INSTRUCTION SHEET

DETHATCHER KIT
MODEL: DK-422LX
FOR USE WITH SWEEPER MODEL:
STS-422LX
LPSTS-42JD

• Assembly
• Installation
• Operation
• Repair Parts
For use with Riders and Lawn/Garden Tractors

Important: This manual contains information for the safety of persons and property. Read it carefully before assembly and operation of the equipment!

Visit us on the web! www.brinly.com

For the latest product updates & setup tips:
CONGRATULATIONS on your new Brinly-Hardy Dethatcher Kit! Your kit has been designed, engineered and manufactured to give you the best possible dependability and performance.

Should you experience any problem you can not easily remedy, please do not hesitate to contact our knowledgable customer service department toll-free at 1-877-728-8224. We have competent, well-trained technicians and the proper tools to service or repair your Sweeper and Dethatcher Kit.

Please read and retain this manual. The instructions will enable you to assemble and maintain your dethatcher properly. And please, always observe the “Safety Rules”.

CUSTOMER RESPONSIBILITIES

Read and Observe the “Safety Rules”.

Follow a regular schedule in maintaining, caring for and using your Brinly-Hardy Products.

TABLE OF CONTENTS

SAFETY RULES ...................................................2
HARDWARE .........................................................3
PARTS REFERENCE ...........................................4
PARTS LIST ..........................................................4
MAINTENANCE ....................................................4
OPERATION .........................................................4
ASSEMBLY ...........................................................5,6

RULES FOR SAFE OPERATION

• Know controls and how to stop quickly, READ THE OWNER’S MANUAL.
• Do not allow children to operate the vehicle, do not allow adults to operate without proper instruction or without having read the owner’s manual.
• Do not carry passengers. Keep children and pets a safe distance away.
• Always wear substantial footwear. Do not wear loose-fitting clothing that can get caught in moving parts.
• Keep your eyes and mind on your tractor/attachment and area being covered. Do not let other interests distract you.
• Stay alert for holes in the terrain and other hidden hazards.
• Do not drive close to creeks, ditches and public highways.
• Watch out for traffic when crossing or near roadways.
• Before you operate any feature of this attachment or towing vehicle, observe your surroundings and look for bystanders.
• When using any attachment, don’t allow anyone near the vehicle while in operation.
• Keep the vehicle and attachment in good operating condition and keep safety devices in place.
• Keep all nuts, bolts and screws tight to be sure the equipment is in safe working condition.
• The vehicle and attachment should be stopped and inspected for damage after striking a foreign object. The damage should be repaired before restarting and operating the equipment.
• See tractor equipment owner’s manual for safe operation of the equipment.

Caution!

This product is not designed for use in sand or gravel, or to carry extra weight.
Lock nuts must be used where specified. They have a nylon insert in the hole where used.
When backing - carefully back straight to avoid jackknifing, which could result in damage to equipment.

OPERATING HINTS

Remove any large objects (branches, rocks, wood, etc.) from the operation area that are too big to be picked up by Sweeper w/ Dethatcher Kit.
Mow lawn before sweeping, especially when leaves are present.
For best results, sweep only when conditions are DRY.
To dump load, carefully back up to pile and pull rope until material is clear of hamper, then drive away from pile. Release rope to return hamper.
Tools Required for Assembly:
- 1/2" wrench (2)
- Pair slip joint pliers
- Level
- Tape Measure

IMPORTANT!
This unit mounts to your STS-422 LX or LPSTS-42JD 42" Lawn Sweeper. Make sure your Sweeper Hitch Clevis Assembly is assembled as called out in its Owner's Manual (Page 7, Fig. 4&5).

IMPORTANT: To insure proper adjustment of Dethatcher Kit, the Sweeper Upper Frame Assembly must be Parallel to Ground.

