



**KENCOVE**  
FARM FENCE SUPPLIES

**VECTOR**  
**Manual**

Thank you and congratulations on your purchase of a Vector Powerdrive post driver. Our goal was to design and produce a high quality, high performance post driver with unique features. Our post drivers are based on over 20 years experience in contract fencing. We are confident that after you have used this machine you will agree that we have accomplished our goal.

**Read this manual carefully  
So that you know how to use and maintain  
the machine properly and safely.**

## **SAFETY RULES**

**These instructions are for your protection.**

**Read them carefully and completely understand them.**

**If this machine is not used properly it can cause serious injury or even kill.**

1. Know what each hydraulic control is for.
2. Only allow responsible adults who are familiar with postdriver, tractor unit and these instructions to operate this postdriver.
3. Only use a tractor unit which is in proper working order.
4. Do not use this postdriver without proper safety equipment (Ear and Eye protection, hard hat, gloves, etc...).
5. Never use faulty or worn linkage pins and clips, Always ensure that safety chain provided is in place independent of the hydraulic top link
6. Do not operate the postdriver without the post cap in place.
7. Use only good quality posts.
8. Do not use full impact of hammer on posts less than 150mm in diameter as they are liable to shatter and can cause serious injury to the operator.
9. Never hold or allow an assistant to hold a post in position while being hammered, the post cap is provided for that function.
10. Never allow any part of the body to pass under the hammer or cap when in the raised position.
11. Before driving a post make sure you have firm footing.
12. Do not allow children or any body un familiar with post driver, tractor unit, these instructions and anybody without proper safety equipment near this machinery while in use.
13. Replace the hammer's rope immediately if it shows any signs of wear or fraying, use only certified rope from brennan fencing.
14. Watch for overhead obstructions and dangers E.G. branches, overhead cables, etc.
15. This machine has a **DANGER ZONE** of 5 metres do not allow any persons other than the operator to enter danger zone while machine is being operated.
16. If your post driver is fitted with an auxiliary connection use only attachments approved by Brennan Fencing.
17. If your post driver is fitted with a towing option never exceed the maximum load weight of 750 kg and towing weight of 2000 kg.

## Unloading



Side mounted machines are loaded via a forklift using the back shift slides. Carefull attention must be paid when lifting machines as weight distribution may not be central to where the forks are lifting from. Machines are only lifted for loading/unloading and are not to be transported for any distance in this way.



Rear mounted machines are lifted using a crane or hoist using a chain connected to a lifting pin on the mast and it is the responsibility of the person lifting the machine to ensure the chain is the correct strength to lift the Post Driver.

## Assembling Post Driver



If your post driver has been folded for transport it must be assembled prior to use by removing the support bar and putting the mast tilt ram into position.

Start by attaching the pins at the top of the mast to a telescopic loader or forklift that has suitable reach using a suitable chain and take the weight of the mast.



When pins are loose they can both be removed along with the support bar.





The mast can now be let out to a position where the mast tilt ram can be fitted into place.



Replace both pins and secure with nuts before carefully removing chain.



## OPERATION

**Control levers have a similar layout on all vector machines. Always check and become familiar with the control labels on your machine before use.**

### **Procedure for safe and effective operation**

**Couple the postdriver to your tractor ensuring all pins, clips and top link safety chain are in place. VERY IMPORTANT the pins on both ends of the safety chain must be independent to the pins of the top link! All models except model 1.**



## Hydraulic hoses

When connecting the hydraulic hoses to the tractor, models Agri and Contractor are supplied with a super flow hydraulic system and have three service hoses which are clearly labelled.

The large hose labelled **FREE FLOW RETURN** should not have any restriction; it should be connected directly to non restricted return port or through filler cap.

Do not use less than  $\frac{3}{4}$ " fittings.



## Top Link Adjustment

Select one of the 3 holes to give you the correct ram stroke to suit your tractor.

With the ram in place and all three legs of the postdriver resting on level ground relax top link ram and remove pin "A", then move ram to pick up selected hole finally replace pin securely.





## Rear Parking Leg

Once the post driver has been correctly fitted to tractor and raised, the parking leg can be removed.



## PVME (Excavator model)



Before attaching the postdriver to your excavator you must first check that all pins and hitch dimensions are correct, Bad or loose fitting hitches can fail causing damage or injury.



Once the postdriver has been securely fitted to the excavator the support leg can be removed and the hydraulics connected.

## Positioning of the post driver

Start with the side shift and backshift partially out.

This will allow you to keep the mast in line with the post at all times in both directions without having to move the tractor.

Stop as near in line with the post as you can.

Stopping well out of position results in excessive travel and wear of backshift and sideshift slides. Try to avoid it.

Make sure the post is in line with the mast in both directions at all times.



