

ENGLISH



SCHURR cow-brush
2-brush-system
Type B00 / Type C12

OPERATING INSTRUCTIONS

Retain for future reference

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1 Identification data

Model:	SCHURR cow-brush type B00 (Standard-motor) SCHURR cow-brush type C12 (EC-motor)
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Serial number:	see designation plate on device
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Year of manufacture:	see designation plate
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Manufacturer's address

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Ordering of spares and customer service

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Purpose of document

These operating instructions are designed to make the person responsible for the SCHURR Cow-brush familiar with the following:


- mode of operation
- operating
- safety notes
- maintenance

Operating personnel

The SCHURR Cow-brush may be operated exclusively by persons who have read and understood the operating instructions and safety notes.

Additional requirements, qualifications and skills are detailed in each chapter.

Notation used

Keyword	Notation	Meaning
<i>Safety notes</i>	Bold and <i>cursive</i>	indicate facilities or actions that protect the user and the environment from damage
	Symbol	indicates an action for the operator
(25)	Round brackets	indicate the numbering of a component

Notation used in conjunction with the safety notes is described in Chapter 2 'Basic safety notes'.

Storage

The operating instructions are to be kept at or near the machine at all times, and must always be at hand.

User feedback

Dear valued customer,

These operating instructions are updated regularly by us. Your suggestions for improvement will help to produce operating instructions that are more and more user friendly.

2 Basic safety notes

2.1 Observe notes in the operating instructions

- The basic requirement for handling and operating this machine in a safe and error-free manner is the knowledge of the basic safety notes and the safety regulations.
- These operating instructions contain the most important notes for safe operation of the machine.
- These operating instructions, in particular the safety notes, must be observed by all personnel operating this machine.
- In addition, the rules and regulations applicable to accident prevention at the place of use are to be observed.

2.2 Duties of the person responsible for the machine

The person responsible for the machine is obliged to allow operation of the machine only by those persons who

- are familiar with the basic regulations concerning work safety and accident prevention, and are trained in the handling of the machine.
- have read and understood the safety chapter and warning notes in these operating instructions.

2.3 Duties of the operator

All persons who are to operate the machine are obliged, before commencing work,

- to observe the basic regulations concerning work safety and accident prevention
- to read and understand the safety chapter and warning notes in these operating instructions.

Schurr-Gerätebau GmbH is available for enquiries where questions remain unanswered.

2.4 Dangers when operating the machine

The machine is constructed according to state of the art technology and recognised technical safety controls. Nevertheless, the use of the machine can lead to danger to life and limb for the operator or a third party, or harm to the machine or other material assets.

The machine is only
to be used

- for the intended purpose
- in a state where technical safety is not compromised.

Failures that can impair safety are to be rectified immediately.

2.5 Guarantee and liability

In principle, our 'General Conditions of Business' are applicable. These are available to the person responsible for the machine. If this is not the case, they can be requested.

Any guarantee or liability claim in the event of damage to persons or property is excluded when it can be ascribed to one or more of the following causes:

- Use of the machine for a purpose other than its intended purpose.
- Inappropriate installation, commissioning, operation and maintenance of the machine.
- Operation of the machine in conditions where safety equipment is defective, or improperly installed or incorrectly functioning safety and protection equipment.
- Disregarding of the notes in the operating instructions dealing with transport, storage, installation, commissioning, operation and maintenance of the machine.
- Unauthorised structural modifications to the machine.
- Unauthorised modifications to the machine, e.g. drive ratios - output and rotation speed.
- Faulty monitoring of machine parts subject to wear and tear.

- Repair work not properly performed.
 - Loose collars on the animals.
 - Tail hair (tufts) too long - these should be kept short. (not longer than 10-15cm)
 - Emergencies caused by the introduction of foreign bodies and *force majeure*.
- Similarly, parts subject to wear and tear are excluded from warranty claims.

2.6 Machine noise

- The continuous sound pressure level produced by the machine is < 70 dB(A).

2.7 Safety regulations

2.7.1 Explanation of symbols and notes

The following terms and symbols are used in the operating instructions for hazards:



Danger!

This symbol indicates an immediate threat of danger to life and health of persons.

- Failure to observe this note will have serious consequences injurious to health, including life-threatening injuries or even death.



Caution!

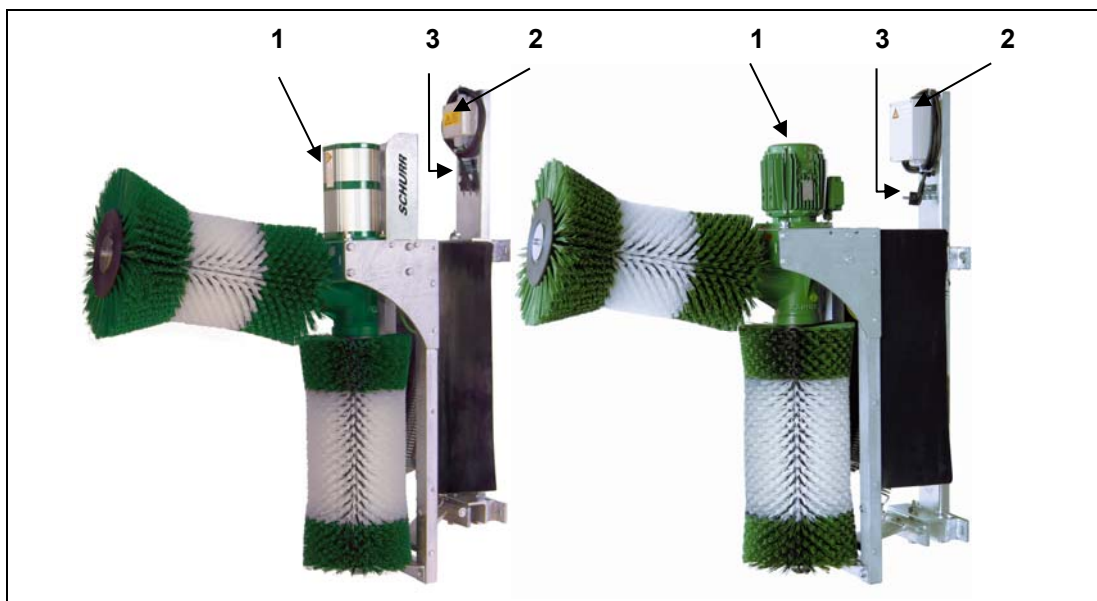
This symbol indicates a situation that is possibly dangerous.

- Failure to observe this note can lead to injuries or damage to property.



This symbol indicates a tip for usage and particularly useful information.

- These assist you in the optimal use of all functions of the machine and avoiding failures in the machine and environment.



Pos.	Symbol	Erklärung
1	<p>ACHTUNG Nicht am Motor hochheben! ATTENTION Don't lift at the engine!</p>	Do not lift at the engine!
2	<p>Vor Öffnen des Gerätes Netzstecker ziehen. Before opening disconnect mains. Avant d'ouvrir l'appareil retirez la fiche mâle. Antes de abrir el aparato sacar el enchufe.</p>	Before opening disconnect mains.
3		Serial no. of the SCHURR cow-brush

2.7.2 Organisational measures

All safety facilities are to be checked regularly.

