3. CONNECTING THE WINCH

Mount the winch to the three point linkage system of the tractor by using three coupling pins. The lower links of the tractor must be attached with screws to prevent the transverse movement of the winch.

The winch is driven by a PTO shaft, which should correspond to necessary drive power of the winch —see Technical Data—chapter 1.3
Prior to work, lift the supporting legs of the winch

When first mounting the winch, check the P.T.O. shaft length.
Check the P.T.O. shaft length, by lifting and lowering the winch to determine the shortest distance between the connecting shafts. In this position the tubes of the mounted P.T.O shaft should be approx. 20 mm shorter.

In case P.T.O. shaft is too long, it must be shortened:
Saw off steel and plastic tubes on both ends to the same length. Afterwards file down, clean and grease the edges.

Always place the winch on the level surface. After disconnecting the winch from the tractor, PTO shaft may remain mounted to the winch and laid on the hook.

When using our machines, we recommend Tajfun PTO Shafts:

Model	Dimensions	Compatibility
PTO Shaft C Line-T 2BR + KK560	1 3/8'' Z6 – 1 3/8'' Z6; L_{KK} = 560	EGV 35 A, EGV 45 A
PTO Shaft C Line-T 4BR + KK560	1 3/8'' Z6 – 1 3/8'' Z6; L_{KK} = 560	EGV 45 AHK, EGV 55 A, EGV 55 AHK, EGV 65 A, EGV 65 AHK, EGV 65AHK ZS
PTO Shaft C Line-T 6BR + KK560	1 3/8'' Z6 – 1 3/8'' Z6; L_{KK} = 560	EGV 85 A, EGV 85 AHK, EGV 105 AHK, DGV 2X55 AHK

4. FUNCTION AND OPERATION OF THE WINCH

Observe all safety instructions (Chapter:
2.) ! Also follow important tips in the frames!

4.1. RELEASE THE WIRE ROPE (PERMANENT BRAKE RELEASE) (Figure 4)

By pulling the **white** string **21**, pull the brake handle **20** until it locks in place. The brake band is released now and the drum turns freely. Now, the wire rope can be pulled off the drum. Make sure that the wire rope pulling power is set correctly (Chapter: 4.5.).

When pulling the wire rope use constant force, without jerking which may cause the loosening of the wire rope on the drum and building loops.

When uncoiling the wire rope off the drum, be careful not to rip it off at the connecting point.

4.2. PULLING (COILING THE WIRE ROPE) (Figure 4)

By pulling the **black** string **11**, pull the clutch handle **10** and the winch begins to pull. Always pull the clutch handle to the far end of the groove **H**.

Proceed as described to prevent clutch plates from slipping to increase clutch life time.

The pulling is stopped when you quickly release the clutch string **11** and clutch handle **10** returns to the right position.
During the pulling, the brake handle **20** is blocked in the right position. If the “permanent brake release” (brake handle **20** was blocked in the left position) has been engaged, the brake handle **20** automatically switches to the right position, when you pull the clutch handle **10**. In this position the brake prevents the load from sliding backwards when the pulling is stopped.

WARNING:
If the brake handle **20** has been previously in the left “permanent brake release” position, the brake handle **20** may suddenly switch back to the right position, when you move the clutch handle **10.**

Although the power of the PTO shaft drive remains constant, the pulling power changes.

It is useful to know that at the constant drive power, the pulling power depends on the length of the wire rope coiled to the drum. The strongest pulling power is achieved at the first layer of coils. By multilayer coiling the pulling power decreases progressively. The pulling power changes in inverse proportion to the pulling speed, which is highest when the wire rope if fully coiled.

The nominal pulling is the highest power achieved by the winch with the first layer of coils on the drum. It is defined in the technical data section of this operating instructions and on the type plate of each winch. By increasing the number of coil layers on the drum, the pulling power decreases. With the full drum the pulling power comes to 50% to 60% of the nominal pulling power.

