# MUNICIPAL TECHNOLOGY

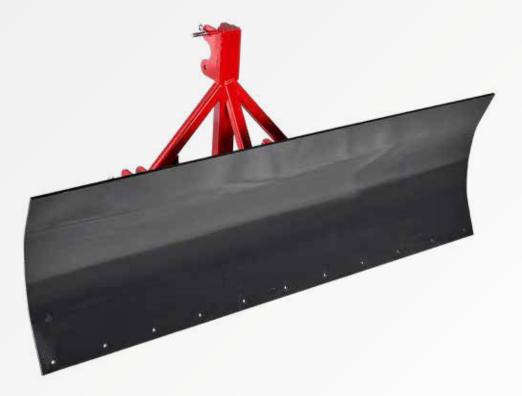
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# DOZER SHIELD RS





SAPHIR dozer shields RS are used for light levelling and clearance work. They are particularly suitable for smaller tractors because of their low own weight. The shields stand out because of their robust design and simple operation.



- Stable parking foot
- Can be tilted by 30 degrees mechanically by plug bolts
- Sliding plates can be adjusted without tools
- Attachment on front and rear Cat. I/II
- Optional polyurethane scraper bar
- Shield body of 12 mm steel sheet



Name	RS 2200	RS 2500
Approx. working width in mm.	2.200	2.500
Blade height approx. (mm)	710	710
Attachment	Kat. I / II	Kat.   /
Power requirement approx. (kW/HP)	18 / 25	18 / 25
Approx. weight in kg	235	257
Order-No.	574401310-2	574401311-2
€/piece	1.220,00 €	1.330,00 €

## Note: Goods are supplied fully fitted

### Special fittings

Name	Order-No.	€/piece
<b>RS 2200 polyurethane scraper bar</b> ( 150 x 20 mm )	574001099	390,00 €
<b>RS 2500 polyurethane scraper bar</b> ( 150 x 20 mm )	574001100	400,00 €

# DOZER SHIELD CONTOUR



SAPHIR dozer shields CONTOUR are robust, mechanically adjustable shields for light levelling work and road construction with tractors with a capacity of up to 73kW/100HP. They are also suitable for snow clearance. The shield body can be panned 360 degrees as standard. Thus, the shield can also be used when attached at the front. It is locked by a locking pin in steps of 22.5 degrees each.



Attachment on front and rear Cat. I/II with stable parking support



Screwed highly wear-resistant scraper bar (500 HB)



Can be swivelled mechanically by 360° (also suitable for front attachment)



Optional central support wheel, with pneumatic tyres and adjustable by spindle for optimum height guidance



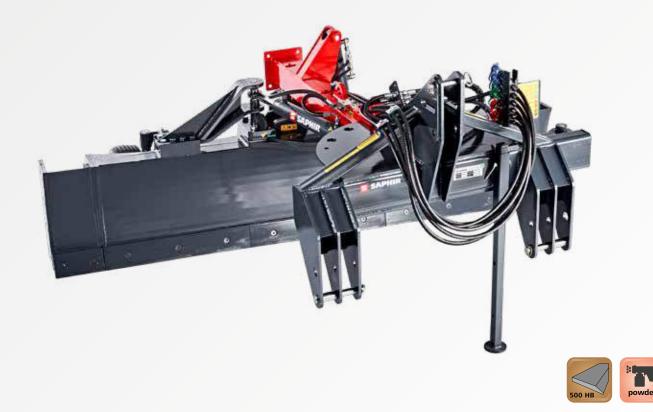
Name	C2000	C2500	C3000
Approx. working width in mm.	2.000	2.500	3.000
Blade height approx. (mm)	550	550	550
Attachment	Kat. II	Kat. II	Kat. II
Power requirement approx. (kW/HP)	29 / 40	36 / 50	44/60
Approx. weight in kg	450	500	550
Order-No.	574401320-2	574401321-2	574401322-2
€/piece	2.290,00 €	2.470,00 €	2.650,00 €

