## <u>Kellfri</u>®

# 21-LPV4 LIGHTWEIGHT VALVE BLOCK





CAREFULLY READ THE OPERATING INSTRUCTIONS BEFORE USING THE PRODUCT!

**OPERATING INSTRUCTIONS TRANSLATED FROM THE ORIGINAL** 

## **Table of content**

Introduction	3
Product information	3
Safety Information	4
Product Safety Information	4
In case of emergencies	5
Personal protection	5
Surroundings	5
Before use	6
Use	7
Coupling	7
21-LVP4 Light weight valve block	8
Wiring diagram	9
Maintenance and service	10
Valve section with two levers to the tractor	11
Electrical panel -Panel Layout	12
Electrical panel - Power supply	13
Electrical panel - EVR-WMP - Inputs	14
Complaint form	15
Customer service	16
Warranty conditions	16
EC Declaration of accordance of the machine, the ORIGINAL	16

#### INTRODUCTION

Thank you for choosing a product from Kellfri AB. By following the general safety information and the instruction manual and by using common sense, you will have a great and safety use of your Kellfri product for many years. Kellfri designs and delivers effective, affordable machinery and components for forest, agriculture, construction and gardening in Sweden, other Nordic countries and Europe.

#### **PRODUCTINFORMATION**

Valve Package 4+4 sections to the tractor with power cable to the valve mounted on the trolley. Connections 3/8 "

#### **TECHNICAL DATA**

ART. NO	21-LVP4
Max flow	60 l/min.
System pressure	19 Mpa.
Weight	12 kg
Tractor linkage to pressure and return hose	1/2"

#### SAFETY INFORMATION

Before using the product, please read the safety information and instruction manual and understand its contents for your own and others' safety. Always keep the safety information and instruction manual easily accessible to the user of the product.

Remember that it may be good for your own and others' safety to read the safety information every now and then. If the instructions manual is damaged or otherwise unusable, please contact and order a new one from: Your retailer

The general safety instruction is also available from Kellfris website: www.kellfri.co.uk Do not use this equipment if you are feeling sick, tired or in influence of alcohol. Nor if you are under the influence of strong medications or drugs, suffering from strong depression or severe mental illness. Always follow the general traffic rules and regulations and the rules of the Animal Welfare Act. Persons under 15 years old and people with mental illness may not use these product.



For safety, this product should only be used in the manner described in this manual. The user is responsible for the instruction to be read through and followed.

#### PRODUCT SAFETY INFORMATION

- Read the instruction manual carefully before starting the equipment is used.
- Never install the valve package in a system without any filter. Use the recommended filter.
- Valve package linked only in a system with the correct type of oil (mineral oil). Use the recommended oil.
- Install the valve package in cabin / cart where it is not exposed to shock and vibration.
- Always use appropriate fittings and hoses that manage the system's preassure and flow.
- It is important that all connections are correct. Make sure the connection of the pressure -in, return, actuators and controls are connected correctly.
- Couplings must always be tightened to the correct torque and appropriate keys. Fittings should not be too tight, this can damage connectors and pipe connections.
- Never use adhesive tape to try to seal the threads. Use thread sealants.
- Never exceed the maximum operating pressure!



#### IN CASE OF EMERGENCIES

In case of an emergency please dial 112.

Keep cell phone or emergency phone available specially when working alone. First aid kit and fire extinguishers must be kept easily accesable during all work, maintenance and servce

#### PERSONAL PROTECTION

Always wear suitable clothing and footwear. Do not wear loose clothing or jewelry when using the machine. Remember to put up long hair when operating rotating machines. Wear protective gloves, to prevent risking burns on contact with hot surfaces such as exhaust system, and to avoid oil and gasoline on the skin. Hearing protection should be used when the engine is running.









#### **SURROUNDINGS**

Make sure your working area is clear from people, children and objects before installing and using the machine. Risk of serious injuries can occur during operation. Take an extra caution when children are in the area where the equipment/ product is being use or stored. Check the area for low hanging electrical wires. Be careful when working on slopes and near ditches.

Always work alone with single - purpose tools/products. Never have junk lying in your area. Keep working areas clean. Always respect the risk zone.



