LandMax

Suppliers Of Quality Agricultural Machinery

**21 Plummers Point Road, Tauranga**



# CHJ-F

## Hedge Cutter

# Operator's Manual

# 1 INTRODUCTION

Congratulations on your choice of a LandMax CHJ-F Hedge Cutter to compliment your operation.

Safe, efficient and trouble free operation of your hedge cutter requires that you and anyone else who will be using or maintaining the hedge cutter, read and understand the safety, operation, maintenance, and trouble shooting information contained within the Operators Manual.



This manual covers the LandMax CHJ-F Hedge Cutter. Use the Table of Contents as a guide to locate required information

Keep this manual handy for frequent reference and to pass on to new operators or owners.

OPERATION ORIENTATION - The directions left, right, front and rear, as mentioned throughout this manual are determined when sitting in the tractors driver seat and facing in the direction of travel.

# SAFETY ALERT SYMBOL

THIS SAFETY ALERT SYMBOL MEANS
**ATTENTION! BECOME ALERT!**
**YOUR SAFETY IS INVOLVED!**



The safety alert symbol identifies important safety messages on the Farmer-Helper Skid Steer Sickle Bar Mower and in the manual. When you see this symbol, be alert to the possibility of personal injury or DEATH. Follow the instructions in the safety message.

## Why is SAFETY important?

**3 Big Reasons**

**Accidents Disable and Kill**
**Accidents Cost**
**Accidents Can Be Avoided**

## Signal words:

Note the use of the signal words DANGER, WARNING and CAUTION with safety messages. The appropriate signal word for each message has been selected using the following guidelines:

**DANGER -** Indicates an imminently hazardous situation that, if not avoided, will result in serious injuries or death. This signal word is to be limited to the most extram situations typically for machine components which, for functional purposes, cannot be gaurded.

**WARNING -** Indicates a potentially hazardous situation that, if not avoided, could result in serious injuries or death, and includes hazards that are exposed when gaurds are removed. It may also be used to alert against unsafe practices.

**CAUTION -** Indicates a potentially hazardous situation that, if not avoided, may result in minor or moderate injury. It may also be used to alert against unsafe prartices.

# 2 SAFETY

YOU are responsible for the SAFE operation and maintenance of your LandMax CHJ-F Hedge Cutter. This manual will take you step-by-step through your working day and alerts you to all good safety practices that should be used while using your Sickle Bar Mower.

Remember, YOU are the key to safety. Good safety practices not only protect you but also the people around you.
Make these practices a working part of your safety program. Be certain that EVERYONE using this equipment is familiar with the recommended using and maintenance procedures and follows all the safety precautions. Most accidents can be prevented. Do not risk injury or death by ignoring good safety practices.

CHJ-F Hedge Cutter owners must give operating instructions to operators or employees before allowing them to operate the machine, and at least annually thereafter.

The most important safety device on this equipment is a SAFE operator. It is the operator's responsibility to read and understand ALL safety and operating instructions in the manual and to follow these. Most accidents can be avoided.

A person who has not read and understood all using and safety instructions is not qualified to use the machine. An untrained operator exposes himself and bystanders to possible serious injury or death.

Do not modify the equipment in any way. Unauthorized modification may impair the function and/or safety and could affect the life of the equipment.

THINK SAFETY! WORK SAFELY!

## 2.1 GENERAL SAFETY

1. Read and understand the Operators manual and all safety signs before using, maintaining, adjusting or cleaning the hedge cutter.



