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Technik fürs Land.



ZÜRN

OPERATING MANUAL

Rapeseed Headers, Series JD 300



Status as of 03/2009

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Introduction

Intended use: This header is designed only for the usual application in agricultural work or similar activities. Any other use beyond this is deemed improper use of the machine. The manufacturer is not liable for damage resulting from such use; the user alone bears the risk. Proper use also includes complying with the operation, maintenance and service conditions specified by the manufacturer.

READ THIS OPERATING MANUAL CAREFULLY to familiarize yourself with the correct operation and maintenance of the equipment and avoid injuries or damage to the machine. Not doing so can result in injuries or machine damage.

THIS OPERATING MANUAL IS PART OF THE MACHINE and should be given to the purchaser upon resale.

DIMENSIONS specified in this operating manual are metric. The corresponding dimensions for the USA are also indicated. Use only appropriate parts and bolts. Different wrenches are required for metric bolts and bolts with English unit dimensions.

THE DESIGNATIONS "RIGHT" AND "LEFT" refer to the forward direction of the machine.

ENTER THE PRODUCT IDENTIFICATION NUMBERS in the corresponding place in the Inspection section prior to delivery. Please record all numbers accurately.

In case of theft, these numbers can be important for tracing the equipment. Moreover, your John Deere dealer needs these numbers when you order spare parts. It is a good idea to keep a second record of these numbers in another location.

Your dealer has performed an INSPECTION OF THE MACHINE BEFORE DELIVERY. Another inspection should be carried out by your dealer after the first 20 to 50 hours of operation in order to ensure the best possible performance for the machine.

THIS HEADER MUST ONLY be used, serviced and repaired by persons who are familiar with it and who have been instructed on its hazards.

The relevant accident prevention regulations and other generally recognized rules and laws for safety, occupational health and road traffic must also be followed.

Unauthorized changes to this combine harvester release the manufacturer from any liability for resultant damages.

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Pre-delivery Inspection

The following tests, setting adjustments and maintenance were performed prior to delivery:

Pre-delivery Inspection

- 1. Correct oil level in the housing of the knife bar drive.
- 2. Tension the drive belt according to instructions and check that the belt runs properly.
- 3. Check reel support attachment.
- 4. Center knives in the knife bar.
- 5. Instruct the customer about the operation of the rapeseed header and safety measures.
- 6. Rapeseed header lubricated.
- 7. Check correct assembly of the rapeseed header and that the knife stroke is set properly.
- 8. Check that all safety devices and protective guards are present.
- 9. Check that paint and decals are in good order.

**Signature and stamp
of the dealer / Service specialist**

Date:

Product Identification

Header type:	
Serial number:	
Year of manufacture:	

To be entered by the dealer

Typical Appearance



Rapeseed Header, Series JD 300

Right Side Component Assembly

The right side part of the rapeseed header is not assembled upon delivery.



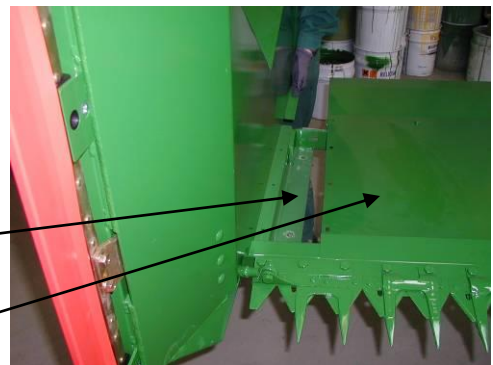
The bolts for assembly are included in the parts box.



Place the side component on the rapeseed header. Take care to ensure that the bottom plate is over the flat bar.