Failure to observe this point will result in extreme forces being exerted on the mast, sideshift and backshift assemblies causing excessive forces on the machine.

Poor performance in terms of reduced hitting power, low daily output and high risk of breaking posts will result.

Take up position behind post driver controls.

Position the posts holding the post vertical with your right hand. Lift the hammer to clear the height of the post. Then operate the side shift and rear shift controls to position the hammer accurately over the post.



Lower the hammer slowly onto the post and allow the hammer and post cap to rest on the post. Then release the post cap chain from the hammer.



At this stage you are ready to start driving the post and it is the operator's responsibility to ensure that they are the only person within the machines danger zone.

Care should be taken when driving post of 150mm or less in hard ground as they may not be able for the full impact of the hammer.

Use short strokes of the hammer when driving light posts as they are liable to shatter and cause injury to the Operator.

## **WARNING**

**Keep hands and body well clear of hammer, post cap and post.  
Begin hammering using short strokes of the hammer to start the post.  
You do not need full hammer stroke for maximum impact.**

When the post is driven to the correct depth,

Lower the hammer onto the post cap and engage the cap chain. Lift the hammer and cap clear of the post then draw back side shift slide & lower hammer fully before moving machine onto next post.

On certain models a mechanical latch or hook is used to lift the post cap. To lift post cap pull rope to engage latch.

Lift hammer and place post beneath cap & lower hammer and cap onto post.

Latch will release automatically.

Once post is driven pull rope to engage latch. Lift hammer & cap, move forward and lower hammer to bottom of mast before moving machine onto next post.





## Towing

**If your post driver is fitted with a towing option never exceed the maximum load weight of 750 kg and towing weight of 2000 kg.**

**Ensure the correct size hitch and safety chain are used at all times.**

**Check bolts and hitch regularly and replace if showing signs of wear and tear.**

**If hitch is in constant use the ball should be replaced every 12 months even if no signs of damage are visible.**



## Postdriver Mounted Mini Digger

When the mini digger is in use the postdriver must not be used as the operator of the postdriver will be inside the working area of the digging arm.

The same danger zone applies to the mini digger as to the postdriver (5 metres).

Check arm and attachments (bucket, auger, etc) regularly for wear and tear especially pins.



When the digging arm is not in use ensure the safety bars are in place and the shut off valve is in the locked position.



## Rockspike

To use the rockspike first lift the hammer and cap above the spike then unlock the spike and swing under the cap.

**During this operation do not allow any part of your body into the area underneath the hammer and cap.**

Lower the hammer and cap onto the spike and position the spike using the machines slides and tilts.

When in correct position lower the spike collar and drop the spike to the ground, Continue lowering the collar along the spike to the bottom of the mast.

Drive the spike into the ground stopping just before it hits the collar.

To extract the spike first raise the hammer and cap above the travel of the spike and lower the support leg on the bottom of the mast until it makes contact with the ground.

Use the extraction ram to remove the spike from the ground, Once raised fully it can be moved to its parked position and locked in place.

The support leg is only to protect the machine while the spike is being extracted and is not to be used to pull the spike or move the machine out of alignment as this will cause unwanted stress on the postdriver.



## **Maximum daily output**

To achieve maximum daily output when driving posts proceed as follows.

Lower the machine to within 150mm of the ground using tractor hydraulics in position control.

Leave it like that and put tractor hydraulics into constant pumping for your oil supply to the post driver.

Move into position for the first post to be driven and operate hydraulic legs to make firm contact with the ground, drive the post then lift the legs just enough to clear the ground, move to the next post, drop legs to the ground again and continue like this.

This is far better, easier and quicker than lifting and lowering the machine for each post.

When a post rotator is being used, it should be relaxed before lifting it off the post.

## **IMPORTANT**

**Always lower hammer before moving machine.**

## **Maintenance**

To provide a long and trouble free service life, the following maintenance points must be adhered to

**Pulleys:** Pulleys are high up but don't forget them one grease nipple per pulley two shots of grease every two days.

**Inner mast:** Keep mast liberally greased where each slide comes in contact.

**Hammer slide:** Keep liberally greased at all times.

**Post cap rails:** One on each side of mast, keep well greased at all times.

Grease can be applied to all moving parts of main mast with a brush or rag. In addition there are also many grease nipples around the side shift and backshift slides.

The king pin on side mounted machines are fitted with maintenance free self lubricating polymer bearings and do not require grease.

**Plenty of grease pays dividends in the long term.  
Never run mast or slides dry.**

## SAFETY WARNING

### HAMMER ROPE

Check condition of hammer rope frequently for any signs of wear or fraying.  
If there is any doubt about rope condition it should be replaced immediately with a certified replacement from Brennan Fencing.

Rope clamps must be tightened until there is 25mm of thread showing.