4.3. RELEASING THE WIRE ROPE UNDER LOAD (Figure 4)

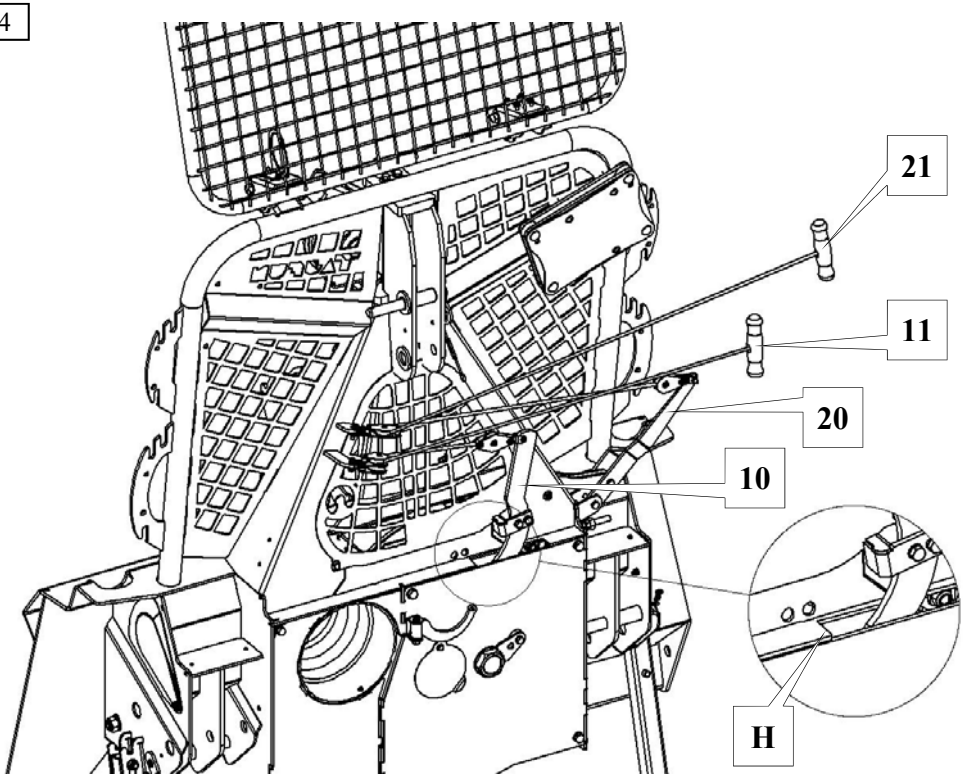
The brake prevents tied load from sliding back, when you stop the pull.
Release the stretched wire rope, by **quickly** pulling the white string **21** of the brake handle **20**.

WARNING:

- **When releasing the wire rope, pull the string lightly to prevent brake handle from blocking in the "permanent brake release" position, otherwise the drum may uncoil suddenly and the coiled wire rope may loosen.**

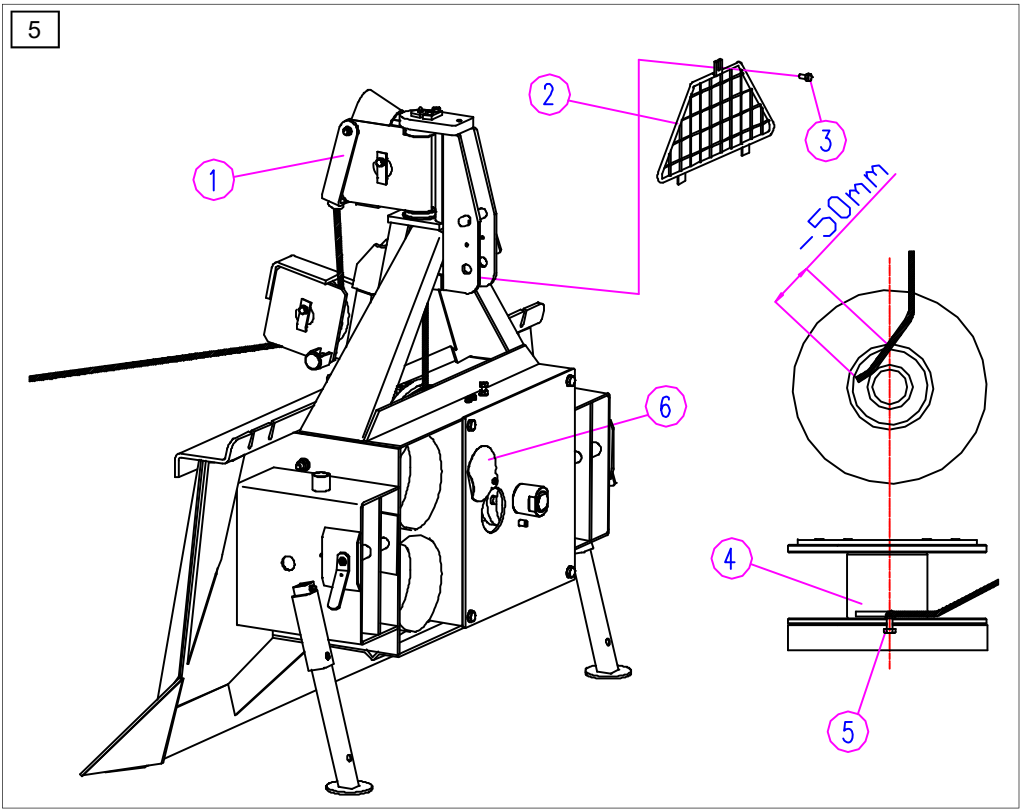
If the wire rope on the drum gets loose, the outer coils of the wire rope get under the inner coils at the repeated pulling, and the wire rope gets damaged quickly.