2.7.3 Protective equipment

Prior to every startup of the machine, all protective equipment must be properly installed and functional.

Protective equipment may only be removed

- after stopping the machine and
- securing it against restarting, e.g. padlock on the motor circuit breaker or removal of the fuse from the domestic supply.

Where part components are delivered, the person responsible for the machine must ensure that the protective equipment is properly installed.

2.7.4 Informal safety measures

The operating instructions are to be kept at or near the machine at all times, and must always be at hand. In addition to the operating instructions, the general and local rules in force applicable to accident prevention and environmental protection are to be made available and observed.

All safety and operating notes at the machine are to be kept in a legible state and renewed where necessary.

2.7.5 Operator training

- Only qualified and trained personnel may operate the machine.
- Responsibilities of personnel in terms of usage, resetting and maintenance are to be clearly defined.
- Personnel undergoing training may only work at the machine under supervision of an experienced person.

Activity	Persons	Persons instructed	Persons with technical training	Persons with electrotechnical training
Failure determination - mechanical		--	X	X
Failure resolution - mechanical		--	X	X
Failure determination - electrical		--	--	X
Failure resolution - electrical		--	--	X
Maintenance		X	X	X
Repairs		--	X	X

Legend: X...permitted ----not permitted

2.7.6 Safety measures in normal operation

The machine is to be operated only when all safety facilities are fully functional.

Before switching the machine on, ensure that no-one could be placed in danger by the machine starting up.

Check the machine at least once per day for externally recognisable damage and for the functionality of the safety facilities. See Chapters 6 and 7

2.7.7 Hazards caused by electricity

Only qualified electricians are permitted to work on the power supply.

The electrical configuration of the machine should be checked regularly.

Loose connections and heat-damaged cables must be rectified immediately.

The terminal box must be kept closed at all times. Only authorised personnel with a key or tool are permitted access.

2.7.8 Cleaning of the machine and disposal

Substances and materials used must be properly handled and disposed of, in particular

- when working with transmission oil

2.7.9 Maintenance and service, failure correction

- The prescribed adjustment, maintenance and inspection activities must be performed according to schedule.
- The power supply to the machine must be switched off during all maintenance, inspection and repair work.
The main switch must be secured against unexpected reconnection, e.g. via a padlock on the motor circuit breaker or the removal of the fuse from the domestic supply.
- Check that screw connections are firmly seated.
- Check the safety facilities for functionality after completion of the maintenance activities.

2.7.10 Structural modifications to the machine

- No modifications, extensions or reconstructions of the machine may be made without the manufacturer's permission. This also applies to the welding on the load-bearing parts.
- All measures taken to extend the machine require the written permission of the manufacturer.
- Machine parts that are not in perfect condition must be replaced immediately.
- Use only original replacements for parts, including those subject to wear and tear.

No guarantee can be given that parts sourced from elsewhere are designed and constructed according to required standards and levels of safety.

3 Product description

3.1 Use according to design

The machine is intended solely for the **dry** cleaning of cattle/milking cows. Alternative or additional use is considered to be not according to design and constitutes misuse of the system.

Use according to design also includes:

- that animals' collars are tight enough, ensuring that animals are not snared by the device.
- that tail hair (tufts) is kept short.
- compliance with all notes in the operating instructions.
- adherence to inspection and maintenance activities.

The manufacturer is not liable for damages arising herefrom.

Precautionary measures

Use for other purposes, as indicated above, is prohibited. Danger may occur where use is contrary to intended purpose.

Foreseeable misuse or use contrary to intended purpose is for example:

- cleaning of persons or
- cleaning of clothing/shoes
- combing of hair in the case of humans

3.2 Danger areas

Danger areas are:

- The electric terminal box
- The brushes.

In these areas, dangers are constantly present or can occur unexpectedly. Special safety regulations must be applied.

3.3 Conformity

The machine conforms to machine guideline 2006/42/EG including supplements, EMV.

3.4 Designation of the machine

The designation plate and the CE identification are attached to the wall support frame, below electronic box:



3.5 Technical data

General data

Overall machine B x D x H	310 x 1150 x 1250 mm
Weight	approx. 135 kg
Rotation speed	60/min
Brushes Ø	410 mm/310 mm
Length of brushes	650 mm/550 mm
Bristle material	Nylon, Ø 1.2 mm
Rotation speed	Motor: 1360 rpm Gearbox: 60/min

Power supply

Electricity	Standard-Version
Voltage	220V/230 V ~, single phase, 50Hz/60Hz
Motor output	0,37 kW
Protection type	IP 55
Rated current	2,5 A
Safety fuse in power line	Dependent on domestic supply

Environmental requirements	Transport and storage	Operation
Temperature	-25° C to +55° C	-15° C to +40° C
Humidity		Protected from dew, under roof if possible
Installation site	Observe the transport notes on the packaging. Do not tip, keep free from oscillation where possible	Vertical, fixed wall, support or similar

3.6 Electrical connection

- An electrical cable complying with the data specified in Chapter 3.5 must be provided at the installation site for the SCHURR Cow-brush.
- Installation of the SCHURR cow-brush to power supply may only be performed by a qualified electrician.

3.7 Configuration of the machine

Normal equipment is:

- Operating instructions
- List of spare parts (see Chapter 9)

☞ Check the tools and auxiliary materials for completeness.

Quantity	Tools, auxiliary materials
4	Heavy-duty plugs \varnothing 12 mm

3.8 Status on delivery

- The machine is attached via a wall bracket to prevent toppling over - see fig. 2.0.

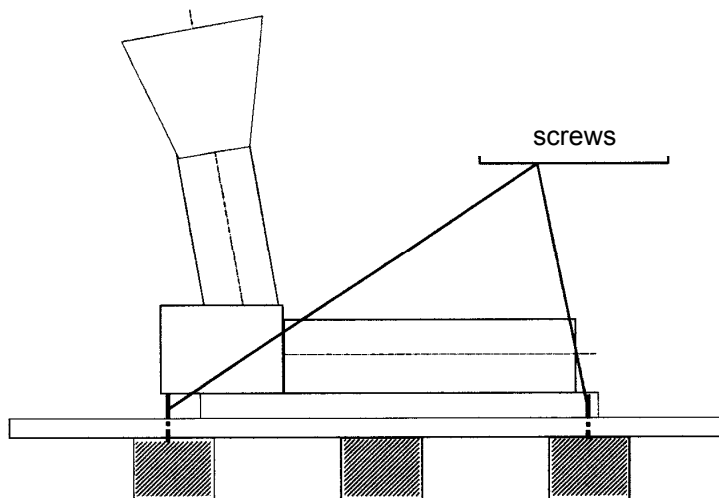


Fig. 2.0 Attachment to a palette

- Heavy-duty plugs are included (for concrete-wall only).