2. Have a first-aid kit available for use should need arise and know how to use it




3. Have a fire extinguisher available for use should neec arise and know how to use it



4. Do not allow riders.

5. Wear appropriate protective gear. This list includes but is not limited to:

- A hard hat
- Protective shoes/Non Slip
- Protective eyewear
- Wet weather gear
- Hearing protection
- Respirator or filter mask




6. Install and secure all gaurds before starting.

7. Wear suitable ear protection for prolonged exposure to excessive noise.



8. Turn machine off, stop and disable engine, remove ignition key and place in your pocket, set park brake and wait for all moving parts to stop before servicing, adjusting, repairing or unplugging

9. Clear the area of people, especially small children, before using the unit.

10. Review saftey related items annually with all personnel who will operating or maintaining the CHJ-F Hedge Cutter

## 2.2 EQUIPTMENT SAFETY GUIDELINES

Safety of the operator and bystanders is one of the main concerns in designing and developing equipment. However, every year many accidents occur which could have been avoided by a few seconds of thought and a more careful approch to handling equipment. You, the operator, can avoid many accidents by observing the following precautions in this section. To avoid personal injury or death, study the following precautions and insist yourself and those working with you follow them.

In order to provide a better view, certain photographs or illustrations in this manual may show an assembly with a safety shield removed. However, equipment should never be used in this condition. Keep all shields in place. If shield removal becomes necessary for repairs, replace immediately.

Replace any safety sign or instruction sign that is not readable or is missing. Location of such safety signs is indicated in this manual.

Never use alcohol or drugs which can hinder alertness or coordination while using this equipment. Consult your doctor about using medication while operating.

UNDER NO CIRCUMSTANCES SHOULD YOUNG CHILDREN BE ALLOWED TO WORK WITH THIS EQUIPMENT. DO NOT ALLOW PERSONS TO USE OR ASSEMBLE THIS UNIT UNTIL THE HAVE READ THIS MANUAL AND HAVE DEVELOPED A THOROUGH UNDERSTANDING OF THE SAFTEY PRECAUTIONS AND HOW IT WORKS.

This equipment is dangerous to children and persons unfamiliar with its operation. The operator should be responsible, properly trained and physically able person familiar with machinery and trained in this equipment's operation. If the elderly are assisting with work, their physical limitations need to recognized and accommodated.

Never exceed the limits of a piece of machinery. If its ability to do a job, or to do so safetly, is in question - DON'T TRY IT

Do not modify the equipment in any way. Unauthorized modification may result in serious injury or death and may impair the function and life of the equipment.

In addition to the design and configuration of this implement, including safety signs and safety equipment, hazard control and accident prevention are dependent upon the awareness, concern, prudence, and proper training of personal involved in the operation, transport, maintenance, and storage of the machine. Refer also to safety messages and operation instruction in each of the appropriate sections of the tractor and machine materials. Pay close attention to the saftey signs affixed to the tractor and the machine.

## 2.3 SAFETY TRAINING

1. Safety is a primary concern in the design and manufacture of our products. Unfortunately, our efforts to provide safe equipment can be wiped out by a single careless act of an operator or bystander.

2. In addition to the design and configuration of equipment, hazard control and accident prevention are dependent upon the awareness, concern, prudence and proper training of personnel involved in the operation, transport, maintenance and storage of this equipment.

3. It has been said, "The best safety feature is an informed, careful operator." We ask you to be that kind of an operator. It is the operator's responsibility to read and understand ALL Safety and Using instructions in the manual and to follow these. Accidents can be avoided.



4. Working with unfamiliar equipment can lead to careless injuries. Read this manual before assembly or using, to acquaint yourself with the machine. If this machine is used by any person other than yourself, or is loaned or rented, it is the machine owner's responsibility to make certain that the operator, prior to using:

   a. Reads and understands the operator's manuals.

   b. Is instructed in safe and proper use.

5. Know your controls and how to stop tractor and machine quickly in an emergency. Read this manual and the one provided with tractor.

6. Train all new personnel and review instructions frequently with existing workers. Be certain only a properly trained and physically able person will use the machinery. A person who has not read and understood all using and safety instructions is not qualified to use the machine. An untrained operator exposes himself and bystanders to possible serious injury or death. If the elderly are assisting with the work, their physical limitations need to be recognized and accommodated.

## 2.4 SAFETY SIGNS

1. Keep safety signs clean and legible at all times.

2. Replace safety signs that are missing or have become illegible.

3. Replaced parts that displayed a safety sign should also display the current sign.

4. Safety signs displayed in Section 3 each have a part number in the lower right hand corner. Use this part number when ordering replacement parts.