Flat bar

Bottom plate



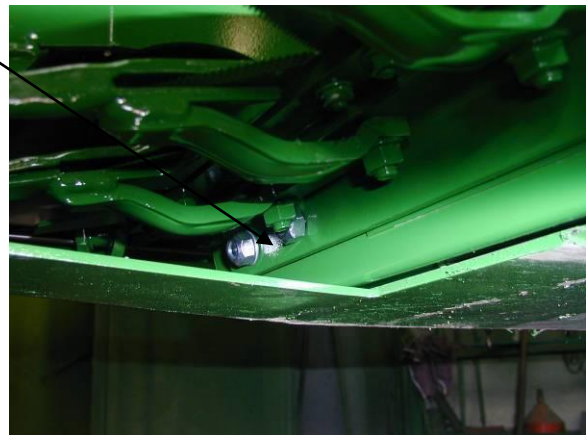
Insert two M10X70 bolts with mudguard washers in the rear frame tube and screw on the nuts.

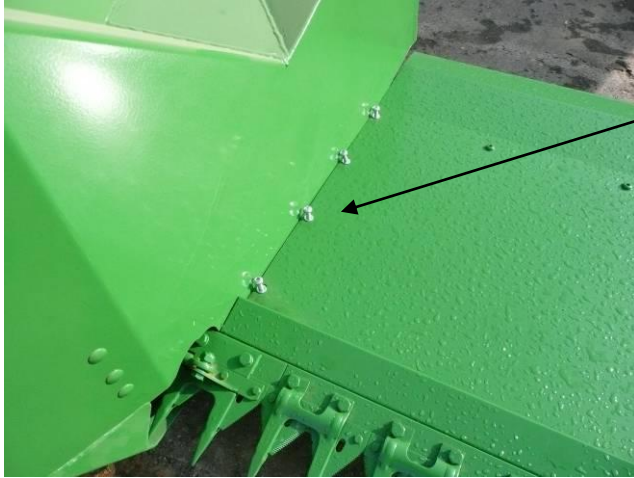


Insert two M10X70 bolts with mudguard washers in the front frame tube and screw on the nuts with two mudguard washers.



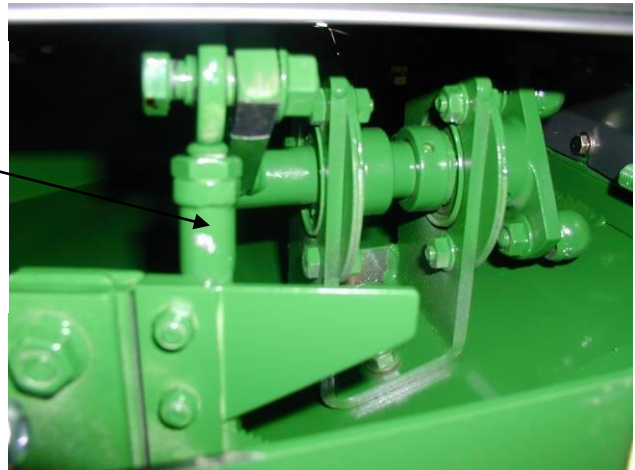
Tighten all 4 bolts.





Insert four self-tapping bolts M8x25 with washers and lock washers to fasten the bottom plate.

Now the knife drive must be connected. Here, pay attention to the correct fit of the spacer rings; one should be to the right and one to the left of the GIR bearing.



This figure shows in detail the installation sequence for the spacer rings, bolts, bearing and drive shaft.

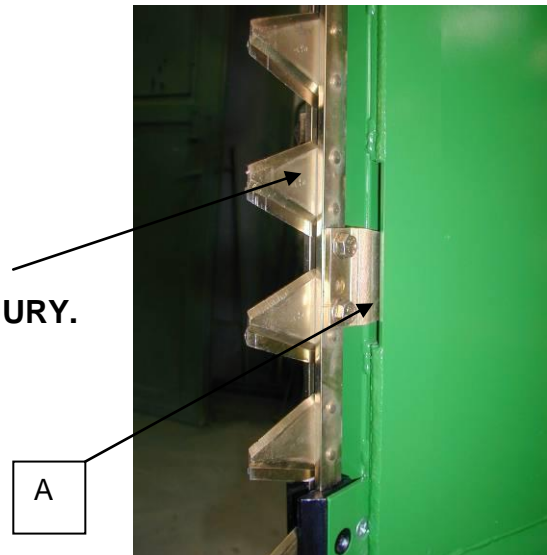


The stroke adjustment of the side cutter is very important. To do this, first the knife drive on the pulley is moved all the way to the right.