## Note: Goods are supplied fully fitted

## Optional extras

Name	Order-No.	€/piece
<b>Design S</b> can be swivelled to the side out of centre by 800 mm	574001089-2	320,00 €
Pair of pneumatic stabilisers	574001064	810,00 €
Pneumatic, spindle adjustable central stabiliser	574001066-2	720,00 €
Polyurethane scraper bar C2000 For winter service, loose accessories kit (150 x 20 mm)	574001090	350,00 €
Polyurethane scraper bar C2500 For winter service, loose accessories kit (150 x 20 mm)	574001091	400,00 €
Polyurethane scraper bar C3000 For winter service, loose accessories kit (150 x 20 mm)	574001092	450,00 €
Lighting system inc. warning signs	574001068-2	460,00 €

# DOZER SHIELD PROFI



The SAPHIR dozer shield Profi convinces because of its extremely robust construction. The many different adjustment options and optional extras make it an ideal machine for road construction, levelling work and winter service. The working width can be individually adjusted by screw-on shield adjustments. The optional, hydraulic control components provide for an especially operator-friendly machine. In the base equipment, these operating components can be adjusted mechanically through locking pins or turning spindles. The high own weight also provides for a good dozing effect even under rough conditions.

#### **Basic equipment of the machine:**

- For front or rear attachment Cat II/III
- Shield body can be swivelled mechanically by 180 degrees (for front attachment or tractor with reversing device)
- mechanical side adjustment on both sides by 800 mm
- mechanical inclination adjustment on both sides by approx. 30 degrees
- Screwed-in and three-part, highly wear-resistant scraper bar (120 x 16 mm, 500 HB)
- Device for lateral shield spread
- Shield width: 2,250 mm / shield height: 600 mm
- Hose pipes



The shield is adjusted horizontally by a double-action cylinder. The tilt range is approx. 35 - 55 degrees on both sides. The tilt range can be continuously selected. The hydraulic cylinder is fitted with end cushioning to protect the towing vehicle's hydraulic system.

With the hydraulic tilt adjustment, roof profiles can be created on farm roads. The adjustment range is a max. of approx. 22 degrees on both sides. The adjustment range can be selected continuously. The hydraulic cylinder is fitted with end cushioning to protect the towing vehicle's hydraulic system.

First of all, the scarifier set scarifies the road bed in road construction (200mm). The second step is levelling work with the scarifiers swung upwards.

The shield working width can be extended to a maximum of 3,250 mm with the shield extensions. The shield extensions can be selected separately. Even a one-sided extension of the blade is possible. The attachments for the shield extension are fitted as standard on the shield body.

The side panels are screwed onto the side section or the shield extension. They are angled at 45 degrees. With levelling or road construction materials, slipping into the side area is prevented when the shield body is at an angle.

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# DOZER BLADE PROFI

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The pneumatic stabilisers (16x6.50-8) are used as a guide height for the shield. The height is adjusted with adjustable turning spindles.

An even better height guidance of the shield is guaranteed by the guiding point of the central support wheel (16x6.50-8) pushed back even further. The central wheel can be adjusted infinitely variably by adjusting the spindle. It is tilted to the side of the shield body and locked for transport.

The working depth can be hydraulically set continuously with the hydraulic central support wheel (18x8.50-10). It can be folded completely vertically for transport.



The depth can be adjusted continuously with the hydraulic height guide. The parallel guide ensures an exact guidance. The integrated levelling device creates roof profiles.



Name	PS 2250 PROFI
Approx. working width in mm.	2.250
Blade height approx. (mm)	600
Attachment	Kat. II / III
Power requirement approx. (kW/HP)	58 / 80
Approx. weight in kg	770
Order-No.	574.00910.PS2250-2
€/piece	4.810,00 €

