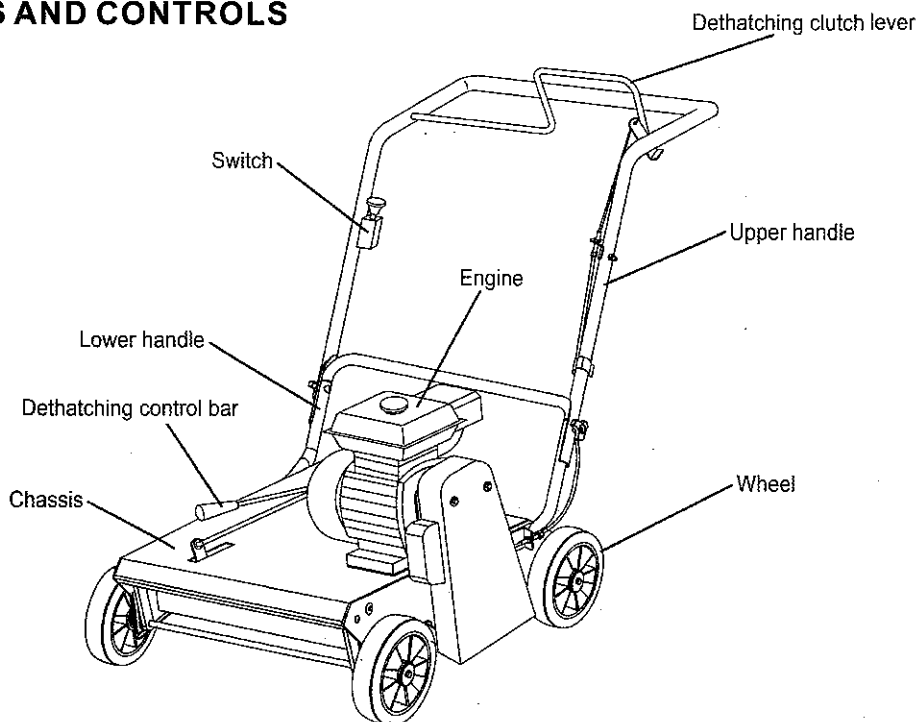


SETTING UP THE POWER RAKE CONT'D...

FEATURES AND CONTROLS



Switch--through which to stop a running engine.

Dethatching control bar-- through which to convert the rake to dethatching state or not.

Dethatching clutch lever-- through which to engage the rotor with flails.

PRE-OPERATION PROCEDURES

Before using the WEIBANG Professional Power rake, please perform the following procedures for the personal and property safety of the operator and jobsite and for optimal performance.

1. Before operating the power rake ensure that it is structurally and mechanically safe by checking the following:

- a. Perform a detailed visual inspection on the machine with particular attention to the following:
 - i. Are there any loose, worn or damaged parts? If so, **DO NOT ATTEMPT TO OPERATE THE MACHINE**. Make note of required parts, and contact your local authorized dealer for replacement parts and further assistance to service the unit **PRIOR** to any further use.
 - ii. Is the machine, particularly the flails and rotor, clean and free of debris? Small rocks and other foreign objects can jam machine and cause the unit to malfunction, leading to serious injury to the operator and property damage on the jobsite.
 - iii. Are there any cracks or damage on the engine? Consult with the engine manufacturer's manual for guidelines and instructions on service. **DO NOT ATTEMPT TO OPERATE THE MACHINE** until engine is refurbished to engine factory standards.
 - iv. Are the flails engaged in the traveling position (i.e: raised from the working surface)? Ensure that the rotor is securely raised away from the working surface until arrival at jobsite. Moving the power rake with the flail and rotor in the lowered working position can damage the unit and jobsite.
- b. Inspect the handle for the following:
 - i. Is the handle properly and securely attached to the machine?
 - ii. Is the handle set in the correct operating position?
- c. Consult the "Recommended Maintenance Schedule" section of this manual and verify that:
 - i. The wheels, zerks and carriage are lubricated and in good condition.

