

## Service Advisory

MTD-105

## (Log Splitter- SAFETY RECALL)

Models Affected: MTD GOLD - 24BF510B004, 24BF510E204, 24BF570L004 and 24BF570F204

**TROY-BILT** - 24BF572B766, 24AD597D766, 24BF572B711 and 24AD597D711

YARD MACHINES - 24BF552B729 and 24BF550B029

CUB CADET- 24BF572B710, 24AD598A010 and 24BF572B756

MTD - 24BF550M006

**YARD MACHINES** (Canadian Models) - 24AA5DMK500 and 24BH510L500 **SEARS CRAFTSMAN** - 24BF570L099 (247.77640) and 24BF570F299 (247.77641)

Serial Number

Log Splitters manufactured between November 1, 2008 (Date Code "...K018...") and

Range Affected: September 1, 2009 (Date Code "...1019...")

October 8, 2009 Date:

MANDATORY INSPECTION, TEST and REPAIR - Potential safety concern arising from the log Subject:

splitter's control valve not returning to neutral when the control handle is released from the

extend position permitting the splitting wedge to continue to move.

PRODUCT RECALL - This repair program is being undertaken in cooperation with the

U.S. Consumer Products Safety Commission.

**REQUIRED ACTION:** This advisory is to be considered a **MANDATORY** inspection and repair.

SYMPTOM: Suspect control valves may not fully return to neutral when the control lever is released gently from the "EXTEND" position, allowing the splitting wedge to continue to extend.

#### **DISCUSSION:**

1. To determine if the log splitter is affected by this service advisory and that the control valve on the unit is a suspect valve, use the following criteria to determine if the log splitter is affected and then if the control valve requires testing and possible replacement.

#### If the log splitter is in the carton or crate:

Locate the white model number label on the side of the carton or crate as shown in Figure 1. If there is a **green** "X" located by the model number, the unit has already been verified as having a GOOD functioning valve. Stop here.



FIGURE 1

If there is no **green** "X" on the carton or crate label proceed to "Inspection and Test Procedure for Log Splitters In the Crate" for the appropriate tonnage rating of the log splitter on page 2 or 3.

### If the log splitter is not in the crate:

Locate the model/serial number label on the log splitter. If there is a "C" located on the model/serial number label as shown in Figure 2, the unit has already been verified as having a GOOD functioning valve. Stop here.



FIGURE 2

If there is no "C" on the model/serial number label, proceed to Step 2.

- 2. Verify if the log splitter is affected by this advisory as follows:
- A) Is the model number of the log splitter listed above in "Models Affected"?
- B) Is the serial number of the log splitter on or between the dates listed above in "Serial Number Range Affected"?

If the answer is "YES" to both questions A) and B), proceed to "Inspection and Test Procedure for" Assembled Log Splitters" on page 2.

If the answer to either A) or B) is "NO", the log splitter is not affected by this recall. Proceed to "Identifying a Good Log Splitter" section on page 5.

## Inspection & Test Procedure for Assembled Log Splitters:

(8, 21,25, 27 and 33 Ton Models)

3. Locate the control valve and look at the control valve end cap (opposite end from the handle) as shown in Figure 3.

If the valve has the word "ENERGY" embossed in the end of the cap, the valve must be tested. Proceed to Step 4.

If the end cap on the control valve does not have the word "ENERGY", the log splitter is **not affected** by this service advisory. Proceed to "**Identifying a GOOD Log Splitter**" section on page 5.

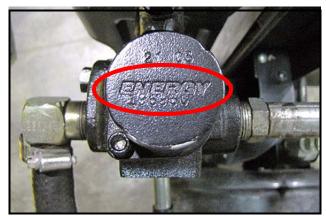


FIGURE 3

- 4. The control valve must be tested to verify if it is a GOOD valve or needs replacement.
- 5. The log splitter does not have to be operational. i.e. engine running.
- 6. Push the control valve handle to the "EXTEND" position which would extend the splitting wedge.

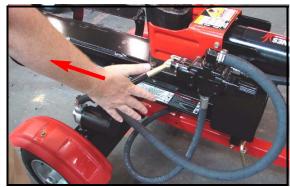


FIGURE 4

- 7. **Slowly/gently** remove pressure from the control valve handle and allow the handle to return to the neutral position on its own. The handle should freely "snap" back into the neutral position, without hesitation or binding.
- 8. Repeat Steps 6 and 7 five (5) times.
- 9. If the handle binds or hesitates, or does not return to the neutral position when the hand is removed on any one of the trials, the control valve must be replaced. Proceed to "Control Valve Replacement" section on page 4.