## Special equipment

Name	Order-No.	€/piece
<b>Hydraulic side adjustment</b> 800 mm on both sides (1x da required)	574001056	610,00 €
Hydraulic horizontal blade adjustment 35-55 degrees (1x da. required)	574001055	720,00 €
Hydraulic tilt adjustment max. 22 degrees on both sides, (1 da. required)	574001057	680,00 €
Scarifier set For substrate loosening in road construction	574001279-2	1.170,00 €
Blade extension 250 mm	574001058-2	430,00 €
Blade extension 500 mm	574001059-2	430,00 €
Side panel left	574001060-2	240,00 €
Side panel right	574001061-2	240,00 €
Pair of pneumatic stabilisers (adjustable)	574001064	810,00 €
Pneumatic, spindle adjustable central stabiliser (can be folded)	574001066-2	720,00 €
Pneumatic, hydraulic central support wheel	574001066H	1.580,00 €
Hydr. height guide	574001281-2	1.840,00 €
<b>Polyurethane scraper bar 150 x 20 mm</b> two-sided For winter service ,loose accessory kit	574001067	430,00 €
Electrohydraulic control unit (1 x da. , 12/24 V connection required)	574001069	3.180,00 €
Lighting system inc. warning signs	574001068-2	460,00 €

## ROAD PLANER WP





The SAPHIR road planer WP 20 serves for the effective professional care of not stabilised cover sheets like stone chips or gravel. The robust design is especially suitable for use in forestry, by sub-contracted companies or in the course of road care concepts, in order to level/straighten the upper soil layer. The numerous technical facilities available allow the adaptation to any desired structure of application. The optional, hydraulic control components provide for an especially operator-friendly machine. In the base equipment, these operating components can be adjusted mechanically through locking pins or turning spindles.



Highly wear-resistant scraper bars (500 HB) that can be screwed with a shield with of 2.000 mm



Optional vertical adjustment of scraper bar +/- 25°



Optional hydraulic lateral adjustment left / right for 800 mm each

Optional hydraulically adjustable shield body on both sides by 60°



Optional electrical-hydraulic control





Name	WP 20 road planer
Approx. working width in mm.	2.000
Blade height approx. (mm)	600
Attachment	Kat. II/III
Power requirement approx. (kW/HP)	50 / 68
Approx. weight in kg	680
Order-No.	574.00911.WP20
€/piece	6.650,00 €

## Note: Goods are supplied fully fitted

## Special fittings

Name	Order-No.	€/piece
Hydraulic side adjustment 800 mm on both sides (1 da required)	574001056	610,00 €
Hydraulic horizontal blade adjustment 60° on both sides (1 x da. required)	574001055	720,00 €
<b>Hydraulic tilt adjustment</b> +/- 25°, (1 x da. required)	574001057	680,00 €
<b>Optional vertical adjustment of scraper bar +/- 25°</b> (1x da required)	574003893	610,00 €
Pneumatic, spindle adjustable central stabiliser (can be folded)	574001066-2	720,00 €
Pneumatic, hydraulic central support wheel	574001066H	1.580,00 €
Polyurethane scraper bar 150 x 20 mm two-sided	574001067	430,00 €
Electrohydraulic control unit (required: 1 x da, 12/24 V connection)	574001069	3.180,00 €
Lighting system inc. warning signs	574001068-2	460,00 €

# SWEEPER FKM





The SAPHIR sweeper FKM are intended for use with agricultural tractors attached to either the front or rear (with the front attachment a 3rd stabiliser is required). The mechanical tilting device enables the machine to be set at an angle. Thus the machine can be used as a standalone sweeper (without the collection tank). The sweeping roller is driven by a powerful oil motor which is driven by the tractor hydraulic system.



- Fitted with dirt collection vessel as a standard
- Protective cloth as splash guard
- Plastic bar at the dirt collection vessel prevents stones from being hurled through and scratches on the floor covering
- Honeycomb-shaped brush rings 520 mm made of high wear-resistant plastics
- Optional water spray device
- Optional side sweeping brush
- Adjustable lower linkage adjustment Cat. I/II
- Mechanical swivelling device
- Running wheels, height-adjustable without tools
- Branded support wheels 200 x 50 mm



Name	FKM 151 sweeper	FKM 181 sweeper	FKM 231 sweeper
Approx. working width in mm.	1.500	1.800	2.300
Approx. total width (mm)	1.850	2.150	2.620
Brushes Ø (mm)	520	520	520
Required oil quantity approx. (l) (170 bar)	25	25	25
Attachment	Kat. I/II	Kat. I/II	Kat. I/II
Number of brush rings	30	36	46
Approx. weight in kg	260	285	310
Order-No.	526.00548.FKM151-2	526.00549.FKM181-2	526.00550.FKM231-2
€/piece	2.190,00 €	2.290,00 €	2.490,00 €