With your Tractor/Riding Mower on a flat, level surface, attach the Sweeper and adjust the Lift Handle of Sweeper to position Brushes approximately 1" off ground. Using a Level, check Upper Frame Assembly for "level" FRONT TO BACK. Adjust the Hitch Clevis Assembly of Sweeper UP or DOWN to maintain "level" position of Frame. (Refer to Page 6, Fig 6 of Sweeper Manual).
### Parts List

<table>
<thead>
<tr>
<th>REF. NO.</th>
<th>PART NO.</th>
<th>DESCRIPTION</th>
<th>QTY.</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>R-2308-10</td>
<td>Tray</td>
<td>1</td>
</tr>
<tr>
<td>2</td>
<td>R-2309-01</td>
<td>Transport Link</td>
<td>1</td>
</tr>
<tr>
<td>3</td>
<td>R-2310L-10</td>
<td>Mount Bracket, L.H.</td>
<td>1</td>
</tr>
<tr>
<td>4</td>
<td>R-2310R-10</td>
<td>Mount Bracket, R.H.</td>
<td>1</td>
</tr>
<tr>
<td>5</td>
<td>R-2311</td>
<td>Safety Wire</td>
<td>2</td>
</tr>
<tr>
<td>6</td>
<td>R-2312-10</td>
<td>Lift Handle</td>
<td>1</td>
</tr>
<tr>
<td>** 7</td>
<td>R-628</td>
<td>Wire Tine</td>
<td>12</td>
</tr>
<tr>
<td>* 8</td>
<td>R-2315-10</td>
<td>Pivot Bracket</td>
<td>1</td>
</tr>
<tr>
<td>* 9</td>
<td>11M1012P</td>
<td>5/16&quot; x 3/4&quot; Carriage Bolt</td>
<td>13</td>
</tr>
<tr>
<td>* 10</td>
<td>11M1016P</td>
<td>5/16&quot; x 1&quot; Carriage Bolt</td>
<td>1</td>
</tr>
<tr>
<td>* 11</td>
<td>2M1012P</td>
<td>5/16&quot; x 3/4&quot; Hex Bolt</td>
<td>2</td>
</tr>
<tr>
<td>* 12</td>
<td>45M1111P</td>
<td>5/16&quot; Flat Washer</td>
<td>3</td>
</tr>
<tr>
<td>* 13</td>
<td>B-4786</td>
<td>5/16&quot; Nylon Lock Nut</td>
<td>16</td>
</tr>
<tr>
<td>* 14</td>
<td>B-983</td>
<td>Hairpin Cotter</td>
<td>2</td>
</tr>
<tr>
<td>* 15</td>
<td>R-1882</td>
<td>Flat Grip (5/16&quot; x 4&quot;)</td>
<td>1</td>
</tr>
<tr>
<td>* 16</td>
<td>R-618</td>
<td>Special Washer (.390 i.d.)</td>
<td>12</td>
</tr>
</tbody>
</table>

---

**MAINTENANCE**

The key to years of trouble-free service is to keep your Sweeper and Dethatcher Kit clean and dry. Never allow wet material to remain in Hamper for extended periods of time. Occasionally check all moving parts for free movement and, if necessary, lubricate with oil. Should rust develop, sand lightly and then paint area with enamel. Periodically check all fasteners for tightness.

---

**TRACTOR/RIDING MOWER SPEED**

The faster the Tractor/Riding Mower speed, the further the material is thrown into the Hamper. Operate at a speed that will throw material to the back of the Hamper. Under normal conditions, 3-4 M.P.H, or the speed of a brisk walk.

To calibrate your tractor to 3 m.p.h.:

- Measure a distance of 20 feet on a flat, level surface.
- Adjust tractor throttle and select a gear to cover this distance in 4.5 seconds
- To adjust for 4 m.p.h., cover the same measured distance in 3.4 seconds.

---

**OPERATION:**

The use of the Dethatcher-Sweeper combination will accomplish Thatch removal and Sweeping at the same time. When adjusted properly, the Dethatcher is designed to comb through your lawn-flipping out harmful Thatch and collecting it in the Hamper. Tines can be lowered to actually contact ground for more aggressive operation (such as seedbed preparation, etc.). Refer to Fig. 6. For best results, lawn should be normal height (not too high) and relatively dry prior to Dethatching.