#### **BEFORE USE**

Read the safety information and instruction manual carefully. Be sure you understand the safety measures, instruction manual and warning labels. Use common sense when operating the machine and use appropriate personal protective equipment. Always check the performance and the machine combination that are used. It's highly important these matches in a satisfactory manner. This is to ensure the product or the function and most important yours and others safety.

Do visual inspection of equipment or product before use. Fix or replace damaged or worn parts immediately to reduce the risk of injury. Lubricate moving parts and check that all screwnuts and bolts are tightened.

Learn and remember the correct working methods. Beginners should always keep a low speed, use extreme caution before routine and product knowledge is achieved. The user/customer is responsible to handle the situation correctly. The product should not be taken into use unless it can be done in a safe way for the user.

- Make sure that the oil level in the tank is correct
- Check the condition of all hoses and couplings.
- Ensure that all guards are in place and can not can not come loose before use.
- Important! To be able to work safely, the operator should know exactly how the control levers work.
- Always check the work area before starting the operation. Make sure that there are no people or animals in the work area.
- Check all lever functions, drive and control the various crane motions before starting the work.

#### **USE**

Only people who understand the safety information and instructions in this manual may operate the equipment. Be alert and careful when working with the machine and only use the tool or product in the manner described in this manual. When working with equipment that has moving parts, there is always the risk of injury.

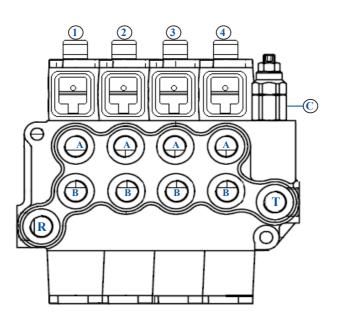
Be careful when working with equipment equipped with hydraulic hoses ,oil under pressure can penetrate the skin. Seek medicalattention immediately if this occurs. Always work alone with the tools that are defined as single porpose tools. Respect the equipment's risk zone.

- Valve package must be fixed and attached with screws on a bracket.
- Valve section with levers shall be placed in an easily accessible place where you can have a good oversight during operation.
- Make sure all connections are correct and that all fasteners are tightened.
- The safety valves must be adjusted to the maximum capacity.

#### **COUPLING**

When connecting the hoses and couplings it is important to have a clean workplace. The dirt may penetrate connections, this can cause wear and deterioration of the equipment. Connect the lightweight valve block package as shown in the diagram.

### 21-LVP4 LIGHT WEIGHT VALVE BLOCK



Marking	Explanation		
A	Cylinder port		
В	Cylinder Port (Return)		
Section 1	right outrigger		
Section 2	left Outriggers		
Section 3	Gripping		
Section 4	extensions		
T	Push		
R	return		
C	shock valve		

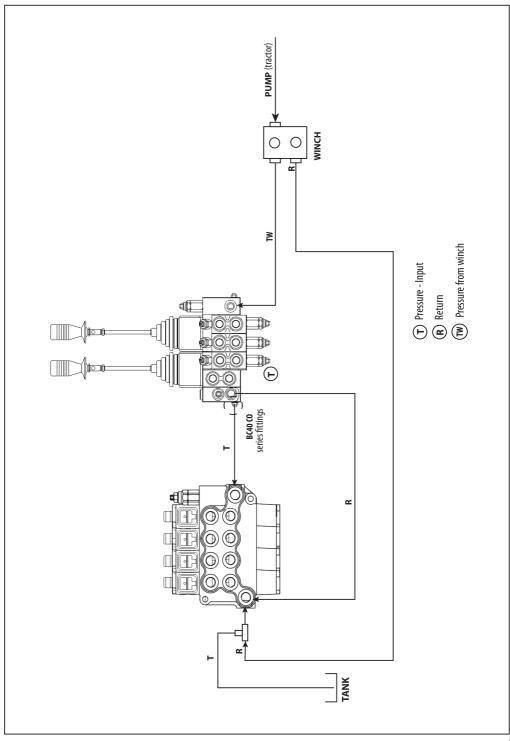


Attach the ON / OFF valve on the carriage

Brown cable (+)

Blue (-)

**Green / Yellow (ground),** does not need to be connected



#### MAINTENANCE AND SERVICE

The tractor engine must be switched off before performing any repation or adjustment on the valve. Replace damaged and worn parts immediately to reduce the risk of injury. Perform maintenance, servicing and inspections as recommended. Only use parts with equivalent performance to reduce the risk of damage and failure. All repairs and connections of electricity must be carried out by persons with the good knowledge about the equipment. Always follow the safety regulations according to maintenance schedule.