4 Assembly and function

4.1 Mechanical assembly

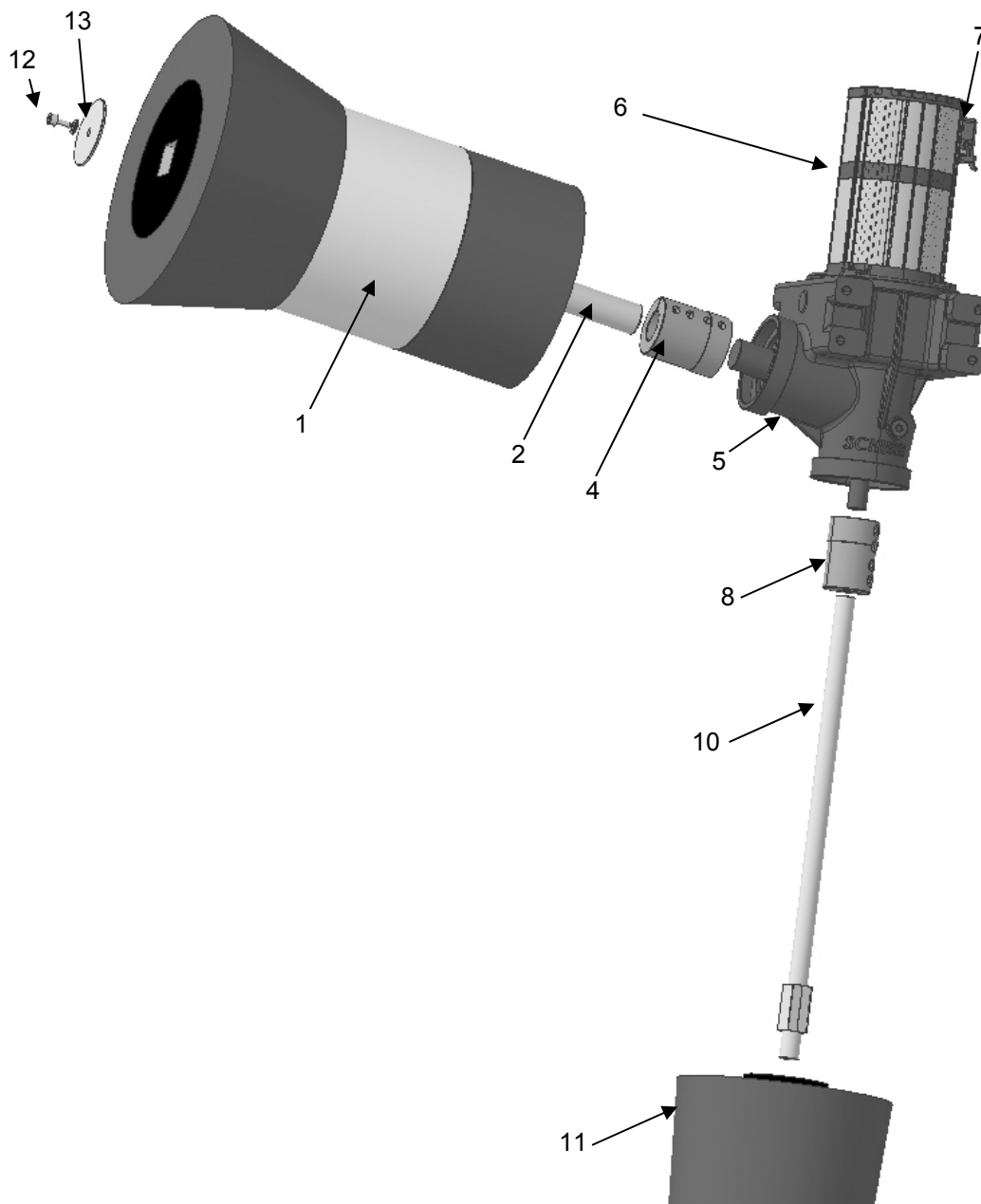


Fig. 3.0 View of the brush/gearbox component

No.	Designation	No.	Designation
1	Upper brush 550mm long	8	Lower clamping flange \varnothing 65/25mm
2	Upper shaft \varnothing 40mm	10	Lower shaft \varnothing 25mm
4	Upper clamping flange \varnothing 80/40mm	11	Lower brush 650mm long
5	Gearbox block	12	Allen screw M10 x 20
6	Type B00: standard motor (green) Type C12: EC-Motor (silver/green)	13	End plate
7	Terminal housing		