Exercise CAUTION when moving the knife. There is a RISK OF INJURY.

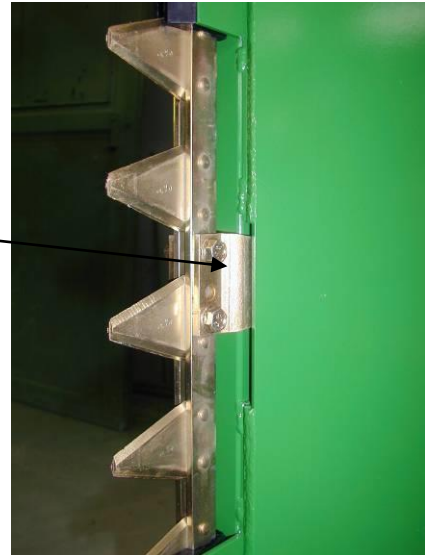
The gap (A) of the knife mount to the side wall must be measured. It should be approx. 10 mm.

**Please note:
There is a RISK OF INJURY.**



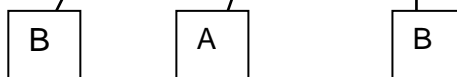
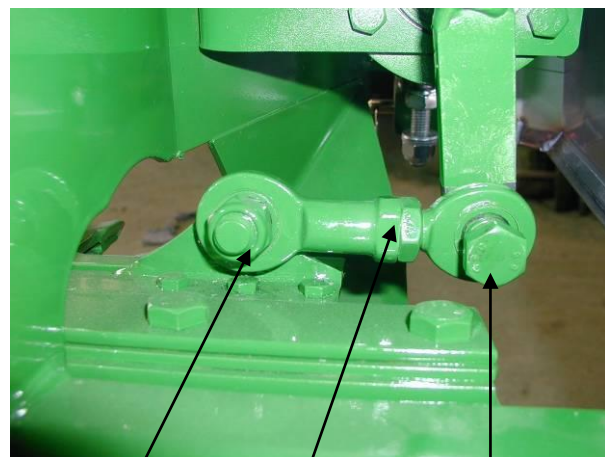
Move the knife drive all the way to the left.

The gap (A) of the knife mount to the side wall must be measured. It should be approximately 10 mm on the other side as well.

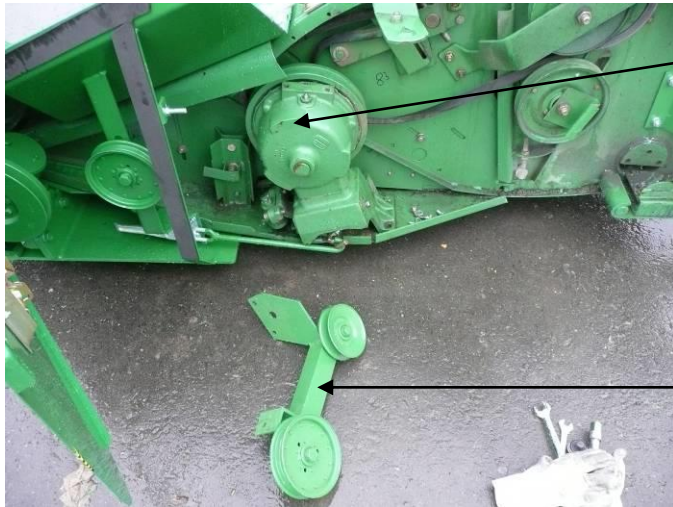


A uniform overlap of the side cutter must be ensured in the middle position.

If the overlap is incorrect, the length of the GIR and GAR bearing must be changed. To do this, remove the lock nut (A) and take out one of the retaining bolts (B). Set the new length, replace the retaining bolt and tighten the lock nut again.