PRE-OPERATION PROCEDURES CONT'D...

- ii. The rotor and flails are clean and not in need of replacement. Consult the "Maintenance and Service" section of this manual for guidelines and instructions on when and how to change the flails.
- iii. The drive belt is in good condition and set to the appropriate tension. Consult the "Maintenance and Service" section of this manual for guidelines and instructions on taking care of the belt.



If any of the above checks fail, please take necessary steps to maintain or repair the unit before operating it in any environment.

2. Before operating the power rake, perform the following environmental checks:
 - a. Is the ground where the power rake will be operating level and solid? If it is a slope of more than 35% grade, please refer to "Dethatching on Inclined Surfaces" under the "Operation Procedures" section of this manual.
 - b. Has the lawn been cleared of debris such as string, wire, rocks, metal and other materials? Such items could cause malfunction or damage to the power rake that could also be potentially hazardous to the machine and operator.
 - c. Are all obstructions such as sprinkler lines, electrical boxes, fences etc. clearly marked?

OPERATION PROCEDURES

A. Transporting the POWER RAKE

1. Loosen bolt on handle until handle folds over the engine and rests against the machine.
2. Work with a partner, lift the unit to the transportation vehicle.
 - a. ALWAYS use safe lifting techniques to avoid back or muscle injury! Consult your local health and safety organization for tips and best practices for moving heavy machinery.
 - b. The POWER RAKE is a HEAVY machine. The net weight is 130lbs / 59kgs.



MAKE sure that BOTH people lifting the machine are capable of lifting at least 100 lbs/45.36 kgs individually!! NEVER ATTEMPT TO LIFT THE MACHINE WITH ONLY ONE PERSON!!

B. Preparing to dethatch

1. For optimum results, make sure that the ground is dry. Dethatching a wet lawn can damage grass roots, thus adversely affect lawn growth and health
2. Mow the lawn to its normal cut height. Check for depth of thatch by removing several sample plugs from the work area. If thatch is deeper than .3/4" (1.9 cm), two separate rakings are recommended (once in the spring and again in the fall) so as not to traumatize established lawn growth.
3. Check for the slope of any inclined area. This machine is not recommended on use on slopes with more than 35% grade.
4. Before operating the Power rake, check that the engine is in good order in accordance with the engine manufacturer's handbook.

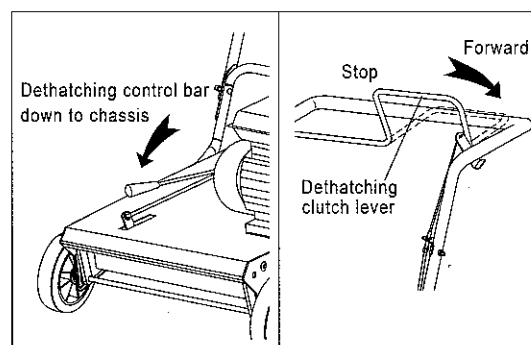
TO OPERATE DRIVE SYSTEM (See Fig.6)

This power rake is a self-propelled machine

- To start forward motion, hold the dethatching control bar to the chassis, and then hold the dethatching clutch lever down to the upper handle.
- To stop forward motion, release dethatching clutch lever.



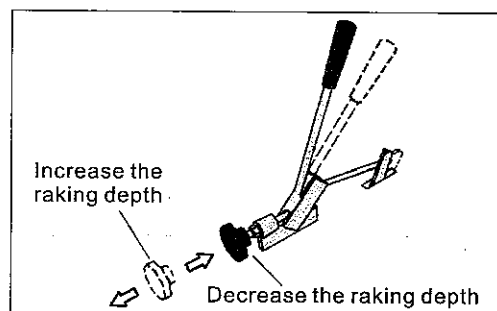
IMPORTANT: ALWAYS KEEP DETHATCHING CONTROL BAR FULLY ENGAGED AGAINST HANDLE WHEN IN USE.



OPERATION PROCEDURES CONT'D...