How to Install Safety Signs:

- Be sure that the installation area is clean and dry.
- Be sure temperature is above 50°F (10°C).
- Determine exact position before you remove the backing paper.
- Remove the smallest portion of the split backing paper.
- Align the sign over the specified area and carefully press the small portion with the exposed sticky backing in place.
- Slowly peel back the remaining paper and carefully smooth the remaining portion of the sign in place.
- Small air pockets can be pierced with a pin and smoothed out using the piece of sign backing paper.

## 2.5 PREPARATION

1. Never use the machine until you have read and completely understand this manual, the tractor Operator's Manual and each of the Safety Messages found on the safety signs on the tractor and machine.

2. Personal protection equipment including hard hat, safety glasses, safety shoes, and gloves are recommended during assembly, installation, operation, adjustment, maintaining, repairing, removal, cleaning, or moving the unit. Do not allow long hair, loose fitting clothing or jewellery to be around equipment.




3. PROLONGED EXPOSURE TO LOUD NOISE MAY CAUSE PERMANENT HEARING LOSS!
Power equipment with or without equipment attached can often be noisy enough to cause permanent, partial hearing loss. We recommend that you wear hearing protection on a full-time basis if the noise in the Operator's position exceeds 80db. Noise over 85db on a long-term basis can cause severe hearing loss. Noise over 90db adjacent to the Operator over a long-term basis may cause permanent, total hearing loss. NOTE: Hearing loss from loud noise (from tractors, chain saws, radios, and other such sources close to the ear) is cumulative over a lifetime without hope of natural recovery.



4. Clear working area of stones, branches or hidden obstacles that might be hooked or snagged, causing injury or damage.

5. Use only in daylight or good artificial light.

6. Be sure machine is properly mounted, adjusted and in good operating condition.

7. Ensure that all safety shielding and safety signs are properly installed and in good condition.

## 2.5 MAINTENANCE SAFETY

1. Good maintenance is your responsibility. Poor maintenance is an invitation to trouble.
2. Follow good shop practices.
   - Keep service area clean and dry.
   - Be sure electrical outlets and tools are properly grounded.
   - Use adequate light for the job at hand.



3. Make sure there is plenty of ventilation. Never operate the engine of the towing vehicle in a closed building. The exhaust fumes may cause asphyxiation.

4. Before working on this machine, shut off the engine, set the brake, and turn fuel valve off.

5. Never work under equipment unless it is blocked securely.

6. Always use personal protection devices such as eye, hand and hearing protectors, when performing any service or maintenance work. Use heavy or leather gloves when handling blades.

7. Where replacement parts are necessary for periodic maintenance and servicing, genuine factory replacement parts must be used to restore your equipment to original specifications. The manufacturer will not be responsible for injuries or damages caused by use of unapproved parts and/or accessories.

8. A fire extinguisher and first aid kit should be kept readily accessible while performing maintenance on this equipment.






9. Periodically tighten all bolts, nuts and screws and check that all electrical and fuel connections are properly secured to ensure unit is in a safe condition.

10. When completing a maintenance or service function, make sure all safety shields and devices are installed before placing unit in service.

## 2.7 OPERATING SAFETY

1. Please remember it is important that you read and heed the safety signs. Clean or replace all safety signs if they cannot be clearly read and understood. They are there for your safety, as well as the safety of others. The safe use of this machine is strictly up to you, the operator.

2. All things with moving parts are potentially hazardous. There is o substitute for a cautions, safe-mided operator who recognises potential hazards and follows reasonable safety practices. The manufacturer has designed this hedge cutter to be used with all of it's saftey equipment properly attached, to minimise the chance of accidents. Study this manual to make sure you have all safety equipment attached.

3. Close and secure rotor cover before operating.

4. Close and secure all guards, deflectors and shields before starting and operating.

5. Read and understand operator's manual before starting. Review safety instructions annually.

6. Personal protection equipment including hearing protection, hard hat, safety glasses, safety shoes, and gloves are recommended during assembly, installation, operation, adjustment, maintaining, repairing, removal, or moving. Do not allow long hair, loose-fitting clothing, or jewellery to be around moving parts.