- Regularly check the condition of the equipment to prevent breakdown. If cracks, twist, bends, gaps or fatigue is detected, stop using the operation and rectify the faults. Replace worn parts.
- Never perform hydraulic repair without first ensuring that there is no pressure in the system.
- Never work underneath hanging load.
- Check that all connections are tightened after maintenance and service. Always test the
  machine before the operation is started.
- Check all parts for wear and tighten bolts, fittings and hoses as needed.
- Immediately replace hydraulic hoses if cracks or wear occurs.
- Make sure that the hoses do not rub against sharp edges, fix if necessary.
- If any leaks are detected, check and retightened leaking joints. Do not tighten the couplings more than needed. Over thightening can cause damage to the coupling.
- Turn off the tractor and move the hydraulic levers in every direction to release pressure
  that may be present in the hydraulic hoses and tubes before performing any work on
  them or on the hydraulic cylinders.
- It is recommended to use the oil filter with 20 µm filtration.
- Check the system oil flow and pressure regularly.



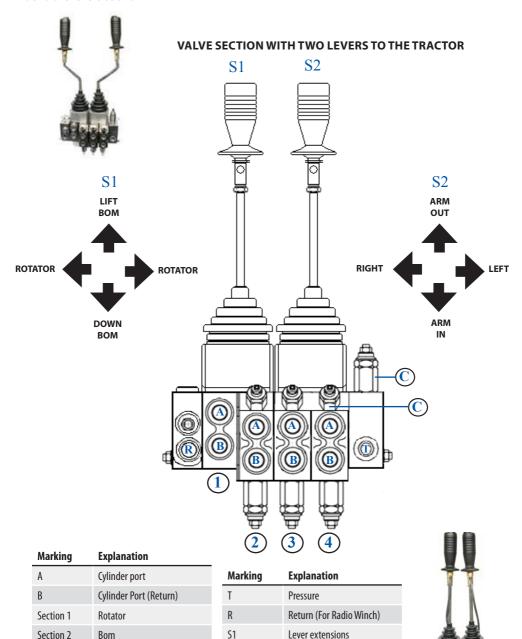
#### Bend the levers as shown

Section 3

Section 4

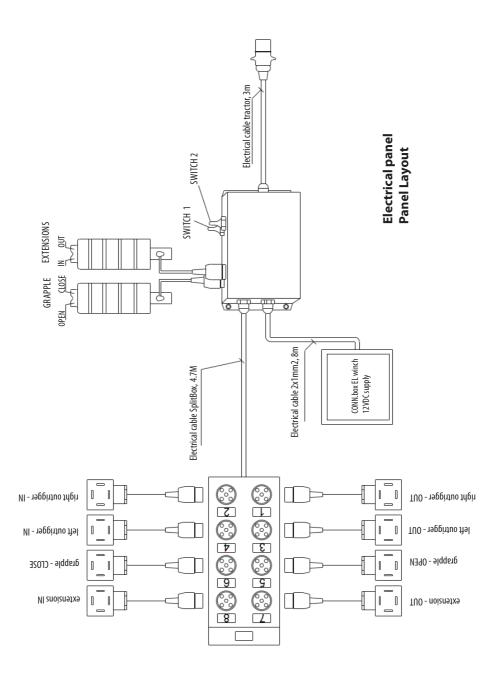
Turn

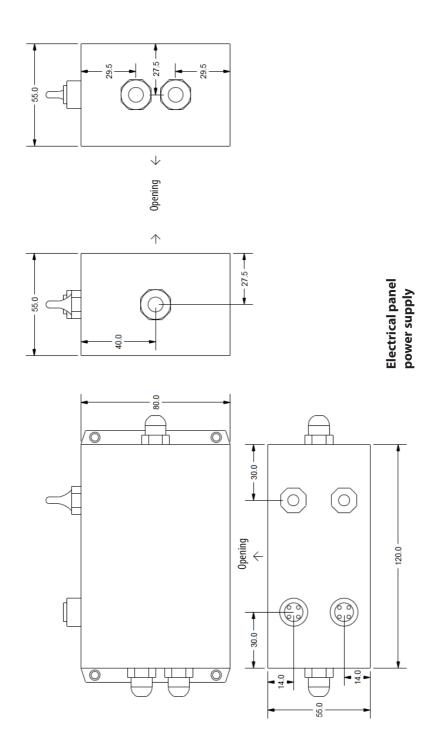
Cut

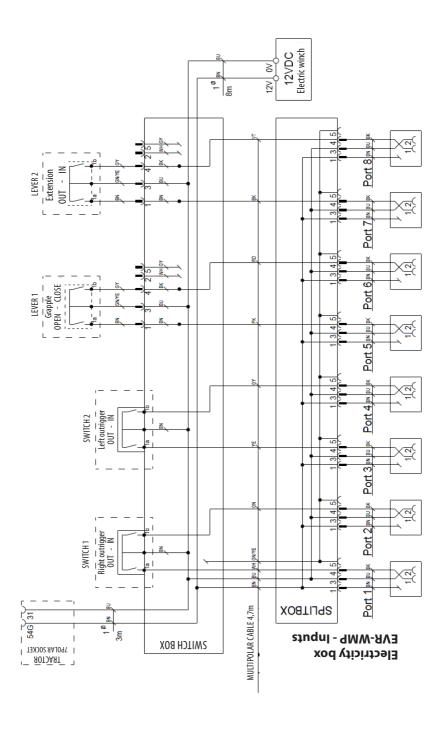


S2 C Lever Grip (open / close)

shock Valves









## **Complaint form**

We are grateful for your help pointing out any inaccuracies in the Kellfri product delivered to you. Before making a complaint read Kellfris general warranty and sales conditions in our catalog as well as the enclosed User's manual that comes with the machine.

Please fill in the details below and attach photo and other information in order to process your request