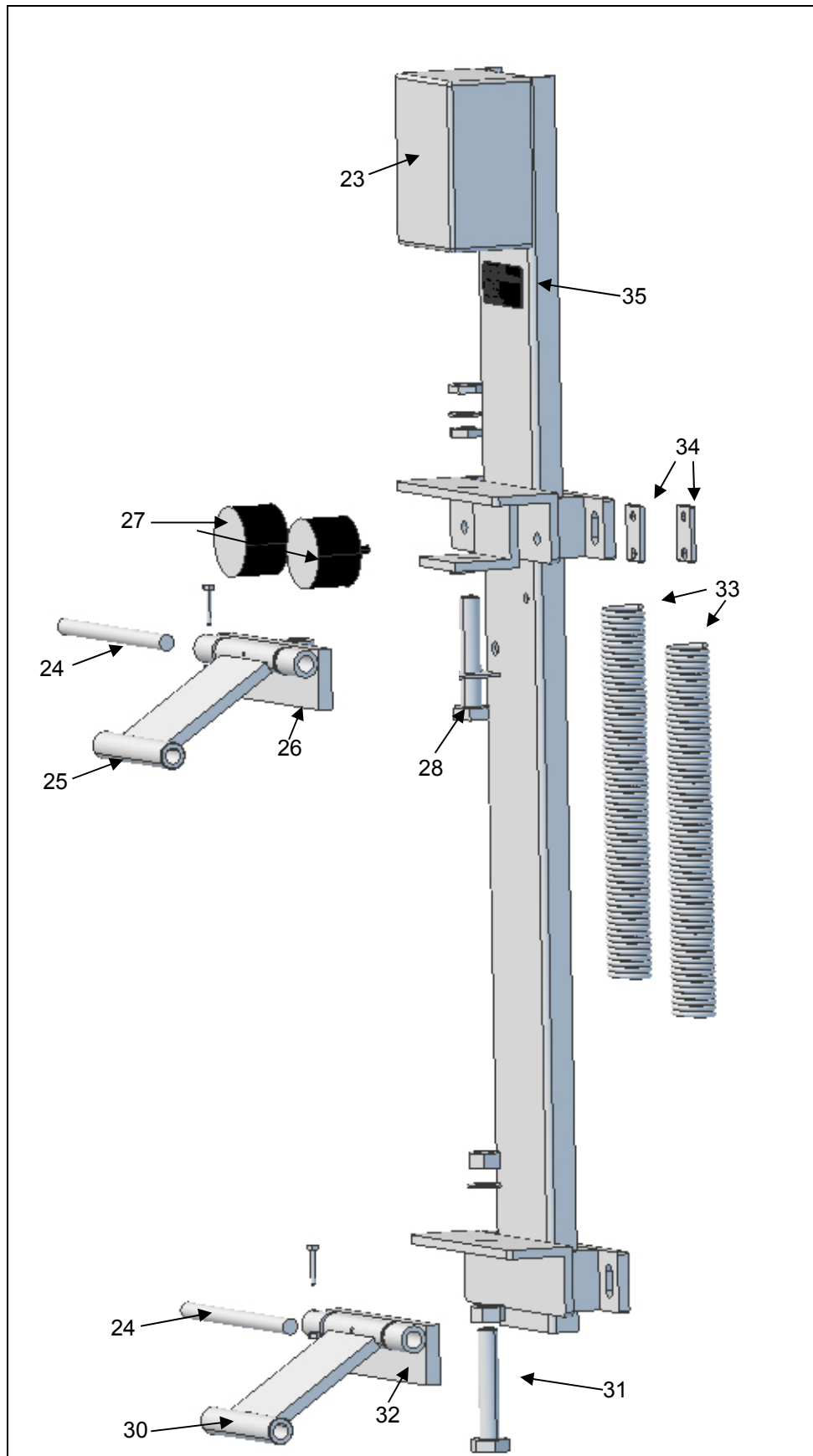


Fig. 3.2 View of wall mounting component

No.	Designation	No.	Designation
23	Electric box with 2m cable+plug	30	Lower vertical arm with lubricating nipple
24	16x215mm plug with Allen screw M 5x35	31	Hexagonal screw M20x100 with nuts, square taper washers and lubricating nipple
25	Upper vertical arm with lubricating nipples	32	Lower side arm
26	Upper side arm	33	Tension spring with eye bolt M 10 x 60
27	Stop rubber	34	FL strap 30mmx5mmx60mm
28	Hexagonal screw M20x110 with 2 half nuts and lubricating nipple	35	Wall mounting
29	(Before: Magnetic switch)		

SCHURR cow-brush typ B00

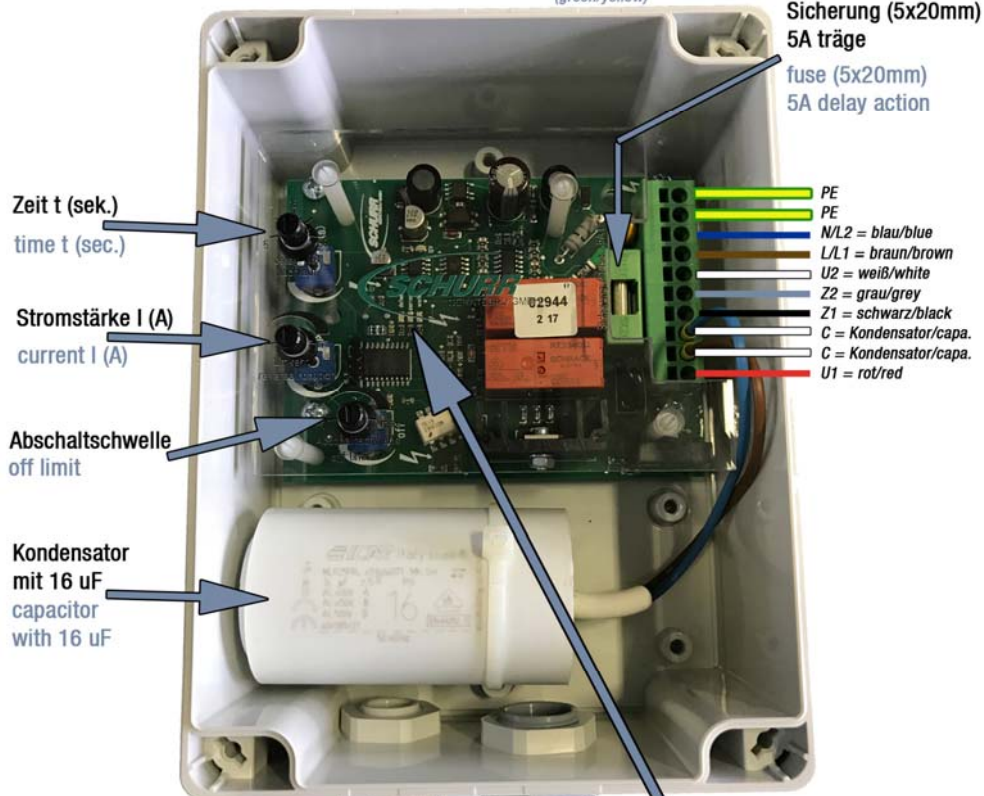
Übersicht: Elektro-Gehäuse SCHURR Kuhbürste Typ B00b - Stand: 10. Feb. 2017

Overview: electric-housing SCHURR cow-brush type B00b



Der elektrische Anschluss darf nur von einer Elektrofachkraft vorgenommen werden. Absicherung max. 16A, es muß ein FI Schutzschalter vorhanden sein! Es ist zwingend vorgeschrieben, den Schutzleiter grün-gelb anzuschließen.

A qualified electrician have to connect the power supply according to the following switching diagram. Protection max. 16A, it has to be a residual current circuit-breaker installed - The qualified electrician have to connect the protective conductor (green/yellow)



Zeit t (sek.)
time t (sec.)

Stromstärke I (A)
current I (A)

Abschaltswelle
off limit

Kondensator
mit 16 uF
capacitor
with 16 uF

Sicherung (5x20mm)
5A träge
fuse (5x20mm)
5A delay action

PE
PE
N/L2 = blau/blue
L/L1 = braun/brown
U2 = weiß/white
Z2 = grau/grey
Z1 = schwarz/black
C = Kondensator/capa.
C = Kondensator/capa.
U1 = rot/red

