using the AXEO with exact volume metering and precise adjustment to the ideal working width. This includes considerably reduced costs for the repair of damage caused by spreading, e.g. tree damage repair.

Safety is written in large letters

Safety grids as standard: prevent injury from rotating agitator in hopper. Prevent problems with spreading e.g. lumps in the spreading material. Spreading disc protection as standard: access-preventing cover on top provides protection against injury caused by the rotating spreading disc. The safety grid and spreading disc protection meet the safety requirements in the European standard for winter service machines.





Maximum flexibility in working width

Whether using impact-type spreading over the entire working width, the smallest spreading width for walkways or single-sided spreading on the left or right, the variable spreading width limiter handles all applications. No damage to parked vehicles or covering of grass verges. Also available with electrical remote control, if required. Working widths of 1 to 8 m can be accurately set.

AXEO brings performance to the street

The patented AXEO "CDA" spreading concept consists of the spreading disc with eight spreader vanes and a speed of 230 r.p.m., together with a large and intelligently-shaped metering slide opening, located in the rotating hopper base. This well-designed system achieves even lateral and longitudinal distribution with steeply falling-away spreading flanks, a so-called trapezoidal spreading pattern, even at high working speeds.

Despite its compact structure, the AXEO provides adequate clearance for comfortable handling and simple, rapid cleaning and servicing.



Separate spreading pattern limitation left and right









Equipment made to measure

The large track width of the tractor unit requires matched drive and operating concepts: •drive via universal shaft at 540 r.p.m.

- •drive by hydraulic motor 100 cm³ (AXEO 2.1 and 6.1) (required oil volume min. 10 l - max. 40 l)
- •drive by hydraulic motor 200 cm³ (AXEO 18.1) (required oil volume min. 45 l - max. 65 l)
- •NEW: All AXEO units with a hydraulic drive are now fitted with a flow regulating valve for simple and convenient setting of the spreading disc speed.

Special equipment for added flexibility

Diverse hopper add-ons • folding hopper tarpaulin cover • electrical remote control for spreading width limitation • electrical or hydraulic remote control for the metering slide • universal drive shaft with star ratchet overload safety device • lighting for AXEO 2.1, 6.1 • spreading apron to protect from spray • electronic spreading volume metering via QUANTRON-K spreading computer

The right agitator makes a difference



RWK AX 160 for gravel



RWK AX 140 for granulated fertiliser



RWK AX 180 for sand/damp salt

RWK AX 220 for dry salt (sacks/silo)



Low wear and secure

The innovative AXEO agitator concept consistently takes the various requirements of individual spreading materials into account.

Result: even and fault-free overrun, even with problematic spreading material quality.

Typical RAUCH: The AXEO agitators are made from highly wear-resistant materials and can be changed without the need for tools.

AXEO advantages

- 1. Outstanding metering and distribution accuracy
- 2. Increased application safety through use of effective agitators and steep hopper side walls
- 3. Comfort and environmental protection with the QUANTRON-K spreading computer
- 4. More output by higher payload for longer spreading lengths
- 5. A long service life as a result of powder coat painting and high proportion of stainless steel
- The agitator rotates in the starter ring and protects the hopper.



QUANTRON-K

- Precise speed-dependent metering of spreading material
- Remote setting of working and sectional widths (optional)
- ✓ Environmentally friendly
- Efficient handling of valuable spreading material
- ✓ Stress-free working



Metering Electronics for People Who Want More

QUANTRON-K is the electronic spreading volume metering device for the whole AXEO-Family.

The new electronic spreading volume regulation QUANTRON-K represents the introduction of a new technology into community winter service. Modern electronics increase operator comfort and facilitates optimisation economical and ecological optimisation.

Intelligent technology for greater efficiency and convenience

The QUANTRON-K spreading computer always automatically regulates the correct spreading volume according to the travelling speed of the tractor. The opening and closing of the metering slide is carried out easily by pushing a button; if the driver halts, e.g. at a crossroads, the QUANTRON-K spreading computer automatically closes.

Plus-Minus function

The Plus-Minus function can be used by the driver to set, to the second, the spreading volume to suit the snow and ice conditions.



Documentation

QUANTRON-K stores up to 200 applications with the name, spread section, volume of spreading material applied (kg) and the time required to do so.

Typical Rauch: all electronic components, such as the actuators, section connections or cables are designed to cope with hard day-to-day use with salt and gravel. Spray water protected.

QUANTRON-K advantages

- 1. Regardless of travelling speed the volume will be regulated
- 2. Large, non-reflecting display with clear menu guidance for simple operation
- 3. Rapid and convenient matching of the spreading width whilst driving along (optional)
- 4. Special function: for increased safety at dangerous locations the spreading volume can be increased for a brief period by pushing a button
- 5. Documentation of 200 applications

SA 121/250/360

No compromise where safety is concerned!



Bolt-on spreader SA 121 – high performance with small tractors

The SA 121 demonstrates its strength wherever precise spreading technology in a compact small structure is required.