4



4.4. INSTALLING A NEW WIRE ROPE (Figure 5)

- If the winch is mounted to a tractor, first disconnect the PTO shaft, and switch of the tractor engine
- Remove the triangular shield **2** by unscrewing the screw **3**
- Remove the cover **6**
- Turn the drum to the position which will enable you to reach screw **5** through the opening
- By using the ring spanner No 19 partly unscrew screw **5** and pull out the old wire rope
- Pass the wire rope through the upper pulley **1** into the winch to the outer sidewall of the drum. Slide the wire rope approximately 50 mm into the opening in the drum hub **4**
- Fasten the wire fixing screw **5**
- Reinstall the cover **6** to close the opening and install the triangular shield **2**
- **Coil up the wire rope onto the drum tightly** (Chapter: 4.4.1)



4.4.1. COILING THE WIRE ROPE TIGHTLY ONTO THE DRUM

First, uncoil the wire rope completely and check its quality. Afterwards pull the **black** string **11** and coil up the wire rope onto the drum (Figure: 4).
Pay attention to coil the first five coils using minimum force and the rest of the wire rope using higher force.
You can achieve this in two ways:

- By pulling the load;
- By fastening the wire rope to a fixed object, so that the tractor is pulled towards this object. It is recommended to do this on a slight incline, so the tractor is pulled uphill, or by braking slightly.

WARNING: The wire rope must always be tightly coiled up onto the drum - before starting the work with a new winch it is necessary to uncoil the wire rope completely without any load, check its quality and tightly coil it back onto the drum: first five coils should be coiled by using minimum load and the rest of the wire rope using higher load!

When uncoiling the wire rope off the drum, be careful not to rip it off at the connecting point.

4.4.2 2 WIRE ROPE QUALITY

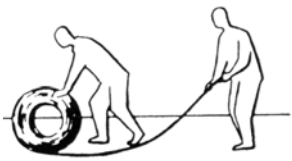
Only unused wire rope can be reclaimed.

- Use only attested wire rope with a minimum brake point, specified in the technical data (Chapter: 1.3).
- The wire rope must not be longer than maximum length, specified in the technical data (Chapter: 1.3).

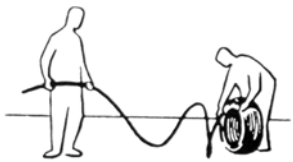
4.4.3 WIRE ROPE UNCOILING (Figure: 6)

WARNING:
When handling the rope, pay attention that the wire rope does not make loops when coiling or uncoiling it.

6



Correct



Incorrect

4.5. SETTING THE WIRE ROPE RELEASE POWER (Figure: 9)

The wire rope release power must be set correctly, so the drum stops immediately after releasing the wire rope. This prevents the wire rope on the drum from releasing by itself.

Set the wire rope release power using the wing nut **41** (Figure: 9).