7. Keep hydraulic lines and fittings tight, in good condition and free of leaks.

8. Never place any part of your body where it would be in danger if movement should occur during assembly, installation, operation, maintenance, repairing, unplugging or moving.

9. Turn machine off, stop and disable engine, remove ignition key and place in your pocket, set park brake and wait for all moving parts to stop before servicing, adjusting, repairing or unplugging.

10. Do not run machine inside a closed building to prevent asphyxiation from engine exhaust.

    Inspect machine for damaged or loose parts before resuming work.

12. Never use alcoholic beverages or drugs which can hinder alertness or coordination while operating this equipment. Consult your doctor about operating this machine while taking prescription medications.

13. Do not allow riders on this machine at any time. There is no safe place for any riders.

14. Never allow children or unauthorized people to operate or be around this machine.

    Do not exceed a safe travel speed when transporting.

## 2.8 HYDRAULIC SAFETY

1. Make sure that all the components in the hydraulic system are kept in good condition and are clean.

2. Before applying pressure to the system, make sure all components are tight, and that lines, hoses and couplings are not damaged.

3. Do not attempt any makeshift repairs to the hydraulic lines, fittings or hoses by using tapes, clamps or cements. The hydraulic system operates under extremely high pressure. Such repairs will fail suddenly and create a hazardous and unsafe condition.

4. Wear proper hand and eye protection when searching for a high pressure hydraulic leak. Use a piece of wood or cardboard as a backstop instead of hands to isolate and identify a leak.




5. If injured by a concentrated high-pressure stream of hydraulic fluid, seek medical attention immediately. Serious infection or toxic reaction can develop from hydraulic fluid piercing the skin surface.

6. Relieve pressure on hydraulic system before maintaining or working on system.

## 2.9 STORAGE SAFETY

1. Store the unit in an area away from human activity.

2. Do not children to play on or around the stored machine.

3. Store the unit in a dry, level area. Support the frame with planks if required.

## 2.10 TRANSPORT SAFETY

1. Comply with state and local laws governing safety and transporting of machinery on public roads.

2. Check that all the lights, reflectors and other lighting requirements are installed and in good working condition.

3. Do not exceed a safe travel speed. Slow down for rough terrain and cornering.

4. Fold up and secure feed hopper before moving or transporting.

5. Be sure the machine is hitched positively to the tractor and a retainer is used through the mounting pins.

6. Do not drink and drive.

7. Be a safe and courteous driver. Always yield to oncoming traffic in all situations, including narrow bridges, intersections, etc. Watch for traffic when operating near or crossing roadways.

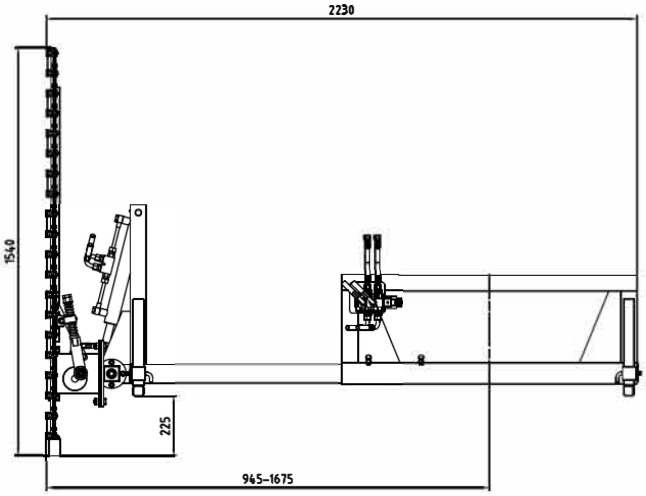
8. Never allow riders on the machine.