The standard spreading width limitation permits continuous adjustment of the spreading width from 0.8 – 5.0 m. Convenient, fast and simple setting of the spreading volume with a single hand operating lever. The electrical or mechanical remote control for metering slide and spreading width can simplify the setting process (special equipment). The setting for even distribution is affected by adjusting the spreading vanes. The steep side walls allow problem-free sliding down of the spreading material. Specially developed agitators facilitate problem-free delivery of various spreading materials:

- RWK 8 for gravel and granulated fertiliser (optional)
- Hook agitator RWK 10 for sand-salt mixture (optional)



SA 121 advantages

- 1. Effective agitators and steep hopper side walls for better usage readiness
- 2. Rapid and simple adjusting of the spreading width saves on spreading material
- 3. Increased safety: safety grids as standard
- 4. Precise metering and lateral distribution
- 5. High attention to detail e.g. by powdercoating paint

Special equipment SA 121/250/360

- Agitators to suit the application conditions
- Remotely controllable metering slide and spreading width limitation (mechanical, electrical or hydraulic)
- Lighting
- Hopper covers
- Attachment for SA 121





Bolt-on spreader SA 250/360

SA 250 and 360 (250 l and 360 l content) stand for operational safety and impact in all weathers.

Universal drive shaft or hydraulic variants facilitate flexible, efficient deployment using the most varied of vehicles

Versatile drive variants:

Universal shaft drive (540 r.p.m.)

Fitted with an oil bath gearbox as standard, the spreading disc speed is approx. 345 r.p.m. and thus provides an optimum spreading pattern.

Driven by hydraulic motor

- 100 cm³: required oil volume min. 20 l max. 40 l
- 200 cm³: required oil volume min. 45 l max. 65 l

The right agitator for every application



RWK 5

For gravel and

granulated fertiliser



RWK 4 For gravel and gravel-salt mixture



RWK 2 For sand and salt

Equipment made to measure

As standard, the SA has manual implementation of the various functions. Mechanical remote control via Bowden cable, electrical or hydraulic remote control increase the operational convenience (optional).

Precision included

Spreading volume regulation carried out via two metering openings. These can be adjusted separately and allow combination of the tool-free rotation of the hopper base and adjustment of the spreading vanes, single-sided spreading to the right or to the left or adjustment for various spreading materials. As standard with spreading width limitation made of stainless steel: spreading widths 0.8 – 6.0-m (remote controlled on request).

SA 250 / 360 advantages

- 1. Universal shaft or hydraulic drive fits behind any tractor
- 2. Effective agitators and steep hopper side walls for better operational safety
- 3. Rapid and simple matching of the spreading width saves spreading material
- 4. Exact metering and lateral spreading for more safety
- 5. High attention to detail, e.g. the oil bath gearbox for a long service life

UKS

Universal box spreader – the versatile precision control system for winter service, sports arenas and special areas





Agitator shaft



Adjustment segment: precise and convenient

UKS Advantages

- 1. Spreading width remains constant, ideal for footpavements
- 2. Precise metering saves spreading material
- 3. Versatile application with salt, sand, gravel, seeds and fertiliser
- 4. Increased safety: safety grids as standard
- 5. Simple to clean by folding hopper base

The pavement professionals

Precise

The specially shaped metering slide makes it possible to carry out exact volume regulation of less than **10 g/m² of salt up to more than 400 g/m² of gravel/sand.** Depending on the model, the safe working width is 0.8-m, 1.0-m or 1.2-m.

Safe

The unique agitator shaft with flexible agitation fingers feeds the spreading material to the metering slide openings and ensures problem-free metering of **all** known spreading materials, even those with problematic flow properties.

Universal

Particularly suited to the spreading of melting and blunting spreading materials, and also provides high precision spreading of seeds and fertilisers in the summer.

The following drive variants are possible:

- Universal shaft drive (540 r.p.m.)
- Drive via hydraulic motor required oil volume from 12 l/min to 25 l/min

Optional: hydraulic flow regulation valve for fine tunning of the spreader shaft speed

Special equipment for added flexibility

Various hopper add-ons, lighting, hopper cover tarpaulins, electronic or mechanical remote control, equipment triangle Cat 1.



K 51

Spreading combination K 51 with ground drive – ideal for sliding or for use with lawn tractors



The "Little RAUCH" with 60 kg payload and just 24 kg empty weight. An optimum solution for all applications: be it a narrow strip spreading at 0.5-m working width or wide spreading with a width of up to 5.0-m. The easily-accessible operating lever makes fine tunning of stepped volume possible. Simple, exact edge spreading via one-sided adjustment of the spreading width limitation. The drive for the spreader discs and the agitator is provided by **two ground wheels** to ensure an **even spreading pattern**, even when travelling round corners. The high quality pneumatic tyres (26 x 8 cm) provide non-slip drive, easy handling and high levels of travelling comfort. Comfortable safe travelling and turning, even under maximum load, are provided by the differential gear. The de-coupling of the drive from the agitator when driving to the site of application protects the spreading material.