buyer:	uyer:		Customer number:		
Adress: E-mail:		Invoice number:			
		Phone nr:			
When was the product delivered?	When was the produ operation?	ict taken into	Did the product functioned as it should upon the first operation?		
Defect product / part:					
Problem description:					
Describe the sequence of events:					
Other:					
Submit Complaint form and photo to: Kellfri AB Division of Services : Contact Kellfri retailer					
Or e-mail service. info@kellfri.se					

#### WARRANTY TERMS AND CONDITIONS

Validity of the warranty - Kelifri's Warranty is valid 12 months from the date of purchase.

This warranty replaces - Compensation for spare parts after acknowledgment that the fault lies on the material or manufaturing deffects.

This guarantee do not cover

- Labour costs
- Travel expenses
- Any modification that the buyer himself has/had made.
- Any consequential damages that occured out of damage to the machine.
- Damage due to normal deterioration of the machine, inadequate: service, user inexperience or use of spare parts which are not original.
- Wear parts such as hoses, seals, oils, and mechanical belts

## C C EG-FÖRSÄKRAN OM MASKINENS ÖVERENSTÄMMELSE, ORIGINAL

EC-DECLARATION OF CONFORMITY According to 2006/42/EC, Annex 2A Kellfri AB Munkatorpsgatan 6 532 37 Skara, Sweden

Declares that the machine

Name: 21-LVP4

Type: Light weight valve block

Complies with all applicable provisions of the Machinery Directive 2006/42/EC. Other equipment must meet the hardware requirements of the Directive.

Tina Baudtler, VD 2015-08-06

Kellfri AB is constantly working on further developing their products and therefore reservesthe right to modify, among other things the design and appearance without notice.

#### **CUSTOMER SERVICE**

You are always welcome to give your feedbacks, reviews or ask us about our tools and products.