Modification for the rapeseed header



Header gear drive

The deflection pulleys are mounted on the header gear drive with three M10 X30 bolts.

The deflection pulley retainer is fastened to the header gear drive with two M10x30 bolts.



The deflection pulley retainer is fastened with two M 10X30 bolts.

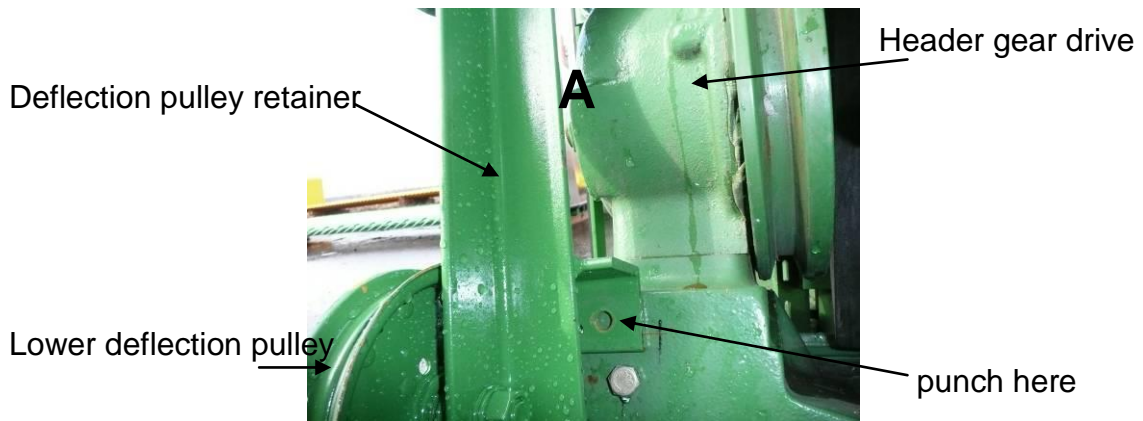
Do not tighten the bolts yet!

Behind the lower deflection pulley, you can see the hole into which the header gear drive base must be punched. After the punching, the deflection pulley unit is removed. Then an 11 mm hole is drilled at the punch point. Now the deflection pulley unit is finally mounted. Insert one M10X30 bolt into the lower hole and secure it with a M10 nut.



Lower deflection pulley

See figure (A)



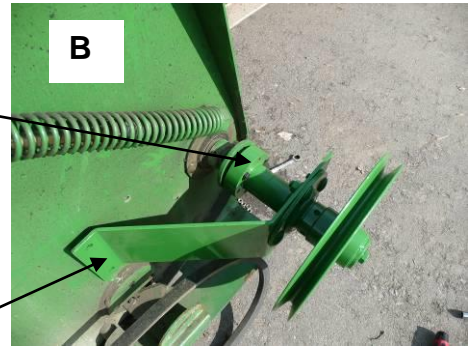
Mounting the pulley



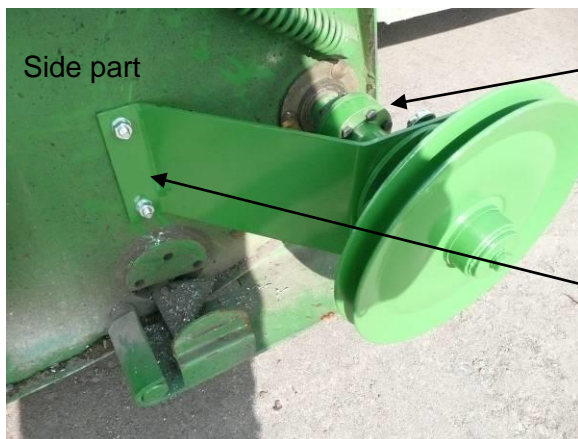
This pulley will be replaced with
this pulley!