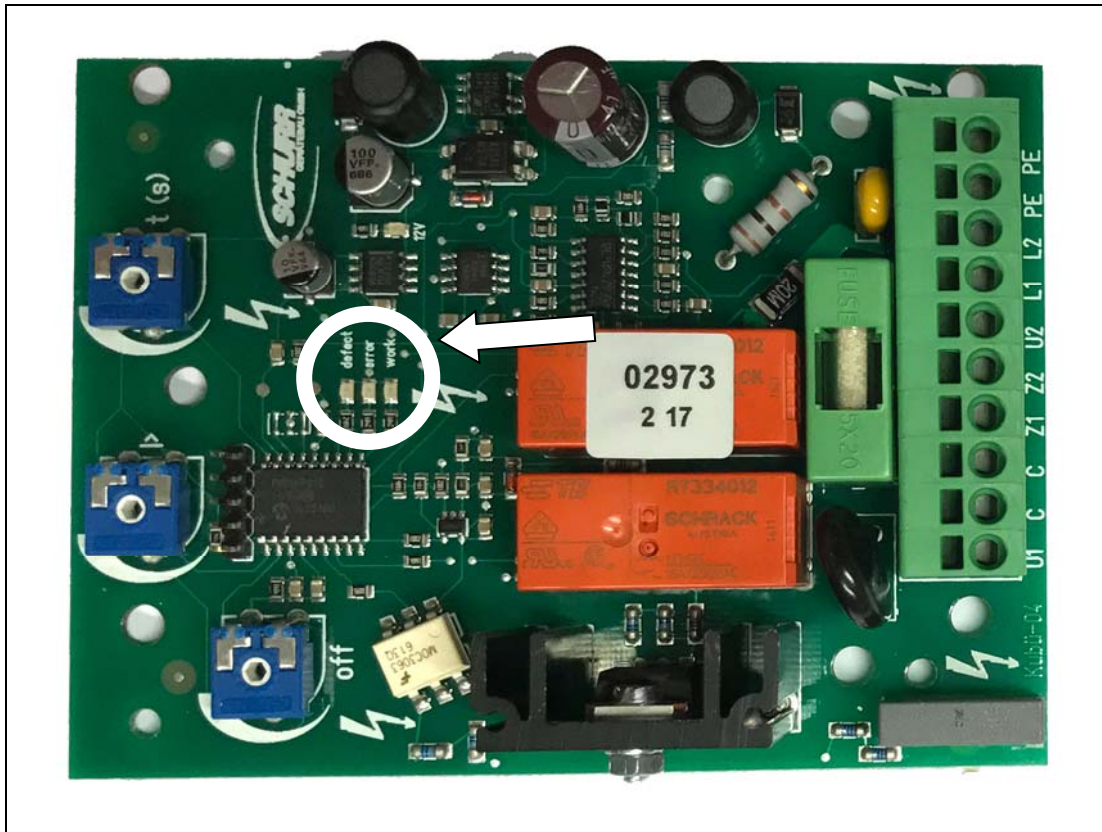
PE = Erdung Netzzuleitung
PE = Erdung Motorzuleitung
N/L2 = blau = Netzzuleitung
L/L1 = braun = Netzzuleitung
U2 = weiß = Motorzuleitung Hauptwicklung
Z2 = grau = Motorzuleitung Hilfswicklung
Z1 = schwarz = Motorzuleitung Hilfswicklung
C = Kondensator
C = Kondensator
U1 = rot = Motorzuleitung Hauptwicklung
PE = green/yellow = power supply ground wire
PE = green/yellow = cable/motor ground wire
N/L2 = blue = power supply
L/L1 = brown = power supply
U2 = white = cable/motor wire no.2
Z2 = grey = cable/motor wire no.3
Z1 = black = cable/motor wire no.4
C = capacitor
C = capacitor
U1 = red = cable/motor wire no.1

Ändern der Standard-Drehrichtung:
Z1 und Z2 gegeneinander austauschen!
Changing standard direction:
exchange Z1 with Z2!

Bedeutung der 3 LED's auf dieser Platine:
WORK = wenn LED leuchtet wird Motor belastet, die Kuhbürste dreht sich dauernd
ERROR = „Schutzbetrieb“
Nach 10-maliger Reversierung schaltet Kuhbürste für 30 sek. ab, in dieser Zeit blinkt diese LED rot.
Falls diese LED dauerhaft leuchtet, muss die Kuhbürste aus- und wieder eingesteckt werden (RESET)
DEFECT = Störung => leuchtet ständig, Platine muss getauscht werden

Meaning of the LEDs on this electronic card:
WORK = If this LED lights up the motor is working, cow-brush will turn all the time
ERROR = „protection mode“
After 10x reversing the cow-brush switches off, at this time the light is flashing red.
If this LED lights up permanently, the plug (power supply) has to be removed and reinserted (RESET)
DEFECT = Fault => lights up constantly, board must be replaced

Meaning of the LED's (SCHURR cow-brush type B00)



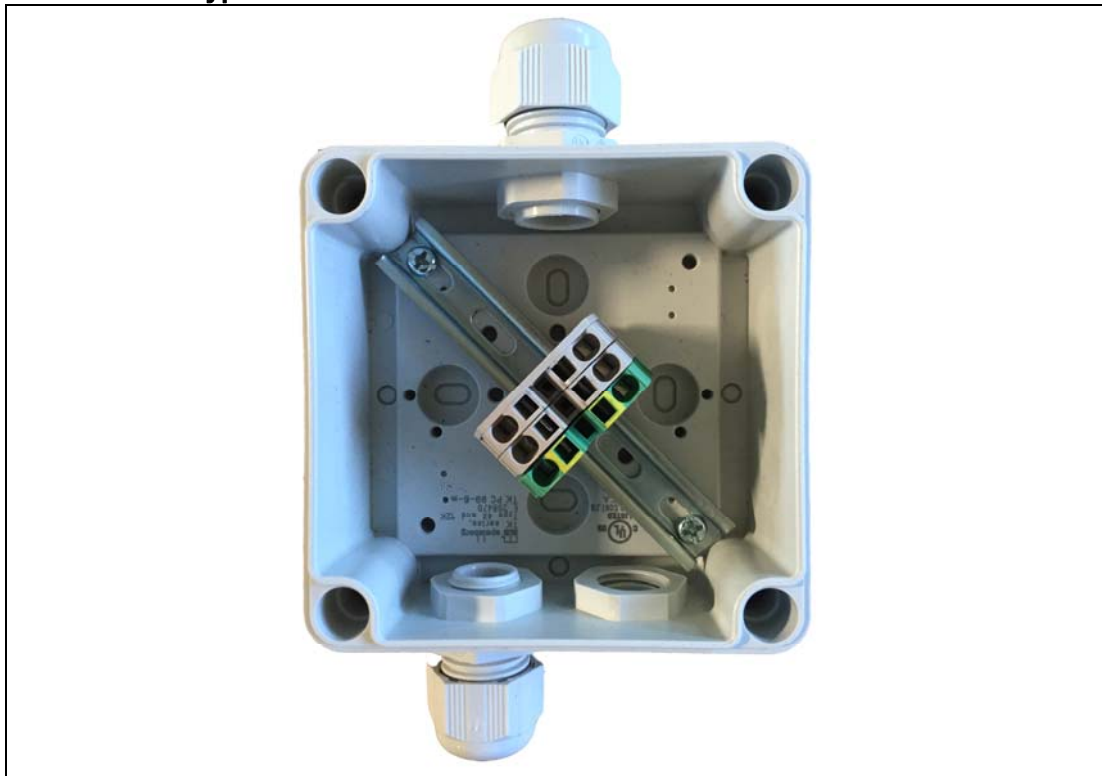
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After 10x reversing the cow-brush switches off, at this time the light is flashing red. If this LED lights up permanently, the plug (power supply) has to be removed and reinserted (RESET)

DEFECT = Fault => lights up constantly, board must be replaced

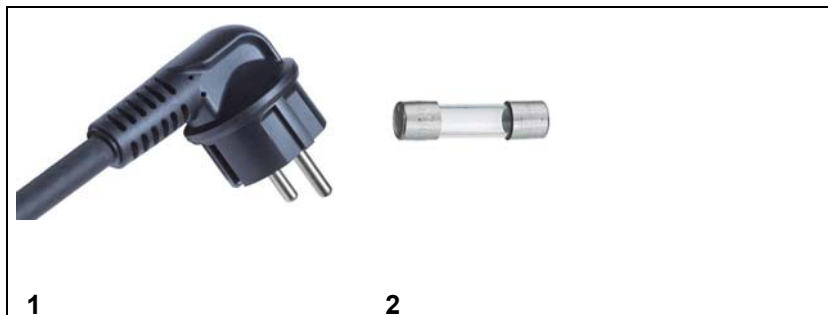
SCHURR cow-brush typ C12



4.2 Functional description

When an animal is in the SCHURR Cow-brush, and the brushes are turned just a little bit, they begin to rotate automatically. The animals are cleaned by the rotating brushes, for as long as the brushes are turning. When the animal exits the SCHURR Cow-brush, the brushes are switched off after a set time by means of time relay control.