## Special equipment

Name	Order-No.	€/piece
Hydraulic emptying (Loose accessories kit)	526140482	510,00 €
Hydraulic emptying (1x da necessary, installed with initial equipment)	526140484	620,00 €
Hydraulic tilting device (1x da required, loose accessories kit)	526140483	380,00 €
3. All-rubber support wheel 200 x 50 mm (Necessary for front attachment, incl. upper linkage chain (loose accessories kit))	526000546	280,00 €
Extra big 3rd All-rubber support wheel 250 x 60 mm rail-safe (Necessary for front attachment, incl. upper linkage chain (loose accessories kit))	526002182	430,00 €
Side sweeping brushes with spring component, speed adjuster, cut-off valve, plastic edging (3rd support wheel mandatory for front attachment) initial equipment completely installed, right side	526000413-2	1.350,00 €
Mixed stock FKM/GKM 151 Plastic and metallic brush rings	526001135	640,00 €
Mixed stock FKM/GKM 181 Plastic and metallic brush rings	526001136	700,00 €
Mixed stock FKM/GKM 231 Plastic and metallic brush rings	526001137	790,00 €
FKM 151 Water spraying device 150 litres, 3 nozzles, 12 Volt pump	526000575	1.680,00 €
FKM 181 Water spraying device 150 litres, 4 nozzles, 12 Volt pump	526000576	1.720,00 €
FKM 231 Water spraying device 150 litres, 5 nozzles, 12 Volt pump	526000577	1.760,00 €

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# SWEEPER GKM





The SAPHIR sweeper GKM are intended for use with forklift trucks, farm and wheel loaders and tractors when attached to the front. The device is attached as standard by the retaining pockets on the fork tines of the forklift truck. The tool has a levelling device with a read-out display. The third support wheel and the dirt collection vessel are included in the delivery scope as a standard.



Also available with special painting in red.



- Protective cloth as splash guard
- Plastic bar prevents stones from being hurled through and scratches being caused on the floor covering
- Honeycomb-shaped brush rings 520 mm made of high wear-resistant plastics



#### Technical data

Name	GKM 151 sweeper	GKM 181 sweeper	GKM 231 sweeper
Approx. working width in mm.	1.500	1.800	2.300
Approx. total width (mm)	1.850	2.150	2.620
Brushes Ø (mm)	520	520	520
Required oil quantity approx. (l) (170 bar)	25	25	25
Attachment	Fork tines	Fork tines	Fork tines
Number of brush rings	30	36	46
Approx. weight in kg	260	285	310
Order-No.	526.00551.GKM151-2	526.00552.GKM181-2	526.00553.GKM231-2
€/piece	2.630,00 €	2.710,00 €	2.870,00 €

### Select the attachment

	Benennung	BestNr.	€/piece
N	Fork tine attachment	526GKMGABEL	Series
	Farm and wheel loader up to 2.5 t lifting power	526GKMHOFRAD	490,00 €
0	Euro attachment	526GKMEURO	490,00 €
N	Combined mount Cat. II three point, fork tines mount	526003524	650,00 €