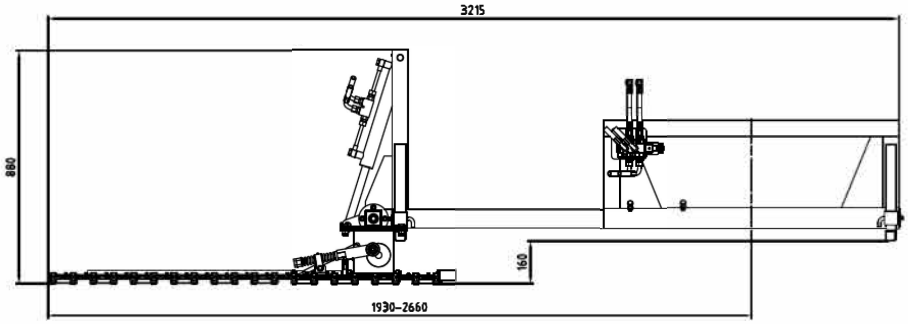
Good safety requires that you familiarize yourself with the various safety signs, the type of warning and the area, or particular function related to that area, that requires your SAFETY AWARENESS.

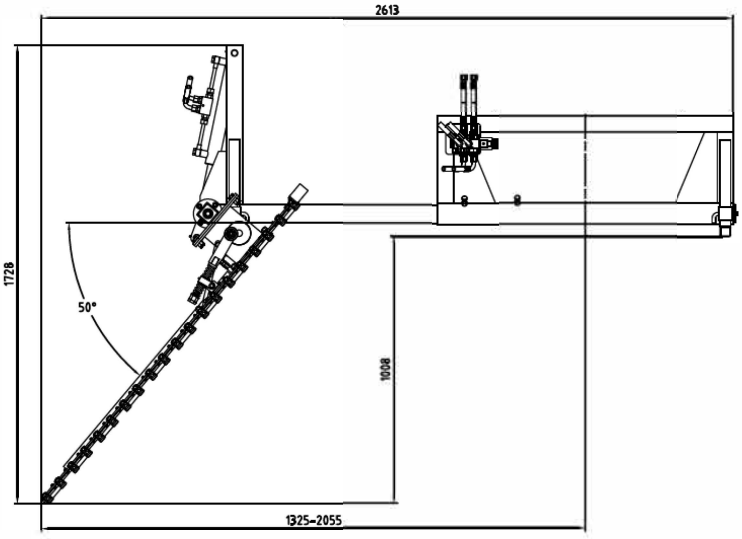
- Think SAFETY! Work SAFELY!