4.3 Safety and monitoring facilities



No.	Part	Description
1	Cable ca. 2m with plug for power supply	On/Off
2	Fuse 5 x 20 mm 5A	Overvoltage protection – on the electronic card (only type B00)

5 Commissioning

5.1 Safety regulations



Danger!

Electric voltage or current

Can lead to serious injury or death.

Ensure that work with live parts and the electrical connection is performed by a qualified and authorised electrician only.



Danger!

Transport the device manually or by means of a transport device.

In the event of the device overturning or falling down injury to fingers/hands or feet/legs may occur.

Worst case scenario is that the device may fall on top of you. In this case there is also a danger of injury.



The device should always be carried by at least 2 persons, or an auxiliary apparatus, e.g. front loader should be used.

Ensure that fingers/hands and legs/feet are kept away from the danger area.

5.2 Operating personnel requirements

- The electrical connection must be performed by a qualified electrician.
- Technical skill is required for installation. Technical training would be most suited, e.g. blacksmith, locksmith, farm machine mechanic.

5.3 Setup

5.3.1 Prerequisites

- A 230 V ~ connection, including error current protection switch is required (FI switch). If the power supply system does not already contain an F1 switch, it should be installed by a qualified electrician.
- The installation wall for the SCHURR Cow-brush should be made of concrete. Where other wall material such as tiles or wood for example is used, please note differing installation instructions (see 4.3.4).


5.3.2 Transport

- Never lift the device by the motor!
- Ideally, the SCHURR Cow-brush should be transported by means of an auxiliary apparatus, e.g. front loader or trolley.
- Ensure that the speed is kept low, as the device might otherwise fall off.
- Do not drive on downward sloping paths or ramps.
- Where an auxiliary apparatus cannot be used, the SCHURR Cow-brush should be carried by at least 2 persons.

5.3.3 Securing for transport

- The device is bolted onto the wall mounting or
 - strapped down.
- ☞ Release the transport securing before installation, and be aware of the possible danger of tipping over. Injury may also occur as a result.

5.3.4 Securing

- The device is mounted on a wall or on a support within the barn or yard.
 - The device should be protected from rain and snow by a roof, if installed in the open.
 - Sufficient free space must be available in front of the device so that other animals may pass freely while an animal is being brushed.
- 
- Do not install the device directly in front of or behind the milking parlour, to ensure that animal congestion does not occur.
 - The device must be attached to a concrete wall using the 4 heavy-duty plugs supplied.
 - In the case of other wall materials such as tiles or wood, through bolts must be used. This type of material does not have the required carrying capacity/stability for heavy-duty plugs.
 - In the case where the device is attached to a pillar, support or plank wall, please consult Schurr Gerätebau GmbH for information on the dimensions necessary for suitable fastening.

Sequence of actions

- ☞ Mark the drilling template according to fig. 4.0.
 - ☞ Drill the 4 Ø12 mm holes
 - ☞ Hammer the heavy-duty plugs into the wall,
 - ☞ or push the through bolts through the holes.
 - ☞ At least 2 persons should assist in hanging the device on the heavy-duty plugs.
- Tighten the nuts. Use self-securing nuts or a safety glue such as 'Loctite blue', for example.

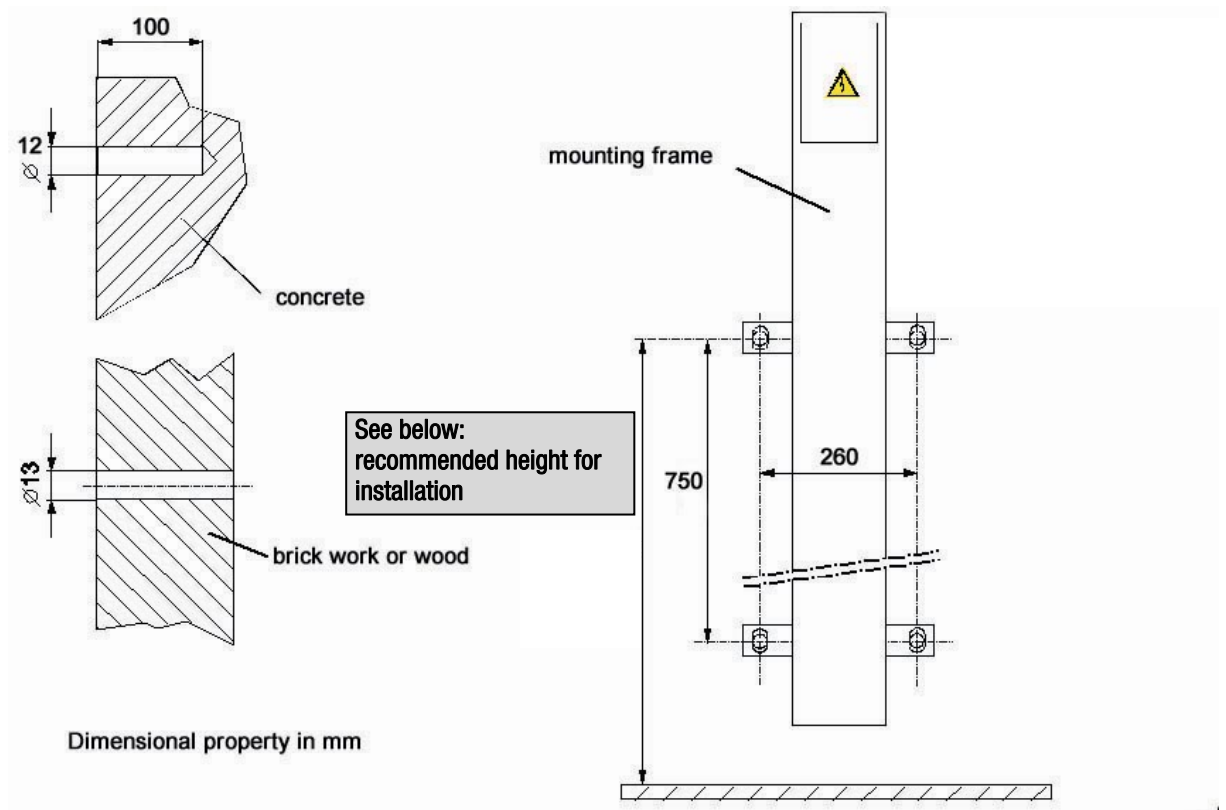


Fig. 4.0 Securing of SCHURR Cow-brush

For example: fixing height from bottom to the upper screws
 holsteins – ca. 1530 mm-1570 mm brown – ca. 1520 mm-1550 mm

Note:
 No guarantee or liability claims will be entertained where the SCHURR Cow-brush is not secured properly!