## Special fittings

Name	Order-No.	€/piece
Hydraulic emptying (Loose accessories kit)	526140482	510,00 €
Hydraulic emptying (Installed with initial equipment, 1x da required)	526140484	620,00 €
Hydraulic tilting device (1x da required, loose accessories kit)	526140483	380,00 €
Extra big 3rd All-rubber support wheel 250 x 60 mm rail-safe (necessary for front attachment) incl. upper linkage chain (loose accessories kit))	526002183	240,00 €
Side sweeping brushes as addition Installation possible at right or left side	526000413-2	1.350,00 €
<b>Side sweeping brushes</b> with self- locking roller balacing Fully installed ex works at the right side, on the left side on demand	526005747	1.620,00 €
Self-locking roller balancing Mandatory when fitting with side sweeping brushes	526000386	270,00 €
Mixed stock FKM/GKM 151 Plastic and metallic brush rings	526001135	640,00 €
Mixed stock FKM/GKM 181 Plastic and metallic brush rings	526001136	700,00 €
Mixed stock FKM/GKM 231 Plastic and metallic brush rings	526001137	790,00 €
GKM 151 Water spraying device 150 litres, 3 nozzles, 12 Volt pump	526000590	1.680,00 €
GKM 151 Water spraying device 150 litres, 4 nozzles, 12 Volt pump	526000591	1.720,00 €
GKM 151 Water spraying device 150 litres, 5 nozzles, 12 Volt pump	526000592	1.760,00 €

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# SWEEPER PKM



SAPHIR professional sweepers of the PKM series are effective, robust machines for cleaning streets, building sites, squares, depots and large farm facilities. The 650 mm diameter sweeper roller is fitted as standard with a very watertight edging of beeline brush rings.



Hydraulic tilting device (30° degrees)



Level compensation incl. height indicator (lockable)



All-rubber heavy-duty running wheels



Internal oil motor Compact valve with safety valve (shock valve protects the motor from overload using free wheeling)



Name	PKM 23 sweeper	PKM 26 sweeper	PKM 29 sweeper
Approx. working width in mm.	2.300	2.600	2.900
Approx. total width (mm)	2.500	2800	3100
Transport width when tilted approx. (mm)	2.300	2.560	2.820
Number of brush rings (piece)	50	58	63
Can be tilted hydraulically	30°	30°	30°
Required quantity of oil approx. (I)	35-70	35-70	70-90
Internal hydraulic motors (piece)	1	1	2
Oil connections required	2 x dw	2 x dw	2 x dw
Approx. weight in kg	580	610	645
Order-No.	526.01225.PKM23	526.01226.PKM26	526.01227.PKM29
€/piece	6.650,00 €	7.360,00 €	7.990,00 €

#### Attachment

	Name	Order-No.	€/piece
05	Euro attachment	526PKMEUR	Series
	Farm and wheel loader up to 2.5 t lifting power	526PKMHOFRAD	Series
	Wheel loader and telescopic loader starting with 2.5 t lifting power	526PKMRADTELE	Series
	Attachment Cat. II	526PKMKATII-S	Series
	Fork tine attachment	526PKMGABEL	Series

### Optional extras

Name	Order-No.	€/piece
Hydr. dirt container with 3rd Support wheel PKM 23 (340 litres)	526001603	1.330,00 €
Hydr. dirt container with 3rd Support wheel PKM 26 (375 litres)	526001604	1.480,00 €
Hydr. dirt container with 3rd Support wheel PKM 29 (430 litres)	526001605	1.630,00 €
Side sweeping brushes	526001609-1	1.480,00 €
Mixed stock PKM 23 Plastic and metallic brush rings	526001612	630,00 €
Mixed stock PKM 26 Plastic and metallic brush rings	526001613	680,00 €
Mixed stock PKM 29 Plastic and metallic brush rings	526001614	730,00 €
LED side lights LED 12/24 V	526001587	270,00 €
Hydraulic conversion Manually with the help of 2 x three-way valve	526001585	340,00 €
Electrohydraulic switch over Electrical-hydraulic (6/2-way valve 12 V/90 ltr/min)	526001622	470,00 €
PKM 23 Water spraying device 150 litres, 5 nozzles, 12 Volt pump	526001606	1.760,00 €
PKM 26 Water spraying device 150 litres, 6 nozzles, 12 Volt pump	526001607	1.810,00 €
PKM 29 Water spraying device 150 litres, 6 nozzles, 12 Volt pump	526001608	1.860,00 €
Hydraulic lifting For attachment at municipal mounting plates	526002133	2.670,00 €
Flow control valve required above 90 l/min towing vehicle delivery rate	526001623	510,00 €

## SWEEPER SKM

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The SAPHIR sweeper SKM are effective, robust machines for cleaning streets, building sites and large farm facilities. The 800 mm diameter sweeper roller is fitted as standard with a very watertight edging of beeline brush rings. The large brush diameter guarantees a long service life and also ensures very good sweeping results even under the harshest conditions. The big, pneumatic heavy-load running wheels ensure optimum guidance of the machine even on uneven terrain. The sweepers can be fitted with almost any common attachments for wheel and telescopic loaders, tractors (Cat. II) and also with fork tine attachments. A levelling device with height display is incorporated as standard on all attachments. The sweeper roller is driven by two internal oil motors. The motors are therefore ideally protected against collision. The machines are fitted as standard with a hydraulic tilting device.