- By screwing or unscrewing the wing nut **41**, the wire rope release power increases or decreases.

4.6. SETTING THE WINCH PULLING POWER (Figure 8)

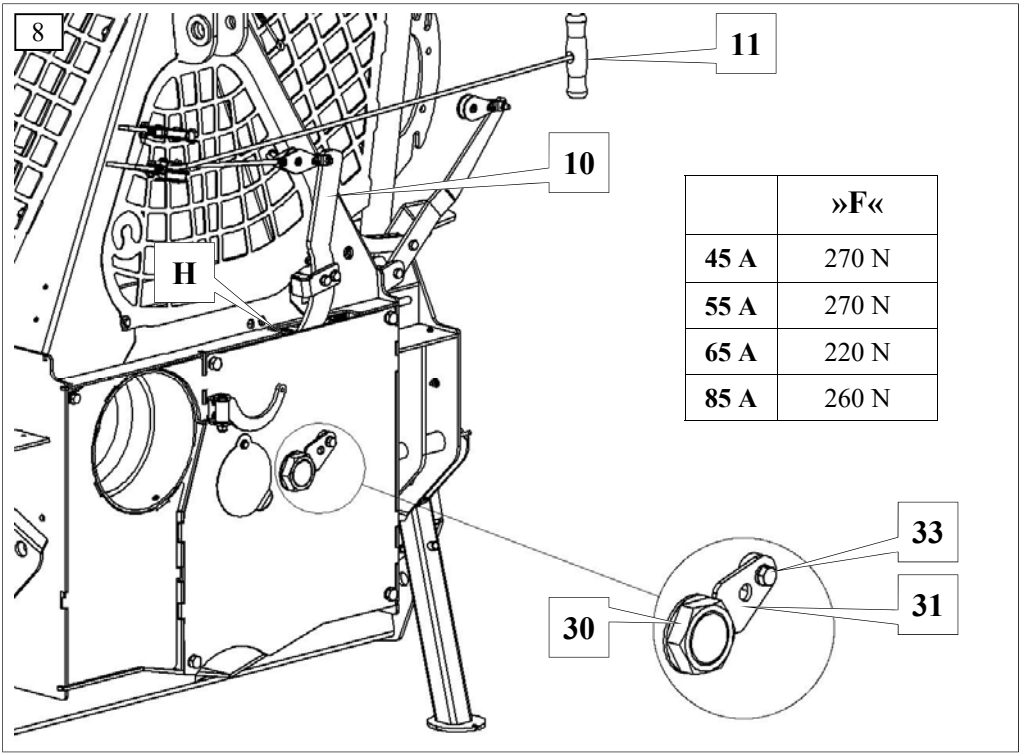
Each winch is factory set to its **maximum** pulling power, which is also specified on the winch type plate. Increasing of the pulling power over this value is **not allowed**. After the pulling power of the winch decreases due to the wear of clutch linings, the clutch must be readjusted.

Pulling power setting procedure:

- Disconnect the PTO shaft and shut down the tractor.
- Use the spanned No 13 to unscrew the nut **33** and remove the safety pin **31.**
- Use the spanner No 50 (45A, 55A) / No 60 (65A, 85A) to turn the nut **30** to the right so that you can pull the string **11** using force “F” to move the clutch handle **10** to the end of the groove **H.**
- Install the safety pin **31** and tighten the screw **33**, to prevent the nut **30** from releasing.

It is important to tighten the nut 30 only so tight, that you can still pull the clutch han-dle 10 to the end of the groove H using the force “F” and reach the nominal pulling power
(See Chapter: 4.2)!

- By proper adjustment of nut **30**, set the nominal pulling power.
- If the nut **30** is set too tightly, you cannot move the handle **10** to the end of the groove and pulling power decreases. If the nut **30** is set too loose, it causes excessive deviation of the drum, which can cause falling of the clutch plates off it’s pins. If this happens, the whole drum must be dismantled.



	»F«
45 A	270 N
55 A	270 N
65 A	220 N
85 A	260 N

4.7. SETTING THE WINCH BRAKE POWER (Figure: 9)

The brake band is s factory set to the brake power which is 25 % higher than the nominal pulling power of the winch. The brake power changes due to the wear of the brake band lining and has to be readjusted periodically. Properly adjusted brake band prevents the load from sliding backwards when the brake handle is the **right** position and allows pulling the wire rope out of the winch, when the brake handle is in the »**permanent brake release**« position.