Flange



The flange is fastened with a M8X30 bolt. The retainer is held horizontally as shown in the picture (B) and punched into the holes. Then the retainer is removed and 11 mm holes are drilled in the punched places.



Side part

The flange is mounted with six M8X50 bolts and the included nuts and washers

The retainer is mounted with two M10X30 bolts and the included nuts and washers.

Retainer

If necessary, the four bolts must be loosened with a size 17 wrench in order to adapt the retainer.



Mounting quick-release components



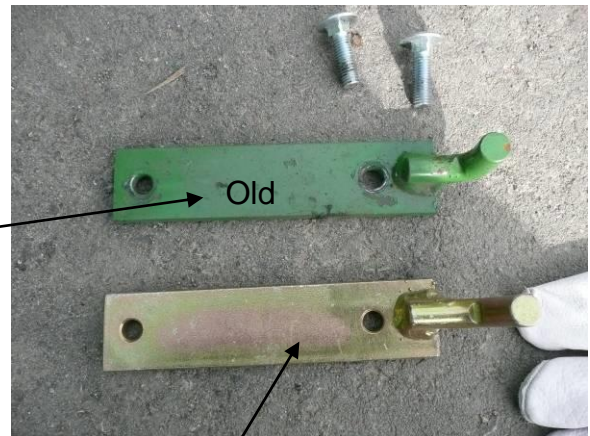
This angle bracket is to be replaced by

this chrome-plated angle bracket.

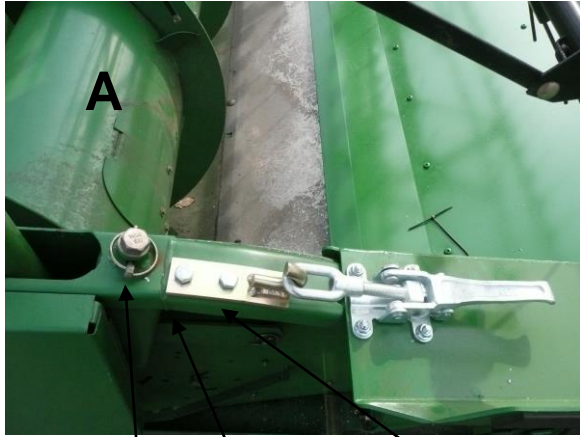
New bolts are in the parts box!



The hook is to be replaced with a chrome-plated hook.



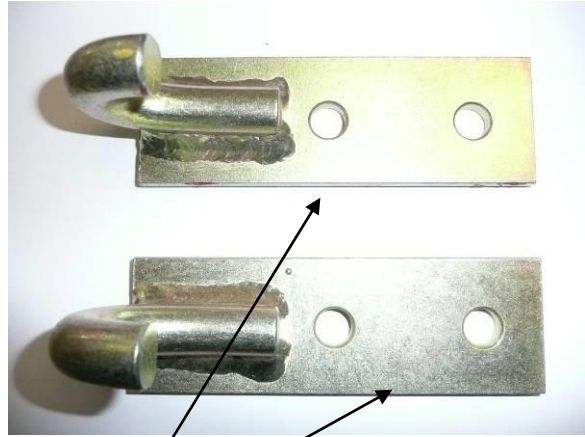
New bolts are in the parts box!



Reel height adjustment bolt

Weld seam

M8X30 bolts



These parts are mounted on both sides of the header as shown. The parts should be mounted in front of the weld seam and they should be flush with the outside edge. **(Fig. A)**



Before the header can accommodate the rapeseed header attachment, the reel must be raised.

Attaching the



Set the rapeseed header attachment on wooden blocks.



Open the doors on both sides. Then the rapeseed header attachment with the header will fit.

Right side!



Left side



With quick releases the rapeseed header attachment is fastened to the header.



Right quick release above



Left quick release above

Open side part



In order to mount the v-belt, the left side part must be loosened.

To do this, the two nuts must be loosened.