Typical RAUCH:

High quality gearbox and important parts, such as the hopper base, slide, spreading discs, spreading width limitation and spreader vanes are made of stainless steel.



K51 Advantages

- 1. Flexible drive push or pull
- 2. Half-side spreading for sharply limited edge spreading possible
- 3. Precise metering for sand, gravel, fertiliser. Seeding and oil binding materials
- 4. Sturdy gearbox with differential gear, disengageable drive for road travel
- 5. High quality attention to detail, important parts made of stainless steel



Performance data

		SA 121	SA 250	SA 360	
Capacity	Litres	120 (with attachment 165)	250	360	
Empty weight	kg	55	105	110	
Max. payload	kg	180	500	500	
Dimensions in cm (L x W x H) cm		85 x 85 x 82	100 x 90 x 107	110 x 100 x 118	
Spreading width	m	0,8 - 5,0	0,8 - 6,0	0,8 – 6,0	
Hitch		3-point Cat 1N	3-point Cat 1	3-point Cat 1	
Drive r.p.m.	U/min	540 or hydraulic motor			
Spreading length*	km	2,4	5 7,2		
* at 20 a/m^2 solt (1.2 kg/l specific weight) 2 m spreading width					

* at 30 g/m² salt (1.2 kg/l specific weight) 2 m spreading width

	AXEO 2.1	AXEO 6.1	AXEO 18.1	
Liter	250	560	750	
kg	130	160	230	
kg	800	1000	1800	
Dimensions in cm (L x W x H) cm		95 x 120 x 123	120 x 150 x 129	
m	1,0 - 8,0	1,0 - 8,0	1,0 – 8,0	
	3-point Cat I	3-point Cat I	3-point Cat II	
U/min	540 or hydraulic motor			
km	5	11,2	15	
	kg kg x H) cm m U/min	Liter 250 kg 130 kg 800 xH) cm 87 x 100 x 96 m 1,0 - 8,0 Jumin 3-point Cat I	Liter 250 560 kg 130 160 kg 800 1000 xH) cm 87 x 100 x 96 95 x 120 x 123 m 1,0 - 8,0 1,0 - 8,0 Joint Cat I 3-point Cat I 3-point Cat I U/min 540 or hydraulic motor	

* at 30 g/m² salt (1.2 kg/l specific weight) 2 m spreading width

Attachment	AXEO 2.1	AXEO 18.1					
	Total volume I	Total volume I	Payload kg	Total fill height cm	Total empty weight kg	Hopper size (W x L) cm	
AX 100	350	-	800	110	144	87 x 100	
AX 250	-	1000	1800	144	253	120 x 150	
AX 500	-	1250		158	265	120 x 150	
AX 750	-	1500		173	277	120 x 150	

		UKS 80	UKS 100	UKS 120	K 51
Capacity	Liter	165	200	240	55
Empty weight	kg	105	120	136	29
Max. payload	kg	500	500	500	60
Dimensions in cm (L x W x H) cm		70 x 98 x 75	70 x 118 x 75	70 x 138 x 75	58 x 58 x 73
Spreading width	m	0,8	1	1,2	0,5 – 5
Hitch		3-point Cat I	3-point Cat I	3-point Cat I	Hand top pulled
Drive r.p.m.	U/min	540 or hydraulic motor			Ground wheel
Spreading length*	km	8,25	8	8	1,10

* at 30 g/m² salt (1.2 kg/l specific weight) 2 m spreading width (excluding UKS with 0.8 m, 1.0 m or 1.2 m spreading width)



Quality made by RAUCH

Uncompromising attention to detail: **Powder coating!**



Powder coating and curing

- ✓ Optimum corrosion protection
- ✓ Optimum surface quality
- ✓ Optimum abrasion resistance
- ✓ Optimum scratch resistance
- Optimum acid-resistance
- ✓ Optimum value retention



Well thought-out and planned



Tested and monitored



Tried and tested in practice

The modern production plant meeting the newest standards ensures enduring high quality of the machines.

High-quality powder coating, the use of stainless steel components and UV-stabilised plastics provide protection against rusting and ensure a long service life.



RAUCH is one of the world's leading manufacturers of winter service and agricultural fertiliser spreaders with a core competence of metering and distribution of spreading materials of all types.

This knowledge, gained over a period of decades, is the basis for continuous innovation and continuous development.



RAUCH factory at the Baden Airpark



RAUCH Competence Centre

- Specialist RAUCH sales partners offer competent advice and practical and expert assistance whenever and wherever it is needed.
- In the RAUCH customer centre specialists answer all technical questions and provide "First Aid".
- Standstill costs time and money: overnight spare parts provision provides security when it's actually needed.
- The fastest route to valuable information: www.rauch.de

We reserve the right to carry out modifications in the interests of product improvement.

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