ADJUSTING THE RAKING DEPTH (See Fig. 8)

- Never adjust the dethatching depth with the motor still running.
- The rake is adjusted to one dethatching depth upon delivery.
- You can set the dethatching height to the desired depth to fit different lawn. Turn the knob to rear position to increase the dethatching depth or to front position to decrease the raking depth.



WARNING: The power rake can only be used on level lawns if the lowest raking height is being used.



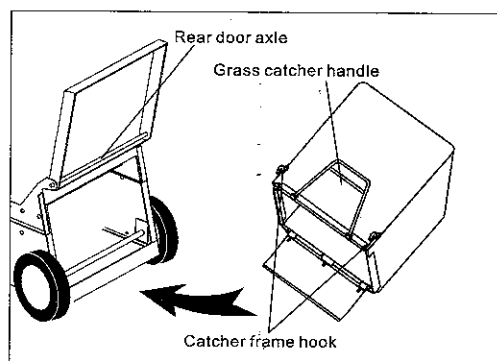
CAUTION: Do not run your power rake without clipping deflector or approved grass catcher in place. Do not touch rotating tines.

TO ATTACH GRASS CATCHER (If equipped)

- Lift the rear door of the power rake and place the grass catcher frame side hooks onto the axle of the rear door.
- The grass catcher is secured to the power rake housing when the rear door is lowered onto the grass catcher frame.



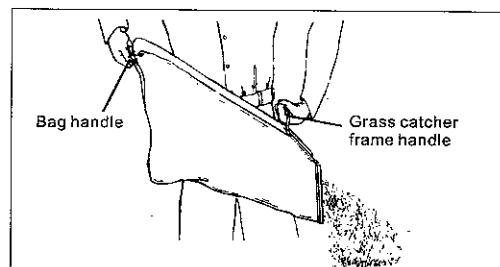
CAUTION: Do not run power rake without clipping deflector or approved grass catcher in place. Never attempt to operate the power rake with the rear door removed or propped open.



TO EMPTY GRASS CATCHER

1. Lift up on grass catcher using the frame handle.
2. Remove grass catcher with clippings from under rake handle.
3. Empty clippings from bag using frame handle and bag handle.

NOTE: Do not drag the bag when emptying; it will cause unnecessary wear.



CAUTION: During operation of emptying clippings from grass catcher, please wear protective gloves to prevent environmental influence on your skin.

BEFORE STARTING ENGINE

ADD OIL

Your power rake is shipped without oil in the engine. Engine holds approximately 0.6L refer to engine manufacturers specifications in engine hand book. For type and grade of oil to use, see "ENGINE" in Customer Responsibilities section of this manual.

1. Be sure power rake is level and area around oil fill is clean.
2. Remove engine oil cap and fill to the full line on the dipstick. Pour oil slowly. Do not over fill.

NOTE: Allow oil to settle down into engine for accurate reading. To read proper level, tighten engine oil cap, then remove it to read the dipstick.

OPERATION PROCEDURES CONT'D...

3. Reinstall engine oil cap and tighten.

- Check oil level before each use. Add oil if needed. Fill to full line on dipstick.
- Change the oil after every 25 hours of operation or each season. You may need to change the oil more often under dusty, dirty conditions.

ADD GASOLINE

NOTE: Before filling fuel tank, remove and discard the debris plug that is inside the tank.

Fill fuel tank. Use fresh, clean, regular unleaded gasoline with a minimum of 87 octants. Do not mix oil with gasoline. Purchase fuel in quantities that can be used within 30 days to assure fuel freshness.



WARNING: Experience indicates that alcohol blended fuels (called gasohol or using ethanol or methanol) can attract moisture which leads to separation and formation of acids during storage. Acidic gas can damage the fuel system of an engine while in storage. To avoid engine problems, the fuel system should be emptied before storage of 30 days or longer. Drain the gas tank, start the engine and let it run until the fuel lines and carburetor are empty. Use fresh fuel next season. See storage instructions for additional information. Never use engine or carburetor cleaner products in the fuel tank or permanent damage may occur.



