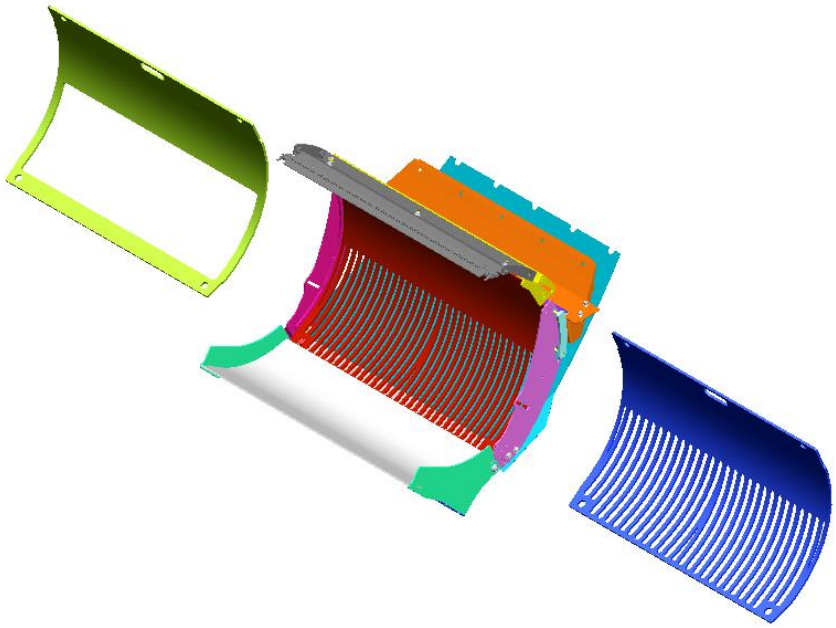
RECUTTER SCREEN BUNDLE

FOR JOHN DEERE 8000-SERIES
SELF-PROPELLED FORAGE HARVESTERS

Operator Manual

Includes installation, operating, adjustment, maintenance, technical, repair parts, and safety instructions for the Recutter Screen Bundle.



Please retain this document for future reference. Keep this manual available for reference to the operator at all times.

RCI Engineering LLC
RC180080 Rev B 9Oct18
www.RCIengineering.com

RCI New Agricultural Attachments and Implements
Warranty Statement

RCI Engineering LLC, hereinafter referred to as RCI, warrants new RCI attachments and implements, to the Original Retail Purchaser to be free from defects in material and workmanship for a period of one (1) year from the date of sale.

RCI warranty includes:

Genuine RCI parts costs and labor required to repair or replace equipment at the selling dealer's business location.

RCI MAKES NO REPRESENTATIONS OR WARRANTIES OF ANY KIND, EXPRESSED OR IMPLIED (INCLUDING THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR PARTICULAR PURPOSE), EXCEPT AS EXPRESSLY STATED IN THIS WARRANTY STATEMENT.

RCI WARRANTY DOES NOT INCLUDE:

1. Transportation to the selling dealer's business location or, at the option of the Original Retail Purchaser, the cost of a service call.
2. Freight costs above standard shipping costs for the replacement parts.
3. Used equipment.
4. Components covered by their own non-RCI warranties, such as tires and trade accessories.
5. Normal maintenance service and expendable, high-wear items.
6. Sacrificial components designed to fail to prevent damage to other components when obstructions are encountered (i.e. shear bolts, pickup teeth)
7. Repairs or adjustments caused by: improper use; non-intended use; failure to follow recommended maintenance procedures; use of unauthorized attachments; accident or other casualty.
8. Liability for incidental or consequential damages of any type, including, but not limited to lost profits or expenses of acquiring replacement equipment or damage to machines to which the attachment is installed.

No agent, employee, or representative of RCI has any authority to bind RCI to any warranty except as specifically set forth herein. Any of these limitations excluded by local law shall be deemed deleted from this warranty; all other terms will continue to apply.

Marketing Bulletin - RCI Recutter Screen for 8000-Series SPFH 27 February 2018

A Recutter Screen is now available for the John Deere 8000-Series Self-Propelled Forage Harvesters from RCI Engineering.

Intended Use:
The RCI Recutter Screen is designed to allow for material resizing of earlage/snaplage and other forages, specifically for the 8000 Series SPFH. This product is the only approved recutter screen bundle for the 8000 Series SPFH and does not impact the warranty of the base machine.

Product Highlights:

- Three standard screen sizes are available as follows.
  - 13 mm Screen
  - 19 mm Screen
  - Blank Screen
- This product was designed with direct input from John Deere Engineering to ensure a quality fit of components for precise operation compared to other after-market screens.
- A blank recutter screen is available for changing between crops as needed. See the *Service* Section of the Operator Manual for more information. Once installed, the recutter screen can be removed without removing the cutterhead from the machine.

Ordering Information:

Part Number	Description	Comments
RC180045	Bundle, Wide-Body Recutter Screen Base	* 8600-8800 SPFH
RC180048	Bundle, Standard-Body Recutter Screen Base	* 8100-8500 SPFH
RC180084	Screen, 13mm Wide-Body Recutter	8600-8800 SPFH
RC180085	Screen, 19mm Wide-Body Recutter	8600-8800 SPFH
RC180082	Screen, Blank Wide-Body Recutter	8600-8800 SPFH
RC180101	Screen, 13mm Standard-Body Recutter	8100-8500 SPFH
RC180102	Screen, 19mm Standard-Body Recutter	8100-8500 SPFH
RC180083	Screen, Blank Standard-Body Recutter	8100-8500 SPFH

* When ordering for a machine, select the appropriate bundle and desired screen size.
The rear seal of the chute is reused from the original chute.