### Weekly Checks

- Condition of rope should be examined for signs of wear or fraying.
- Condition of hydraulic hoses and fittings should be examined for signs of wear or leaks
- Condition of post cap should be examined for structural damage e.g. cracks etc.

## Return Hose Important Notice

Return hose must not have any restriction on the return flow of oil to the tractor.

**DO NOT** use a quick release coupling that returns the oil through the tractors own valve.

Return of oil should go back into the same aperture that is used to fill the tractors rear differential or gearbox i.e. **NON RESTRICTIVE**.

The return hose is  $\frac{3}{4}$ " and a  $\frac{3}{4}$ " male or female quick release coupling is ok **ONLY** if it is used in conjunction with a made up adapter in the oil filling aperture as mentioned above.

Problems relating to oil leaks on control valves are often due to oil back pressure.  
You must ensure the oil return pipe allows a free flow and un restricted flow of oil.

Closed centre hydraulics.

For tractors with closed centre hydraulics

i.e. 20, 30, 40 & 50 series John Deer tractors (old type)

a blanking plug must be fitted to the end plate of the hydraulic control valves.





## Safety Warning Stickers

**WARNING**

Always keep hydraulic legs in contact with ground when operating machine. Never over extend or under extend hydraulic legs.

**WARNING**

Before operating this machine remove this leg.

**WARNING**

Ensure safety chain is in place when operating.

**WARNING**

Wear hearing protection.  
Wear eye protection.  
Watch for overhead powerlines.  
Keep hands clear when operating.

**DANGER**

Keep Clear of Hammer & Cap

**EXCAVATOR ARM**

**WARNING**

Always keep Excavator arm in locked position when not in use

LOCK  
UNLOCK

**LUBRICATION GREASE DAILY**

- INSURE SLEDS ARE KEPT PROPER WITH GREASE AT ALL TIMES
- USE NON FLAMM CLEAN OIL & GREASE FOR INNER SLEDS OF HAUNT & CAP O-RING SLEDS
- GREASE MAIN DRIVE, PIN AND TOP PULLY EVERY TWO DAYS
- REGULAR GREASING WILL ADD TO THE PERFORMANCE AND GIVE EXTENDED MACHINE LIFE

**WARNING**

**BEFORE USING POST DRIVER-**

- INSURE TRACTOR IS IN A LEVEL AND WELL MAINTAINED MECHANICAL CONDITION
- INSURE HYDRAULIC LEGS ARE STABILIZED OR CHECK CHAINS AND ADJUSTED TO PREVENT LATERAL WAGGING
- INSURE SLED IS BRACKET IS IN CORRECT WORKING ORDER
- APPLY HARD BRAKE WHEN POST DRIVING
- INSURE FRONT OF TRACTOR IS PROPERLY CALIBRATED TO KICK POST DRIVE
- TAKE GREAT CARE AT ALL TIMES PARTICULARLY ON STEEP OR UNLEVELING GROUND

**SAFETY INSTRUCTIONS**

**OPERATOR SAFETY WARNING**

- HOLD THE OPERATOR MANUAL BEFORE DRIVING THE MACHINE
- FAMILIAR YOURSELF WITH THE MACHINE CONTROLS AND EQUIPMENT BEFORE STARTING
- POINTS THE CONTROLS INDICATED WITH THE TRACTOR AT THE JOB BEFORE LEAVING POSTS, NEVER INCREASE FORWARD SPEED FROM STOPPING
- WEAR SAFETY BELT AND SAFETY SEATBELT WHEN OPERATING MACHINE
- KEEP ALL PERSONS WELL AWAY FROM MACHINE WHILE IN OPERATION
- TAKE CARE AT ALL TIMES - LIFE IS PRECIOUS

**WARNING**

THIS OIL RETURN HOSE MUST NOT HAVE ANY RESTRICTIONS ON THE RETURN FLOW OF OIL, THE OIL MUST GO STRAIGHT BACK TO THE TANK / GENERATOR / REAR DIFFERENTIAL. DO NOT PUT THROUGH THE QUICK RELEASE COUPLING.

**CAUTION TO USER: THIS WARNING WILL CAUSE BLOWN SEALS**

TECHNICAL PROBLEMS CALL 656 9821421



**WARNING**

**BEWARE OF SERIOUS INJURY**

- NEVER PUT HEAD, BODY OR LIMBS UNDER HAMMER
- NEVER TAKE RISKS
- KEEP MACHINE WELL LUBRICATED

FOR ASSISTANCE PHONE 656 9821421

SUPPLEMENTARY  
RETURN

FREE  
FLOW  
RETURN

SYSTEM  
FEED

**Remember**

**Plenty of oil and grease is the cheapest form of maintenance,  
rewarding you with a machine that will give you a long service life,  
operating with maximum driving power and efficiency.**



**800-536-2683**

**[www.postdriver.com](http://www.postdriver.com)**