CAUTION: Fill to bottom of gas tank filler neck. Do not overfill. Wipe off any spilled oil or fuel. Do not store, spill or use gasoline near an open flame.

TO START ENGINE

NOTE: Due to protective coatings on the engine, a small amount of smoke may be present during the initial use of the product and should be considered normal.

1. To start a cold engine, push in the switch knob, and then push primer (if equipped) three times before trying to start. Use a firm push. This step is not usually necessary when starting an engine, which has already run for a few minutes.

2. Move throttle control lever to fast position.

3. Hold and pull starter handle quickly. Do not allow starter rope to snap back.

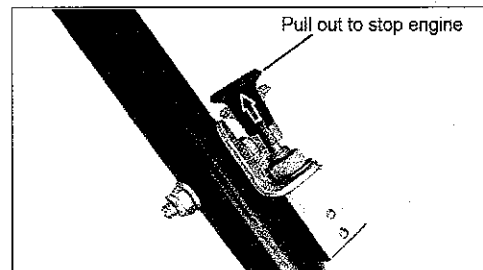
NOTE: In cooler weather it may be necessary to repeat priming steps (if primer equipped). In warmer weather over priming may cause flooding and engine will not start. If you do flood engine, wait a few minutes before attempting to start and do not repeat priming steps.



CAUTION: If the engine fails to start in 30 second after repeated starting operation by pulling the starter knob, please stop your operation and check the causes. See trouble shooting.

TO STOP ENGINE

To stop engine, release the driving clutch lever, and then pull out the switch knob.



C. Dethatching on Flat Surfaces

1. Set flail depth such that they just touch a flat surface, such as pavement.



DANGER: Do not touch rotating tines
DO NOT SET FLAILS LOWER THAN NECESSARY! Lower flail settings will produce neither better results nor speedup the dethatching process. Inappropriate flail settings will cause premature wear on the unit, such as failed drive belts.

OPERATION PROCEDURES CONT'D...

2. Start engine and engage clutch to comfortable walking speed for the operator to maintain control of the power rake at all times.
3. Test the setting of the flails by dethatching a small area. Raise the depth setting if the following conditions occur:
 - a. Engine RPM suddenly drops to extremely low levels.
 - b. Unit pulls forward, bounces roughly or otherwise becomes difficult to control.
 - c. Grooves are left in the lawn by the power rake.
4. Thatch should be easily raked and deposited on top of healthy grass. If significant amounts of healthy grass are also removed in the process, adjust flail depth to decrease damage. If the lawn is covered by heavy thatch, lean on handle to raise front wheel slightly, engage the clutch, then SLOWLY lower dethatcher into ground.
5. Once appropriate flail depth is set, push the power rake in one constant direction and dethatch.
6. Engage clutch control and release to stop power rake.



ALWAYS keep flails RAISED where there is any possibility of crossing hard objects or surfaces such as rocks, pavement, etc.)

7. To turn the power rake, push down on handle to raise rotor and flails from turf and pivot on back wheels.
8. Remove and dispose of thatch after raking prior to any further lawn treatments.

D. Dethatching on Inclined Surfaces



DANGER: Do not touch rotating tines

1. When operating on inclines, note the following:
 - a. THIS MACHINE IS NOT DESIGNED FOR USE ON INCLINES OF MORE THAN 35% GRADE.

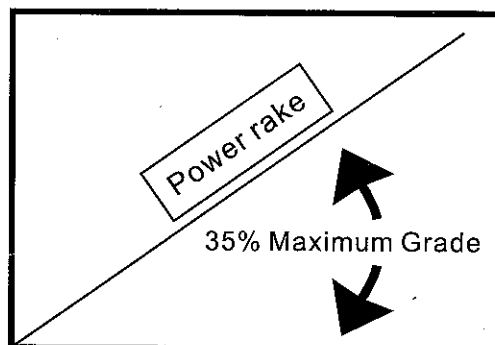


IF MACHINE IS USED ON EXTREME INCLINES, THE MACHINE MAY BECOME UNBALANCED TO THE POINT OF PRESENTING THE DANGER OF ROLLING OVER.