If you prefer to operate the Sweeper only, simply move the Lift Handle to the vertical position (Tines facing to REAR).
FRONT FRAME & LIFT ASSEMBLY

1. Lay the Tray (1) upside down. The front of the Tray will have three sides (flanges) facing UP.

2. Assemble the twelve Wire Tines (7) to underside of Tray (1) as shown using 5/16" x 3/4" Carriage Bolts (9), Special Washers (16 - over “U” loops in Tines) and 5/16" Nylon Lock Nuts (13).

   NOTE: Center hole in back row of Tray (1) (fourth hole from end) is for the pivot Bracket later in Step 6.

3. With Tine Tips FORWARD and positioned PARALLEL with front flange of Tray (1), tighten all securely.

Figure 2

4. Feed and center each Safety Wire through the two rows of Wire Tines (7) (inside of coils) to opposite sides.

5. Using Pair of Pliers, bend both ends of each Safety Wire (5) as shown in Fig. 2.

   NOTE: Safety Wires connect all Wire Tines together in case one loosens or breaks. A safety wire must be installed through both rows of tines as shown.

Figure 3

6. Attach Pivot Bracket (8 - short formed leg against the tray as shown, long leg to face left side) to center hole at back of the Tray(1)

7. Secure using 5/16" x 3/4" Carriage Bolt (9) and 5/16" Lock Nut (13). Tighten securely.

8. Attach Lift Handle (6) to outside of Pivot Bracket (8) using 5/16" x 1" Carriage Bolt (10), 5/16" Flat Washer (12 - between Pivot Bracket and Lift Handle) and 5/16" Nylon Lock Nut (13). Tighten until Lift Handle is barely free to move.

9. Slide Flat Grip (14) over end of Lift Handle.

   Use Hardware Bags “A” & “B”
10. Remove the two 5/16" x 1-1/2" Hex Bolts attaching Tow Tubes and Upper Frame Assembly of Sweeper (at sides).

11. Attach the Left and Right-hand Mount Brackets (3 & 4) to inside of Tow Tubes on Sweeper using the previously Removed hardware. (FINGER TIGHTEN ONLY)

12. Notice that the formed legs on Mount Brackets (3 & 4) assemble over top of Tow Tubes and the "straight" edge is to front of Sweeper (lower group of adjusting holes FORWARD).

13. Position the previously assembled Dethatcher inside Tow Tubes with Dethatcher Tine Tips facing FORWARD.

14. Notice the series of adjusting holes on the Right and Left-hand Mount Brackets (3 & 4). Measuring from Ground UP, locate the holes at each side that are approximately 6-1/2" (this page has a large arrow with a 6-1/2" mark for your convenience).

15. Position the Dethatcher Tray (1) so the holes at sides line up with the selection made in step 14.

16. Attach at these holes using two 5/16" x 3/4" Hex Bolts (11), 5/16" Flat Washers (12 - between the Tray and Mount Brackets) and 5/16" Lock Nuts (13). Tighten both sides until Dethatcher Tray is barely free to pivot (TIGHTEN FASTENERS FROM STEP 10).

17. Connect Transport Link (2) to front hole in Sweeper Hitch Clevis Assembly (directly above or below Tow Tubes as shown) and secure with small Hairpin Cotter (14).

18. Raise Lift Handle (6) to vertical position and attach opposite end of Transport Link (2) into CENTER adjusting hole in Lift Handle (6). Secure with other Hairpin Cotter (14).

DETHATCHER TINE TIP ADJUSTMENT

IMPORTANT: Sweeper must be connected to Tractor Riding Equipment and Brush Height adjusted to approximately 1" off ground.

Lift Handle in Vertical Position when attaching Transport Link.

For Step 14

Please be sure you have read the note on page 3 before continuing.