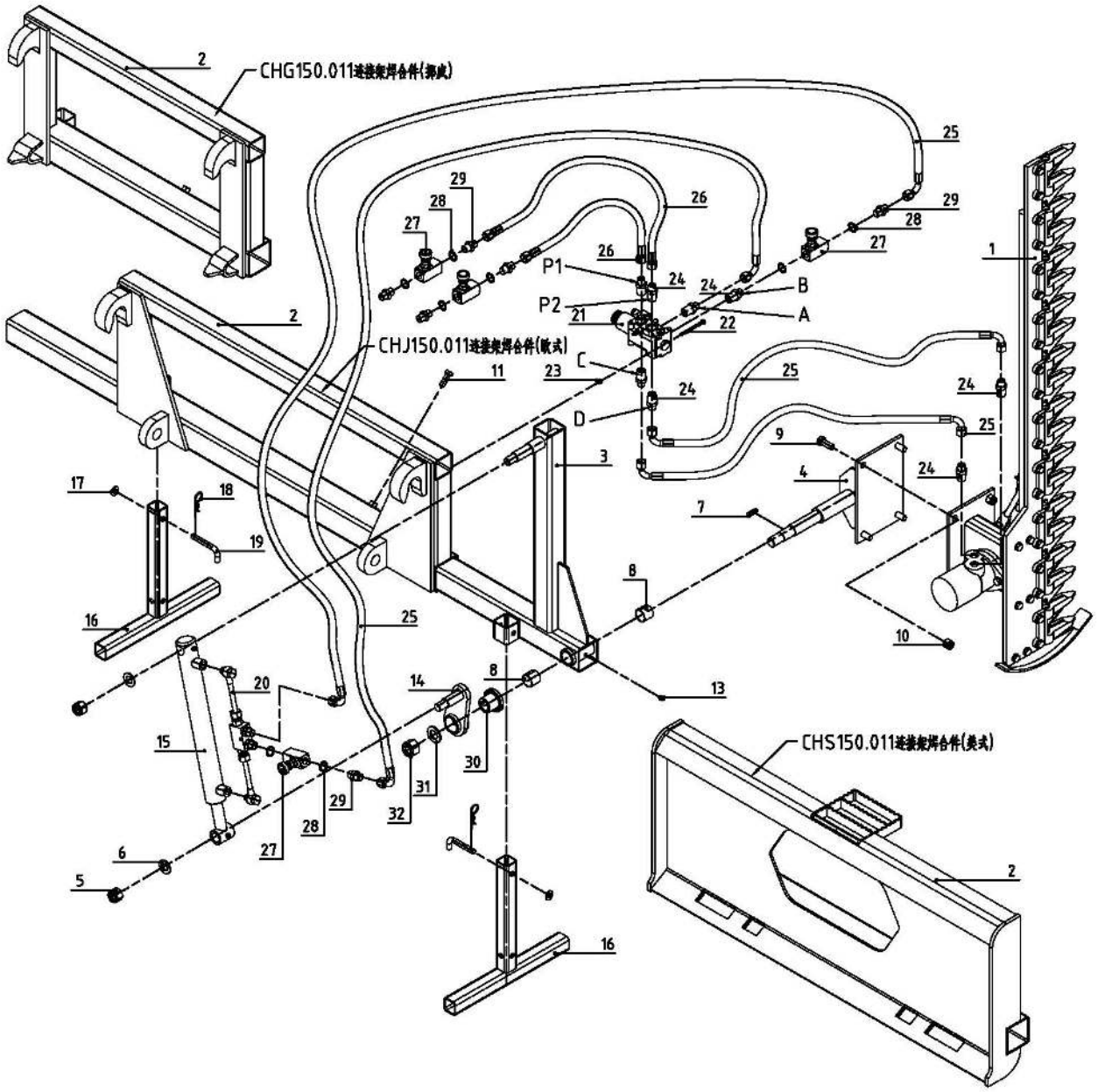
| Specifications in Inch | | | |
|---|---|---|---|
| Model | CHJ-F120 | CHJ-F150 | CHJ-F180 |
| Without Trimmer Head Weight | 242 lbs | | |
| Trimmer Head Only Weight | 93 lbs | 115 lbs | 134 lbs |
| Total Weight | 335 lbs | 357 lbs | 376 lbs |
| Required Hydraulic Pressure | 2250 to 3500 PSI | 2250 to 3500 PSI | 2250 to 3500 PSI |
| Required Hydraulic Flow | 8 GPM to 11 GPM | 8 GPM to 11 GPM | 8 GPM to 11 GPM |
| Brush Cutting Diameter | 3/4 | 3/4 | 3/4 |
| Cutting Bar | 47" | 59" | 71" |