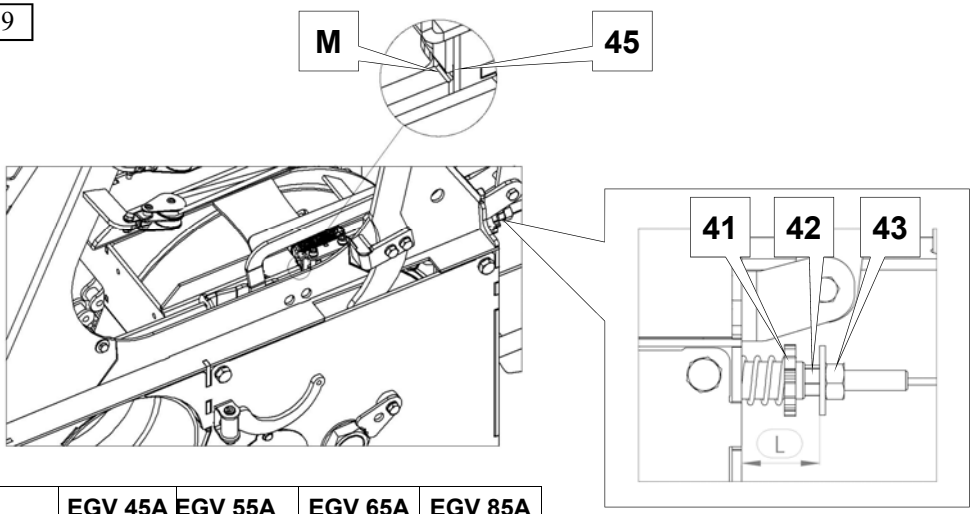
- Set the brake power by screwing or unscrewing the drawn cup **42**, to reach the distance **L**.
- By screwing the drawn cup **42** from its starting position, you increase the brake power, and vice versa.
- Using spanner No 19 screw the counter nut **43** to prevent unscrewing of the drawn cup **42.**

Setting the initial position:

- Remove the triangular shield **3** (Fig.: 5) by unscrewing the screw **2** (Fig.: 5).
- Push the clutch handle **3** to the left and release the clutch handle **10** again. The clutch handle is now in the right position.
- Check if the groove on the lower bar of the blocking mechanism **M** is aligned with the outer edge of the chassis **45**. If this is not the case, adjust the position of the groove by screwing or unscrewing the drawn cup **42** and counter nut **43**. Screw the counter nut tightly afterwards.

WARNING:
If the brake handle **20** has been previously in the left “permanent brake release” position, the brake handle **20** may suddenly switch back to the right position, when you move the clutch handle **10.**

9



	EGV 45A	EGV 55A	EGV 65A	EGV 85A
L	52 mm	52 mm	52 mm	50 mm

4.8. CHECKING AND TIGHTENING THE DRIVE CHAIN (Figure 10)

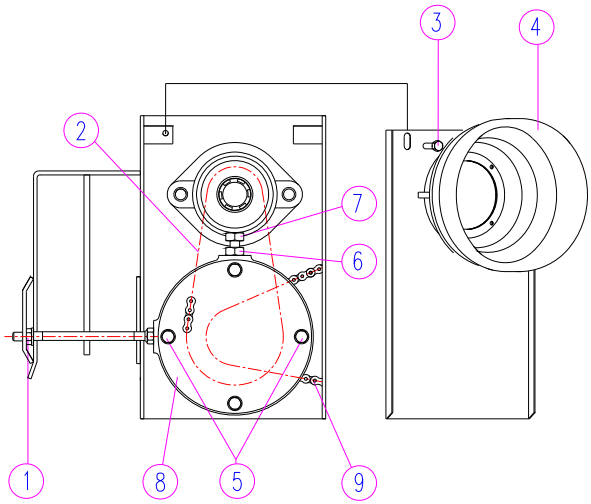
During the operation and under the load, the drive chain stretches, therefore the operator must check and readjust the chain periodically to prevent excessive wear of the whole chain drive. The chain must not be set to tight and chain slack should be set 1 to 3 mm. Shorther chain should allow ±1 mm slack and longer chain ±3 mm. Check the tightness of the chain by hand, pushing the chain between the chain wheels.