5.3.5 Power supply



Danger!

Electric voltage or current.

Can lead to serious injury or death.

Ensure that work with live parts and electrical connection is performed by a qualified and authorised electrician only.

- A qualified electrician should connect the power supply with the connecting terminal/ground clamp.
- Protection max. 16A. It has to be a residual current circuit-breaker installed.
The qualified electrician have to connect the protective conductor (green/yellow)

5.4 First time use

5.4.1 Measures prior to first time use



A qualified electrician should

☞ Set the potentiometer in the control housing to the required time (preset to approx. 18 sec.).

5.4.2 Trial run

When the device has been connected to the power supply, the functionality may be tested.

Sequence of actions

Typ C12/B00: ☞ Turn the brush to start the motor accordingly. It's not necessary to push the support frame upwards!

6 Operation

6.1 Safety regulations



Danger!

- Rotating brushes
- The motor is starting when the brushes are turned a little bit.
- It is possible for the brushes to catch a person, thereby causing injury.
- Ensure that children and other persons are kept away from the device.
- Keep away from the device during operation.
- Do not wear items of clothing that are loose or hang down.
- Under no circumstances must hair come into contact with the device.

6.2 Operation of the device

Switching on/off



- The cow-brush must be plugged in to the power supply. The device is then ready for operation.
- The brushes begin rotating as soon as an animal turns the upper or lower brush.

After an animal has been brushed, and has moved away from the device, the device switches itself off after the time interval set on the timer relay has passed.

6.3 Failures

The following failure correction description is provided only insofar as the user is authorised or capable.

The SCHURR Cow-brush does not work, i.e. the brushes do not rotate

Possible cause	Possible remedy
No power to the SCHURR cow-brush	Check the power supply of the SCHURR cow-brush
Internal Motor protection switch has been triggered (only type B00)	Plug off/Plug in (reset) the SCHURR cow-brush
Fuse 5 x 20mm is broken	Change the fuse
A cable is faulty 	Deactivate the SCHURR Cow-brush by removing the power supply fuse. Call in a qualified electrician and have the defect repaired.
Failures in electrical components (i.e. motor) or defective electrical components 	Deactivate the SCHURR Cow-brush by removing the power supply fuse. Call in a qualified electrician and have the defect repaired. Or request assistance from Schurr Gerätebau GmbH customer service.

The SCHURR Cow-brush is running all the time, i.e. the motor is not stopping

Possible cause	Possible remedy
Type B00 with standard motor: "adjust OFF limit" Type C12 with energy saving motor: call your dealer/SCHURR	Contact the SCHURR company!

7 Maintenance and repair

7.1 Safety regulations



Danger!

- Rotating brushes
- The motor is starting when the brushes are turned a little bit.
- It is possible for the brushes to catch a person, thereby causing injury.
- Set the on/off switch to '0' before starting maintenance activities.



Danger!

- Brushes rotate.
- Can cause injury to fingers/hands.
- Set the on/off switch to '0' before starting maintenance activities.
- Vertical arms – fingers can be jammed
- Tension spring – fingers can be jammed between the coils.



Danger!

- Electrical voltage or current
- Can lead to serious injury or death.
- Ensure that work with live parts (e.g. cable-control-switches) is performed by a qualified and authorised electrician only.

7.2 Lubricating and cleaning materials

Lubricating materials

Component	Lubricating material	Specification
Moving parts	Grease	- no entries -
Gearbox	transmission oil	e.g. EP-DB 85W/90

Lubricant

- ☞ Use **only** commercially available cleaning agents.
- ☞ Do **not** use thinning agents, acids or caustic soda, even in low concentrations.
- ☞ If a high-pressure cleaner is used to clean the device, ensure that the water jet is not directed at the motor or electric box.

7.3 Maintenance plan

Work to be performed at regular intervals is listed in the maintenance plan. This work is divided into

- weekly
- monthly or operation-dependent activities.

Maintenance plan

Component and location	Frequency	What needs to be done?
Electrical components	weekly	Visual inspection of motor feed line, cable between motor and electric terminal box for damage, e.g. tears, pinched or abraded points and stripped wires. Turn the on/off switch to '0' immediately and inform an electrician.
Screw connections	weekly	Check that the screw connections in fig. 6.2 are firmly seated.
Moving parts	weekly	Grease the lubricating nipples on the upper and lower arms (1). Also, screws M 20 are provided with lubricating nipples (2)
Entire device	quarterly	Clean the device.
Gearbox motor	10,000 h	Check transmission oil after 10,000 operating hours.
Bearing	weekly	Grease the lubricating nipple – see fig. 6.2

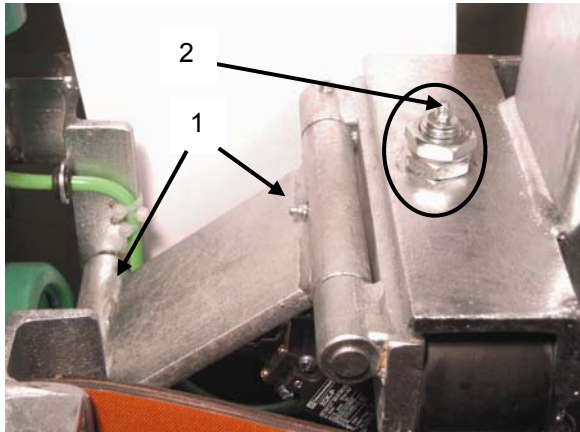


Fig. 6.2 Lubricating nipple (upper and down)

7.4 Technical safety check

- The purpose of the technical safety check is to maintain the functionality and effectiveness of the safety equipment.
- The machine is equipped with facilities that ensure the safety and protection of the machine and its operating personnel.
- It is therefore imperative to check the existing safety equipment regularly.

7.5 Repairs

7.5.1 Changing the brushes

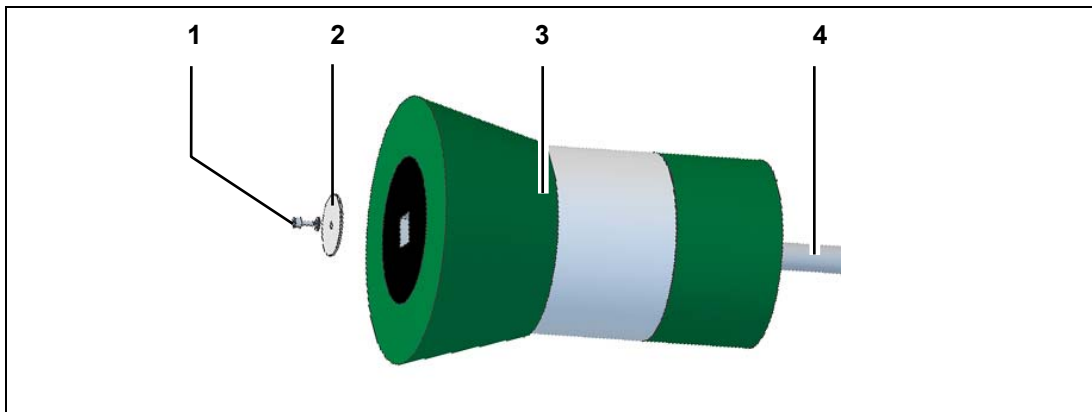


Danger!