2230
1540
225
965–1675


3215
880
160
1930–2660


2613
1728
50°
1008
1325–2055

## *Schematic –CHJ、CHG and CHS*

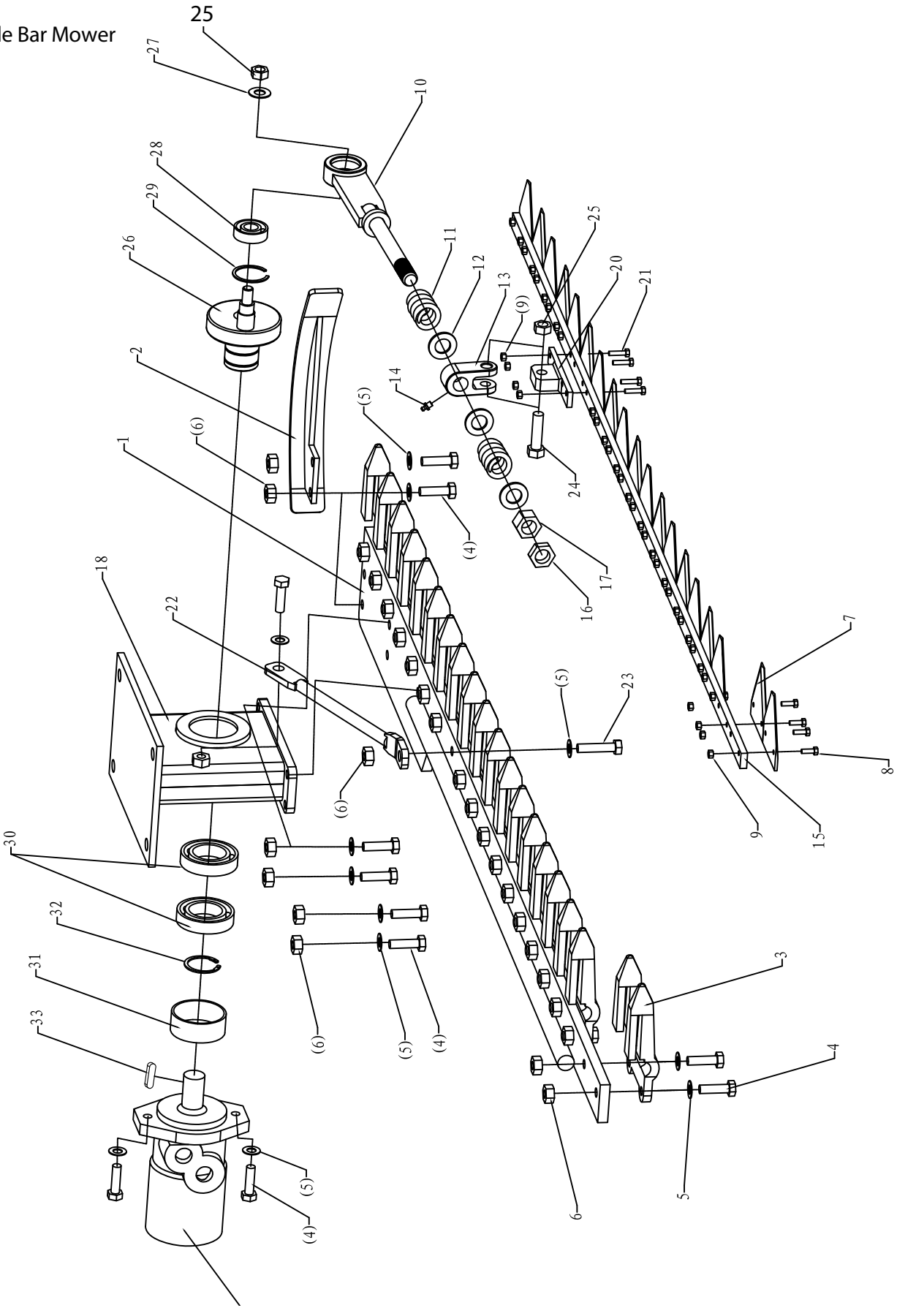


## *Parts List –CHJ、CHG and CHS*

| NO. | PART NO. | Name & Specifications | | QTY |
|---|---|---|---|---|
| 1 | CH150.001 | Hedge trimmer | | 1 |
| 2 | CHJ150.011 | Hanging Weldment(EURO Hitch) | | 1 |
| | CHG150.011 | Hanging Weldment(SMS Hitch) | | |
| | CHS150.011 | Hanging Weldment(Skidder Hitch) | | |
| 3 | CHJ150.012 | Beam Weldment | | 1 |
| 4 | CHJ150.013 | Rotation Seat Weldment | | 1 |
| 5 | GB/T889.1-2000 | Lock Nut M20 | | 2 |
| 6 | GB/T97.1-1987 | Plain Washer | | 2 |
| 7 | GB／T1096-1979 | Key A 8x22 | | 1 |
| 8 | CHJ150.102 | Bearing 30*34*30 | | 2 |
| 9 | GB/T5783-2000 | Bolt M14*35 | | 4 |
| 10 | GB/T889.1-2000 | Lock Nut M14 | | 4 |
| 11 | GB/T5783-2000 | Bolt M12*35 | | 2 |
| 13 | JB／T7940．1-1995 | Oil Cup M8 | | 1 |
| 14 | CHJ150.014 | Swing Arm Weldment | | 1 |
| 15 | CHJ150.015 | Cylinder | | 1 |
| 16 | CHJ150.016 | Support Leg | | 2 |
| 17 | GB/T97.1-1987 | Plain Washer | | 2 |
| 18 | | R Pin 3.2 | R | 2 |
| 19 | 1G135.00.107 | Plug Pin | | 2 |
| 20 | | Safety Valve | | 1 |

| | | | | |
|---|---|---|---|---|
| 21 | DV26.001 | Solenoid Valve | | 1 |
| 22 | GB/T5783-2000 | Bolt M8x80 | | 2 |
| 23 | GB/T889.1-2000 | Lock Nut M8 | | 2 |
| 24 | CP5.60.104 | Adapter R1/2-M18*1.5 | | 8 |
| 25 | CHJ150.017 | Oil Hoses | | 4 |
| 26 | CHJ150.018 | In-out oil hose | | 2 |
| 27 | LA-H10L | One- way throttle valve | | 4 |
| 28 | | Washer 18 | | 8 |