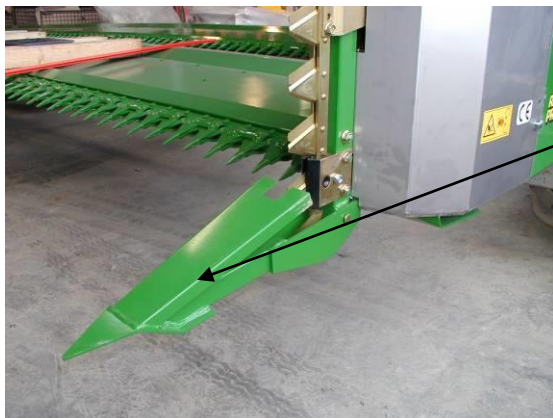
The side part is moved approx. 2 cm towards the back, then the v-belt is inserted into the pulley.



The figure shows the belt arrangement.

**V-belt:
RS 21061**

Attaching the Dividers



Divider points are included with delivery to improve crop uptake. They are attached to the right and left of the rapeseed header as shown in the figure.

The divider height can be adjusted. To do this, the nuts must be adjusted.

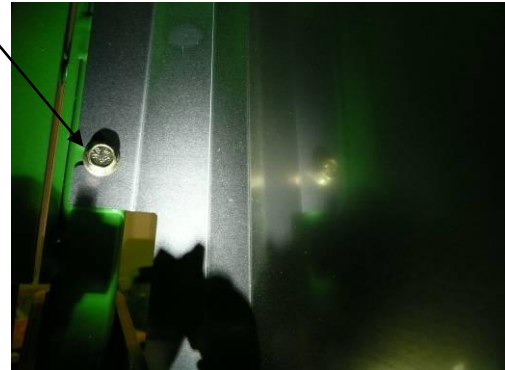
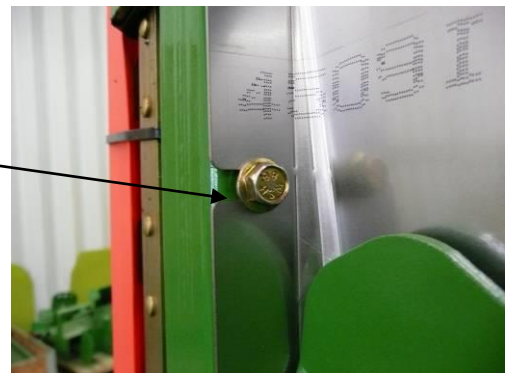
Important: the divider must always be able to move.





The entire side safety panel (guard door and stainless steel cover) can be removed for maintenance and repair. To do this, the bolts shown in the following figures must be loosened.

Loosen these M6 bolts on the knife bar and two M6 bolts on the inside of the stainless steel cover. **The two lower bolts are not visible here**



After these two M8 nuts have been loosened, it is possible to remove the side part completely.



Lubricants and Fill Quantities

Oil for knife drive

Select an oil viscosity which is appropriate for the outdoor temperatures to be expected until the next oil change.

The following oils should be preferred for use:

- John Deere GL-5 gear oil
- John Deere EXTREME GUARD™

Other oil types used must conform to the API specification GL-5.

Grease:

Select grease according to NLGI consistency and the outdoor temperatures expected until the next servicing.

The following greases are recommended:

- John Deere SD POLYUREA GREASE (TY6341)

Other greases can be used if they meet the following specification:

- NLGI specification GC-LB

Important: Replace missing grease nipples immediately.
Clean grease nipples thoroughly before lubricating.

Product Number	Description
TY6341	Multi-purpose, high temperature, extreme pressure lubricant which is particularly effective with rolling contact.

Lubrication Schedule and Periodic Maintenance

CAUTION:: Never lubricate or service the header when the motor is running.

IMPORTANT:: The recommended maintenance intervals are for normal working conditions. With more demanding operating conditions, should be performed more often as appropriate.

Lubricate with the John Deere multi-purpose, high temperature, EP lubricant SD POLYUREA GREASE or an equivalent SAE EP multi-purpose lubricant according to the operating hours specified on the lubrication symbol.