If the handle DOES NOT bind or hesitate and returns freely with a snap to the neutral position, the valve is GOOD. Proceed to "Identifying a GOOD Log Splitter" section on page 5.

# Inspection & Test Procedure for Log Splitters in the Shipping Carton: (8 Ton Models)

- 10. Remove banding straps from carton.
- 11. Remove the staples from the top of the carton.
- 12. Open the carton flaps to expose the log splitter.
- 13. Locate the control valve and look at the control valve end cap (opposite end from the handle) as shown in Figure 3. If the valve has the word "ENERGY" embossed in the end of the cap, the valve must be tested. Proceed to Step 14.

If the end cap on the control valve does not have the word "ENERGY", the log splitter is **not affected** by this service advisory. Proceed to "**Identifying a GOOD Log Splitter**" section on page 5.

14. Remove the hairpin and clevis pin from the valve's spool end. See Figure 5.



FIGURE 5

15. Locate the control handle (laying on top of the cylinder) and install the handle onto the valve's spool end. Secure with the clevis pin and hairpin. See Figure 6.



FIGURE 6

16. Push the control valve handle to the "EXTEND" position which would extend the splitting wedge. See Figure 7.



FIGURE 7

- 17. **Slowly/gently** remove pressure from the control valve handle and allow the handle to return to the neutral position on its own. The handle should freely "snap" back into the neutral position, without hesitation or binding.
- 18. Repeat Steps 16 and 17 five (5) times.
- 19. If the handle binds or hesitates, or does not return to the neutral position when the hand is removed on any one of the trials, the control valve must be replaced. Proceed to "Control Valve Replacement" section on page 4.

If the handle DOES NOT bind or hesitate and returns freely with a snap to the neutral position, the valve is GOOD. Proceed to "Identifying a GOOD Log Splitter" section on page 5.

### Inspection & Test Procedure for Log Splitters in the Shipping Crate: (21, 25 and 27 Ton Models)

20. Carefully remove the plastic bag from the area surrounding the control valve. See Figure 8.



FIGURE 8

21. Locate the control valve end cap (opposite end from the handle). If the name "ENERGY" is embossed in the end cap, proceed to Step 22. See Figure 3.

If the valve does not have the name "ENERGY" embossed in the end cap the log splitter valve is GOOD. Proceed to "Identifying a GOOD Log Splitter" section on page 5.

22. Push the control valve handle away from the valve body to the "EXTEND" position which would extend the splitting wedge. See Figure 9.



FIGURE 9

- 23. **Slowly/gently** remove hand/pressure from the control valve handle and allow the handle to return to the neutral position on its own. The handle should freely "snap" back into the neutral position, without hesitation or binding.
- 24. Repeat Steps 22 and 23 five (5) times.
- 25. If the handle binds or hesitates, or does not return to the neutral position when the hand is removed on any one of the trials, the control valve must be replaced. Proceed to "Control Valve Replacement" section on page 4.

If the handle DOES NOT bind or hesitate and returns freely with a snap to the neutral position, the valve is GOOD. Proceed to "Identifying a GOOD Log Splitter" section on page 5.

# Inspection & Test Procedure for Log Splitters in the Shipping Crate: (33 Ton Models)

26. Remove the plastic bag from the area surrounding the control valve. See Figure 10.



FIGURE 10

27. Locate the control valve end cap (opposite end from the handle) If the name "ENERGY" is embossed in the end cap see Figure 3, proceed to Step 28.

If the valve does not have the name "ENERGY" embossed in the end cap, the log splitter valve is GOOD. Proceed to "Identifying a GOOD Log Splitter" section on page 5.

- 28. Rotate the cylinder slightly by pulling up on the valve body.
- 29. Push the control valve handle away from the valve body in the direction which would extend the splitting wedge. See Figure 11.

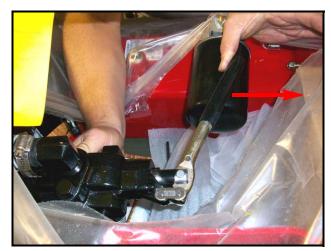


FIGURE 11

- 30. **Slowly/gently** remove hand/pressure from the control valve handle and allow the handle to return to the neutral position on its own. The handle should freely "snap" back into the neutral position, without hesitation or binding.
- 31. Repeat Steps 29 and 30 five (5) times.
- 32. If the handle binds or hesitates, or does not return to the neutral position when the hand is removed on any one of the trials, the control valve must be replaced. Proceed to "Control Valve Replacement" section on page 4.