Lubricate the chain using special chain lubrication spray.

Procedure:

- If the winch is connected to the tractor, shut down the tractor and disconnect the PTO shaft.
- Unscrew the screw **3** and remove the chain cover **4** by pushing it upwards.
- Loosen both screws **5** by approximately one turn, to move the drive chassis **8.**
- First tighten the shorter chain **2** using the tensioning screw **7** and counter nut **6**. Screw the counter nut tightly, afterwards. The slack of the shorter chain should be ±1 mm.
- Tighten the longer chain **9** by screwing the nut on the tightening screw **1** until you reach the desired chain slack: ±3 mm.
- Screw the screws **5** tightly.
- Install the chain cover **4** and fasten it using the screw **3**.

10



5. SERVICING AND MAINTAINING THE WINCH

Regular and proper maintenance is necessary for trouble free and long-life operation of the winch.

5.1. TROUBLESHOOTING

PROBLEM :	POSSIBLE CAUSES:	ACTION:
The winch pulling power is low	Too much wire rope on the drum	(Chapter:1.)
	Incorrectly adjusted clutch	Set the pulling power according to the instructions (Chapter: 4.6.)
	Greasy clutch plates (improper chain drive lubrication)	Clean the surface of the clutch plates or replace the clutch plates
	Worn out clutch plates	
	Fault in the switching mechanism	Check the operation of the switching mechanism (Chapter: 4.7.) ⊗
	Damaged driving component of the winch	Replace the damaged parts ⊗
The brake does not function	Incorrectly adjusted brake	Set the brake power (Chapter: 4.5)
	Brake band lining is greasy	Clean the brake band lining and the drum surface ⊗
	Damaged brake mechanism	Replace the damaged parts
	Worn out brake band	Replace the brake band
Wire rope is hard to pull out	Incorrectly set wire rope release power	Set the wire rope release power according to the instructions (Chapter: 4.5.)
	Damaged wire rope	Replace the wire rope (Chapter: 4.4.)
	Damaged brake band	Replace the brake band
The winch is pulling when the clutch is disengaged	Incorrectly adjusted clutch	Check the pulling power setting, according to the instructions (Chapter: 4.6.)
	Damaged drum	Replace the drum
	Damaged clutch plates	Replace the clutch plate ⊗

⊗ More demanding procedures must be performed by a qualified technical service, only.

The machine is functionally and safety tested. In case of breakdown it is necessary to use only original spare parts to ensure flawless and safe operation. The customer looses all claims of warranty if non-original spare parts are used, if repairs are performed unprofessionally or by unqualified person.

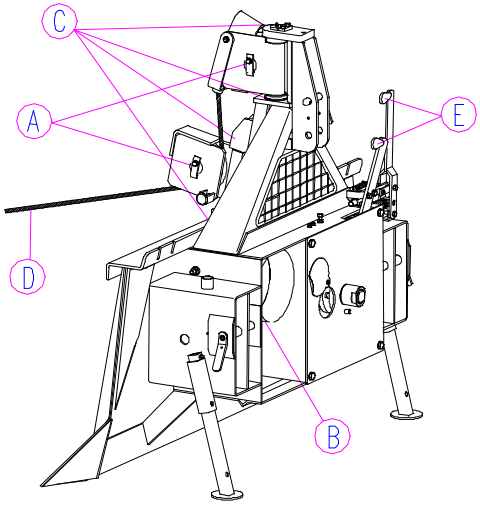
5.2 MAINTENANCE PLAN .