Lubricate the knife head bearing

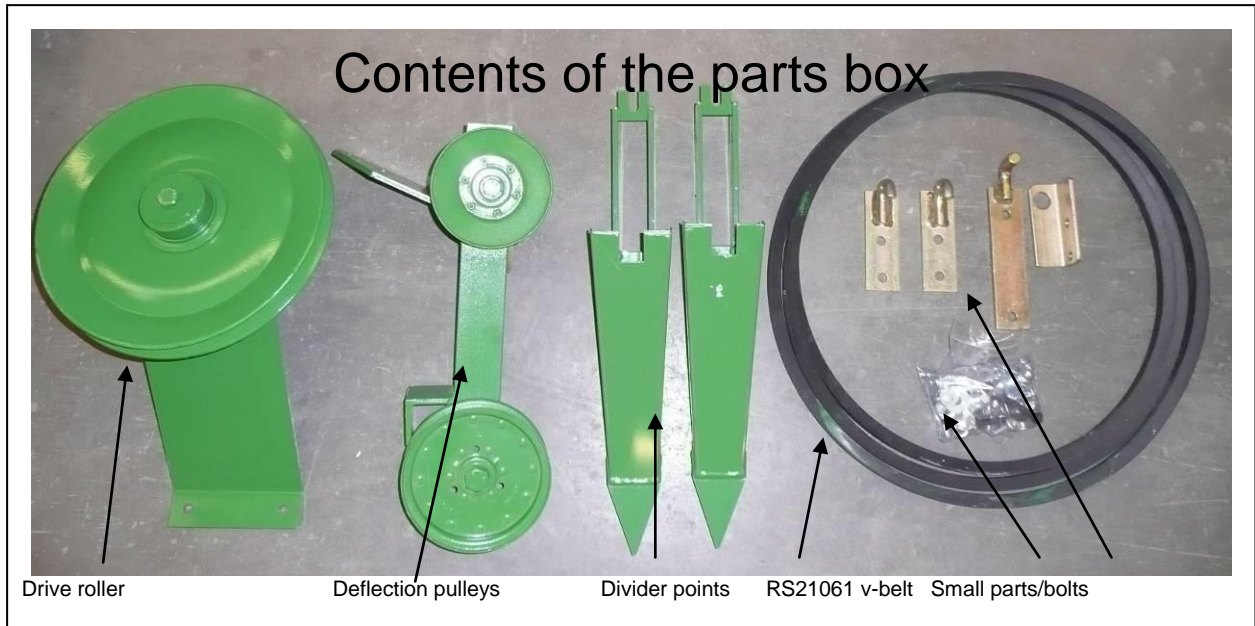


Lubricate the knife bar drive (5 squirts of the grease gun every 50 operating hours)

Important: It is normal for the housing of the knife drive to become very hot during operation. It may never be greased excessively in order to cool down the gear drive. This could result in damage to the seals!

Lubricate the bearing of the side cutter as well.





Bolt list

Designation	Dimension	Quantity	Note
Side part mounting			
Hexagonal bolt	M10X70	4	Frame
Mudguard washer	10X30X2	6	
Lock washer	10X12	4	
Hexagonal nut	M10X70	4	Bottom plate
GEFU bolt	8X25	4	
Washer	8X16	4	
Lock washer	8X14	4	
Quick release mounting			
Hexagonal bolt	M10X30	4	Quick release top
Washer	20X10	8	
Lock washer	12X10	4	
Hexagonal nut	M10	4	
Round-head bolt with cup square bolt	10X30	4	Quick release hook
Washer	20X10	4	
Lock washer	12X10	4	
Hexagonal nut	M10		
Deflection pulley mounting			
Hexagonal bolt	M8X50	6	
Washer	8X16	12	
Lock washer	8X14	6	
Hexagonal nut	M8	6	
Hexagonal bolt	M10X30	3	
Hexagonal bolt	M10X25	2	
Washer	20X10	6	
Stop nuts	M10X30	2	