| 29 | | Adapter 18-18 | | 6 |
| 30 | CHJ150.019 | Gear bush weldment | | 1 |
| 31 | GB／T97．1-2002 | Plain Washer 24 | | 1 |
| 32 | GB/T889.1-2000 | Lock nut M24 | | 1 |

# SICKLE BAR CH150 PARTS LIST



| Item | NO. | Parts Name | | Qty | Item | NO. | Parts Name | | Qty |
|---|---|---|---|---|---|---|---|---|---|
| 1 | CH150.011 | main frame | | 1 | 18 | CH150.014 | bearing house | | 1 |
| 2 | CH150.012 | skid | | 1 | 19 | CH150.002 | hydraulic motor | | 1 |
| 3 | CH150.101 | knife protecter | | 10 | 20 | CH150.103 | block | | 1 |
| 4 | GB5783 | bolt M10X35 | M10X35 | 28 | 21 | GB5783 | bolt M5X20 | | 4 |
| 5 | GB97.1 | washer 10 | 10 | 29 | 22 | CH150.015 | supporter | | 1 |
| 6 | GB/T889.1 | locking nut M10 | M10 | 26 | 23 | GB5783 | bolt M10X45 | | 1 |
| 7 | CH150.102 | knife protecter | | 19 | 24 | GB5783 | bolt M12X45 | | 1 |
| 8 | GB5783 | bolt M5X15 | | 34 | 25 | GB/T889.1 | locking nut M12 | | 2 |
| 9 | GB/T889.1 | locking nut M5 | | 38 | 26 | CH150.016 | bent axle | | 1 |
| 10 | CH150.013 | connector | | 1 | 27 | GB97.1 | washer 12 | | 1 |
| 11 | CH150.106 | spring | | 2 | 28 | GB/ T276-1994 | bearing 6203 | | 1 |
| 12 | GB97.1 | washer 18 | | 3 | 29 | GB893.1-86 | hole ring 40 | | 1 |
| 13 | CH150.104 | block | | 1 | 30 | GB/ T276-1994 | bearing 6008 | | 2 |
| 14 | GB1152 | grease zerk M6 | | 1 | 31 | CH150.107 | spacer | | 1 |
| 15 | CH150.105 | knife keeper | | 1 | 32 | GB894.1-86 | shaft ring 40 | | 1 |
| 16 | GB6172-86 | thin nut M18 | | 1 | 33 | GB/ T1096-2003 | key 8X7X32 | | 1 |
| 17 | GB6170-86 | nut M18 | | 1 | | | | | |