Before starting any operation, the winch must be checked visually and functionally:

All nuts and screws must be screwed tightly
There should be no mechanical damages
All safety devices are installed on the connecting parts of the winch
The PTO shaft is correctly connected and secured by the safety chain
The bottom links of the tractor are correctly fixed and prevent the winch from moving horizontally
The clutch is operating properly
Brake band is operating properly
The wire rope release power is set correctly
Remove all faults and deficiencies before staring the operation

WHAT to do?			WHEN?	HOW?
Release the rope and coil it tightly onto the drum, Check if the wire rope is undamaged, Check if the wire rope is fixed properly			• When using a new winch • When the wire rope is loose on the drum	Visually Ch.:4.4.1
Checking and tightening of the chain			Every 48 hours of operation	Ch.: 4.8.
Clutch plates replacement			When necessary	
Brake band replacement			When necessary	
• Lubrication (Figure:11)	A	Cable pulley's bearing	No lubrication	
	B	Drive chain	Every 48 hours of operation	Chain Lubrication Spray
	C	The upper and lower pulley beds and other sliding elements.	At least once a month	Lithium grease oil
	D	Wire rope	Once a month	Lithium grease
	E	Small pulleys' bearings	Before setting the pulling power	Oil, Spray
• Cleaning the framework interior			Every 100 hours of operation or more frequently in case of harsh operating conditions	

11



5.3. CONSEQUENCES OF MACHINE OVERLOAD AND MISUSE

- Burnt clutch plates
- Burnt brake band
- Damaged brake mechanism
- Torn chain
- Broken pulley or pulley bearing
- Damaged cardan shaft-s housing
- Damaged cardan shaf-s or chain sprockets
- Bent framework (couplings, safety elements, drive carrying elements, pulleys,…)
- Torn "new" wire rope or linking chain of appropriate strength
- Bent drum axle
- Torn brake band

5.4. SPARE PARTS ORDERING .

When ordering spare parts it is necessary to provide the following information:
Winch type, serial number and year of manufacture;
catalogue number, name and quantity of the spare part; Exact customer's address.

The manufacturer warrants the availability of any spare parts and service for the period of 10 years following the purchase of the machine.

Tajfun Planina d.o.o.
Planina pri Sevnici 41a
SI-3225 Planina pri Sevnici
Slovenija
W: www.tajfun.com

EC - Declaration of Conformity

Manufacturer:

TAJFUN Planina, proizvodnja strojev d.o.o.,
Planina 41a, 3225 Planina pri Sevnici, Slovenija

declares with full responsibility that the products mentioned hereinafter:

LOGGING WINCHES

Tip:	Fabrik-Nr.
EGV 45 A	202521-XXXXX
EGV 55 A	202523-XXXXX
EGV 65 A	202525-XXXXX
EGV 65 A 2.05M	207654-XXXXX
EGV 85 A	202527-XXXXX

Tip:	Fabrik-Nr.
EGV 55A 1.8M	202540-XXXXX
EGV 65A 1.8M	202541-XXXXX
EGV 85A 1.95M	202542-XXXXX
EGV 85A 2.05M	202543-XXXXX

covered by this declaration complies with the requirements of:

Directive 2006/42/EC

and is in compliance with standards:

EN ISO 12100:2010, EN ISO 4254-1:2009,
EN 14492-1:2006, ISO/FDIS 19472:2005

The person authorized to compile the technical documentation at the manufacturer's address is the same as the signatory of this Declaration:

Planina, 15. 12. 2016

Iztok Špan
General Manager

TAJFUN
Tajfun Planina,
proizvodnja strojev d. o. o.
Planina pri Sevnici

WARRANTY SHEET

We guaranty:

- that the product will operate fault free, if operated according to enclosed operating instructions;
- that we will repair any fault or defectiveness within 45 days during the warranty period. In case the product is not repaired within the mentioned term, we will replace it with a new product on customer's request.

The product is warranted **12 MONTHS** from the day of purchase, which must be proved by the customer with the certified warranty sheet (stamp of the shop, date of purchase and salesman's signature, serial number and year of manufacture).
Warranty sheet is valid only if shown together with original invoice!

The warranty covers any parts against defects in material and workmanship. In case of repairs performed by unqualified person, or when using non-original spare parts, the customer looses all claims of warranty! Our warranty is void also in case of:

- Damages caused by not following these operating instructions;
- Damages which are customer's fault;
- Damages resulting from improper use or overload and operation in unsuitable conditions.

Winch Type:	Serial number:	Year of Manufacture:
DEALER:	Date:	Signature:

TAJFUN