- b. Dethatching on inclines will cause the centre of gravity of the unit to shift to the downward side of the machine. The following conditions may occur as a result:
 - i. Greater effort and physical exertion may be required to maneuver and control the balance of the machine.
 - ii. Uneven raking results from the shift in gravity leading to downhill flails working at a lower raking depth than the uphill flails which are working at a higher setting.
 2. Consider the following tips for dethatching on inclines:
 - a. Move machine across hills rather than up and down on the hill for greater control and even dethatching. (see above for explanation and Diag. 1 below for diagram). Raking across hills helps to prevent water runoff, and allows the lawn to hold more seed, fertilizer and water to encourage healthy growth.



Disengage tines from ground only when machine is on a flat surface. NEVER DISENGAGE TINES WHEN TRAVELLING UP OR DOWN INCLINES.



Diag. 1: Dethatching on inclined site

STORING THE POWER RAKE

1. Ensure that the area in which the machine will be stored is well-ventilated and free of any potential fire hazards such as open flames, gas appliances, furnaces, water heaters, and other appliances.
2. Clean and lubricate machine prior to storage.
3. Lightly lubricate flails and rotor to inhibit rusting.
4. Touch-up any scratches or damaged area exposing metal to the elements.
5. Order and re-apply any safety labels. Refer to "Information on Safety Decals" in "Parts Breakdown Section" of the manual for placement and parts numbers.
6. Verify with engine manufacturer's handbook for guidance on preparing engine for storage.
7. Store unit in transport position (see "Transporting the POWER RAKE" in "Operation Procedures" section).
8. Store the machine in a covered or indoor storage area for increased protection and longevity.

MAINTENANCE PROCEDURES

This section encompasses two general types of maintenance: 1. Preventative Maintenance and 2. General Service. The first refers to regularly scheduled routine care of the power rake, such as cleaning and lubrication. The second provides information on common procedures, such as changing flails, and adjusting the drive belt that are to be performed as needed.

By following the Inspection Schedule below BEFORE and AFTER each use of the power rake, appropriate actions can be taken to extend the service life of the machine and reduce any costly repairs and unnecessary downtime for the unit.



All service should be performed by trained technicians.

A. Inspection Schedule

The following list aims offer some basic guidelines to performing a detailed inspection BEFORE and AFTER each use. Certain checks will require some disassembly, i.e. the removal of the drive guard, to perform. Depending on various environmental conditions and frequency of use, other inspection points may have to be added for each machine.

Item	Yes	No
Is the engine oil filled to recommended levels? Consult Engine Manufacturer's Manual.		
Is the engine air cleaner properly attached and clean? Consult Engine Manufacturer's Manual.		
Is the clutch cable properly attached? Refer to p.10 "Setting up the Power rake" for details.		
Is the clutch cable worn or visibly damaged? Replace if necessary.		
Is the drive belt tension set properly? Refer to p.16 "Replacing Drive V-Belt and Pulley" for details.		
Does the drive belt show signs of wear and tear? Replace if necessary.		
Are all the flails in good condition? Are any flails worn down to minimum length of 3"/7.6 cm? If so, have they been replaced?		
Are the spring clips which secure the flails and rotor shaft in good condition? If so, make sure that the sprockets will be replaced before any further use as worn sprocket can lead to chain slippage and other mechanical issues that may cause serious harm to the jobsite and/or bodily damage to the operator.		
Is the carriage securely fastened and free of all debris? Lingering debris may lead to premature wear on the machine and shorten performance life.		
Are the safety warning labels and other decals clearly identifiable and legible? If not, ensure that fresh decals will be re-applied prior to use for operator safety.		
Is the frame and handle in good condition with no visible damage or rusting? If not, contact your local authorized dealer to replace machine prior to further use.		