- Rotating brushes
- The motor is starting when the brushes are turned a little bit.
- It is possible for the brushes to catch a person, thereby causing injury.
- Set the on/off switch to '0' before starting maintenance activities.

The brushes should be changed when they are worn and no longer clean the animals effectively.

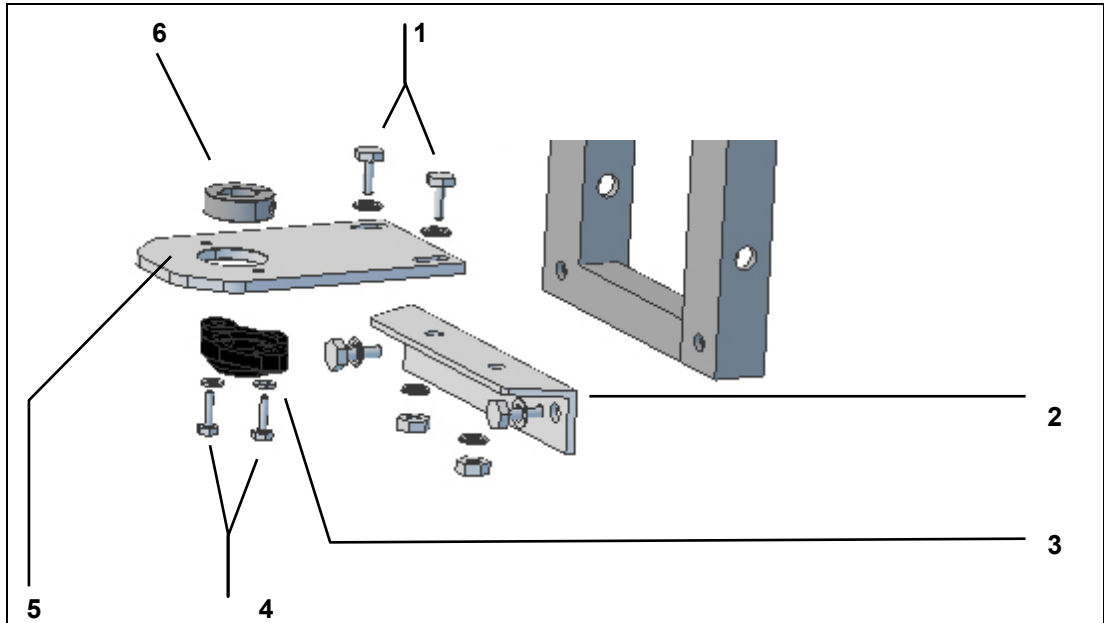
The following steps must be performed on the horizontal and vertical brushes.



Sequence of actions

Changing the horizontal brush:

- ☞ Remove the screw (1) using an Allen key (WZ8). Pull the brush from the shaft (the brush is only pushed on).
- ☞ Push the new brush over the shaft and secure by means of the Allen screw and the stainless steel end plate (see fig. 3.0 page 13).



Changing the vertical brush:

- ☞ Loosen both screws (1) and turn the bearing support (5) away from the support bracket.
- ☞ Pull the bearing support (5) together with the plastic bearing (3) away from the shaft
- ☞ The vertical brush can now be pulled off the shaft.
- ☞ Push the new brush over the shaft and push the bearing support together with the bearing onto the shaft.
Ensure that the shaft is aligned correctly. No lateral pressure may occur.
- ☞ Tighten the screws of the bearing support (5)

The device is once again ready for operation.

8 Disposal

8.1 General

- Take note of impact on the environment, health risks, disposal regulations and local options for regulatory disposal.
Further information can be obtained from the local authority for solid waste management.

8.2 Disconnecting the power supply

- The power supply to the device should be disconnected by an electrician.

8.3 transmission oil

- Drain the oil from the gearbox.

8.4 Material types

- Packaging material should be disposed of according to regulations in force, e.g. yellow bag, valuable material yard
- Metals, non-metals, compound and auxiliary material should be sorted according to type and disposed of in a non-polluting manner.

9 Parts list

9.1 List of individual components

No.	Designation	No.	Designation
1	Upper brush 550mm long	24	16x215mm plug with Allen screw M 5x35
2	Upper shaft \varnothing 40mm	25	Upper vertical arm with lubricating nipples
3	Upper protective plastic ring	26	Upper side arm
4	Upper clamping flange \varnothing 80/40mm	27	Stop rubber
5	Gearbox block	28	Hexagonal screw M20x110 with 2 half nuts and lubricating nipple
6	Type B00: standard motor (green) Type C12: EC-motor (silver/green)	29	<i>(before: Magnetic switch)</i>
7	Terminal housing	30	Lower vertical arm with lubricating nipple
8	Lower clamping flange \varnothing 65/25mm	31	Hexagonal screw M20x100 with nuts, square taper washers and lubricating nipple
9	Lower protective plastic ring	32	Lower side arm
10	Lower shaft \varnothing 25mm	33	Tension spring with eye bolt M 10 x 60
11	Lower brush 650mm long	34	FL strap 30mmx5mmx60mm
12	Allen screw M10 x 20	35	Wall mounting
13	End plate	36	Electronic board/electronic card
14	Plug 16 x 275mm – lower plug 255mm with hexagonal screw M 6 x 20	37	<i>(motor protection switch)</i>
15	8 hexagonal screws M 12 x 25	38	Capacitor
16	Support frame for brushes	39	Electronic housing
17	Bearing support with hexagonal screws M 10 x 30		
18	Plastic bearing with hexagonal screws M 8 x 25		
19	Bearing support bracket with hexagonal screws M 12 x 30 and square taper washer		
20	Stop rubber		
21	Sheet metal strips with 8 hexagonal screws M 6 x 25		
22	Rubber protective strips		
23	Electric box		

Conformity declaration
for EC guideline machines 2006/42/EG
Anhang II, Nr. 1, Abs. A und
Richtlinie EMV 2004/108/EG

Machine construction type

Make	Machine type	Type	Serial number
Schurr Gerätebau GmbH	SCHURR Cow-brush	B00/C12	See designation plate

is developed, constructed and manufactured in accordance with the abovementioned EC guidelines, for the sole responsibility of manufacturer

SCHURR GERÄTEBAU GMBH
 LANGER RAIN 2
 D-88524 UTTENWEILER/DENTINGEN

Development, construction and manufacture in accordance with the following co-ordinated norms:
 EN ISO 12100:2010
 EN 60204-1:2006

The following norms were used in determining electromagnetic conformity:
 EN 61000-6-1: 2001-10
 EN 61000-6-3: 2001-10

Complete technical documentation is available.

The original operating instructions for the machine are in German.

Denting, 2017 - Schurr



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