Hydraulic swivelling device fitted as a standard

Internal oil-motors with shock valves



With heavy-duty running wheels as a standard



Level compensation incl. height indicator (lockable)



Name	SKM 28 sweeper	SKM 33 sweeper
Approx. working width in mm.	2.800	3.300
Approx. total width (mm)	3.050	3.500
Transport width when tilted approx. (mm)	2.950	3.200
Number of brush rings (piece)	39	45
Can be tilted hydraulically	30°	40°
Required quantity of oil approx. (I)	70-90	70-90
Oil connections required	2 x da	2 x da
Approx. weight in kg	490	560
Order-No.	526.01219.SKM28	526.01221.SKM33
€/piece	5.930,00 €	6.590,00 €

#### Mounts



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Name	Order-No.	€/piece
Wheel loader and telescopic loader starting with 2.5 t lifting power	526RADTELE-S	Series
Attachment Cat. II	526KATII-S	Series
<b>Fork tine attachment</b> (Internal pocket dimension 160 x 60 mm)	526001503	350,00 €

## Special fittings

Name	Order-No.	€/piece
LED side lights LED 12/24 V	526001587	270,00 €
Flow control valve required above 90 l/min towing vehicle delivery rate	526001623	510,00 €
Hydraulic conversion Manually with the help of 2 x three-way valve	526001585	340,00 €
Electrohydraulic switch over Electrical-hydraulic (6/2-way valve 12 V/90l//min)	526001622	470,00 €
SKM 28 Water spraying device 150 litres, 6 nozzles, 12 Volt pump	526002186	1.740,00 €
SKM 33 Water spraying device 150 litres, 8 nozzles, 12 Volt pump	526002187	1.790,00 €
Hydraulic lifting For attachment at municipal mounting plates	526002133	2.670,00 €

# SWEEPING BROOM KB





The SAPHIR KB sweeping broom are used for the quick cleaning of silo panels or yard facilities. The 12 rows of high-quality plastic brushes effortlessly remove silage residues, leaves, grain and much more. The sweeping broom is attached as standard via a fork tine attachment or with an optional quick-change attachment. The parking supports included as standard also allow the sweeping brush to be set down gently.



As standard with parking supports on the left and right to prevent the brushes from kinking



Standard mount for forks with a maximum cross-section of 130 x 60 mm



High quality and replaceable PP plastic brushes, 12 rows, 280 mm high



Optional quick-change holder with the patented SAPHIR Variable Lock System (VLS)



Name	sweeping broom KB 15	sweeping broom KB 20	sweeping broom KB 25	sweeping broom KB 28
Approx. working width in mm.	1.495	2.000	2.495	2.830
Approx. total width (mm)	1.545	2.050	2.545	2.880
Height	450	450	450	450
depth	1.165	1.165	1.165	1.165
Number of rows of brushes	12	12	12	12
Approx. weight in kg	190	240	290	325
Order-No.	526KB15	526KB20	526KB25	526KB28
€/piece	1.650,00 €	2.050,00 €	2.290,00 €	2.590,00 €

#### Attachment

	Name	Order-No.	€/piece_
	Fork tine attachment	526KBGABEL	Serie
0	Euro attachment	526KBEURO	590,00 €
	Farm and wheel loader up to 2.5 t lifting power	526KBHOFRAD	590,00 €
	Wheel loader and telescopic loader starting with 2.5 t lifting power	526KBRADTELE	750,00 €

## Special fittings

Name	Order-No.	€/piece
LED side lights	526001587	270,00 €