If the handle DOES NOT bind or hesitate and returns freely with a snap to the neutral position, the valve is GOOD. Proceed to "Identifying a GOOD Log Splitter" section on page 5.

### **Control Valve Replacement:**

33. Order and install the appropriate RECALL REPLACEMENT VALVE in accordance with the table below. The RECALL REPLACEMENT VALVE will be shipped NO CHARGE.



LOG SPLITTER	ORIGINAL VALVE	RECALL	
TONNAGE RATING	PART NUMBER	REPLACEMENT	
		VALVE	
8	718-0481A	753-06232	
21	718-04533	753-06234	
25	718-04534	753-06233	
27 and 33	718-0481A	753-06232	

**NOTE:** When the new replacement valve arrives, save the enclosed RETURN SHIPPING LABEL, plastic bag, bag tie, the valve's port plugs and carton for later use.

**NOTE:** There is hydraulic oil in the tank and hoses. Place a drain pan under the control valve and pump before removing any hoses and fittings from the valve or pump.

- 34. Carefully remove the three hoses from the valve being replaced and plug each open end. The pressure hose from the pump must be loosened at the pump to allow the pressure hose to be removed from the valve.
- 35. Remove the valve being replaced from the cylinder by unscrewing the valve with the pipe union. The pipe union remains in the valve. Cover/plug the cylinder port.
- 36. Remove the fittings, handle, chain links and hardware from the valve being replaced.
- 37. Remove and save the port plugs from the new valve and install the fittings removed in Step 36 onto the new replacement valve.

DO NOT over tighten the fittings into the valve body. Install the fittings finger tight at first. Then tighten an additional 1-1/2 to 2 turns ensuring the fittings align in the correct direction.

- 38. Install the new replacement valve onto the cylinder. Rotate the valve by hand until the pipe union is snug. Then using a 7/8" open end wrench on the pipe union hex, rotate the valve along with the pipe union to tighten the pipe union into the cylinder.
- 39. Install the handle and chain link connector, removed from the valve being replaced in Step 36, onto the new valve.

**NOTE:** If the chain link pin cannot pass through the holes in the two ears of the valve end cap, use a "B" letter (.238" diameter) drill bit to open up the holes in the two ears.

- 40. Re-install all hoses and tighten the pressure hose fitting at the pump.
- 41. Verify that the new installed valve passes the return-to-neutral test. Perform Steps 6 through 8 on the new valve.

**NOTE:** Clean up all spilled oil from the log splitter components and crate if so packaged.

- 42. If the unit is already assembled and serviced with oil and fuel, test run the unit to ensure there are no leaks. Correct as necessary.
- 43. Proceed to "Identifying a GOOD Log Splitter" section on page 5.

### Identifying a GOOD Log Splitter:

- 44. Using a blue permanent marker (like a Sharpie Permanent marker) place a "C" in the lower right corner of the model/serial number label on the log splitter if any of the three conditions listed below are met. See Figure 2.
- A) The control valve DOES NOT have the name "ENERGY" embossed in the end cap
- B) The valve tested GOOD
- C) The control valve was replaced with a recall replacement valve.

In addition, if the log splitter is in the crate, mark the white crate label with a **green "X"** using a green permanent marker (like a Sharpie Permanent marker). See Figure 1.

# Returning the Replaced Control Valve for Warranty:

- 45. Drain the replaced valve of hydraulic oil.
- 46. Install the port plugs, saved in Step 33 (Note:), into their corresponding ports on the replaced valve.
- 47. Place the sealed valve into the plastic bag and close the bag with the tie that came with the new replacement valve.
- 48. Place the replaced valve in the carton that the replacement valve came in along with a copy of the warranty claim. Place additional packing to secure the valve in the carton and seal the carton.
- 49. Place the RETURN SHIPPING Label provided with the new replacement valve onto the sealed carton.
- 50. You must return the replaced valve with a copy of the warranty claim to the address on the RETURN SHIPPING LABEL in order to receive warranty payment.

**Warranty:** Normal warranty terms apply: Indicate Service Advisory **MTD-105** and the appropriate part number from the list below as the original failed part on the claim.

718-0481A - Used on 8, 27 and 33 Ton Units; 718-04533 - Used on 21 Ton Units; 718-04534 - Used on 25 Ton Units

If the control valve was inspected and verified not to be an "ENERGY valve or to be GOOD when tested, inspection time allowance is 0.3 Hrs.

If the control valve was inspected, failed the test procedure and replaced, repair time allowance is 1.0 Hrs.

SERVICE MANAGER	PARTS MANAGER	SALES MANAGER	SERVICE TECH.	SERVICE TECH.