Setup Time:
Approximately 6 hours of setup time is required for initial installation. All times are estimations and dependent on technician experience and machine condition. Setup times are subject to change based on feedback from dealers. Please contact RCI after installation with feedback sheet provided at the back of the Operator Manual.

Approximately 2 hours of technician time is required to change out the recutter screen for a blank screen. Approximately 3 hours of technician time is required to change out the recutter screen for original parts. The cutterhead does not need to be removed to revert back to original components. See the *Service* Section of the Recutter Screen Operator Manual for more information.

RCI Engineering also offers an assortment of attachments for John Deere hay and forage equipment to improve performance, increase efficiency and to increase machine capabilities in different crop and field conditions.

RCI Engineering reserves the right to make improvements in design and changes in specifications at any time without notice and without incurring any obligation to install them on units previously manufactured or sold. Specifications, descriptions, and illustrative material herein are as accurate as known at time of publication but are subject to change without notice.

All parts, service and warranty matters are handled by RCI Engineering LLC. Warranty for this product is 1 year of parts and labor as outlined in the RCI Engineering Warranty Statement.

Visit *www.RCIengineering.com* for more product information, ordering, and pictures of this product.

RCI Engineering LLC
208 River Knoll Drive
Mayville, WI 53050
info@rciengineering.com

P: 920-387-9804
P: 888-472-4552 (Toll Free)
F: 920-387-9806
www.rciengineering.com

Table of Contents

Pre-delivery Checklist (Copy for Return to RCI at back of this manual)

After the unit has been assembled and lubricated and prior to delivery to customer, the bundle needs to be inspected thoroughly to ensure it is in proper working order. The following checklist must be reviewed, and each item found to be satisfactorily completed.

- ☐ Bundle has been setup according to the instructions included in this manual.
- ☐ All guards, shields and safety decals are in place, securely fastened, and operate correctly.
- ☐ All nuts and bolts have been tightened and inspected.
- ☐ Adjustments have been made as described in the Adjustments section of this manual.
- ☐ All moving parts operate freely.
- ☐ All applicable warranty information recorded.

I acknowledge that the pre-delivery service was performed and the unit is ready for delivery to the customer.

_____	_____	_____
Dealership's Name	Representative	Date
_____	_____	_____
Model Number	Serial Number	Date Sold

Owner's Name and Address

Name_____

Address_____

City, State, Zip _____

Original: Enclose in manual and give to customer at time of delivery.
Copy: Dealership
Copy: RCI Engineering LLC

RCI Engineering LLC
Fax: 920-387-9804
Email: info@rciengineering.com
Mail: 208 River Knoll Drive, Mayville, WI 53050

Delivery Checklist (Copy for Return to RCI at back of this manual)

The following items must be performed when delivering the attachment to the customer. Check off each item as it is performed.

- ☐ Provide the customer with the Operator Manual and instruct them to read prior to operating the unit.
- ☐ Review and explain all safety information and operating adjustments.
- ☐ Show how to properly adjust the recutter screen as instructed in the *Adjustments* section.
- ☐ Make it be known that if the customer can visit or call the dealership to discuss any questions or problems they may encounter.
- ☐ Complete the Owner Registration with the customer, ensure it is completely filled out, and return it to RCI Engineering.

_____
Date Delivered

_____
Signature

Original: Enclose in manual and give to customer at time of delivery.
Copy: Dealership
Copy: RCI Engineering LLC

RCI Engineering LLC
Fax: 920-387-9804
Email: info@rciengineering.com
Mail: 208 River Knoll Drive, Mayville, WI 53050

Safe Operation of Machine

Operator Authorization

The machine owner *must* provide the operator of the machine this manual and ensure that the operator reads and understands the contents. This *must* be performed before the machine is put into operation.

Safety Alert Symbol

This safety alert symbol is used to alert the operator to the potential for personal injury. Whenever this symbol is noticed in this manual or on the machine, be alert to the situation and read the message near the symbol shown in graphical format. Always be alert for the potential for personal injury.

General Safety Precautions / Accident Prevention

Before operation of the machine each time, check the entire machine for operational safety.

1. BEFORE unclogging, removing material, cleaning, adjusting, servicing, or lubricating, the operator **must**:
    a. Disengage harvester, put the machine in park, shut off the engine, and remove the key from the ignition.
    b. Wait until all parts have stopped moving.
2. The warning and safety decals on the attachment provide important information to ensure safe operation of the machine. Follow these instructions at all times to remain safe. Replace all such decals if they should become illegible or be missing.
3. Avoid loose fitting clothing while operating this implement. The operator should always wear close-fitting clothing and sturdy footwear.
4. Before operation of the machine with this bundle installed, become familiar with all controls of the prime mover and understand the function of this bundle.
5. Check all guards and shields to make sure they are in place and functional. Replace any defective or missing guards, shields, or components before operation.
6. Keep clear of the working and danger area of the machine.
7. Use proper personal protection for eyes, ears, and head to protect against projected objects and noise.
8. Do not modify the machine. Unauthorized modifications may affect the safety and longevity of the machine and voids warranty.
9. Consult Operator Manual for the header and forage harvester for additional safety items.

Installation

Cutterhead and Feed Roll Assembly
Refer to the 8000-Series SPFH Repair manual for the procedure to remove the Cutterhead and Feed Roll Assembly.

Right- or left-hand parts are determined by sitting in the operator seat facing forward.

Install Parts at Cutterhead
Remove the spiral band and rear sheet of the cutterhead assembly.

See Figures 1 and 2.

Retain all hardware. Clean area of any trash or material accumulation.

Install new spiral band using existing M12 bolts. The bottom pivot frame of the screen is pre-assembled to the new spiral band.

See Figure 3.

Reinstall the shims beneath the spiral band. Shim the spiral band to set the clearance between the knives and the band to specification.

Specification
Clearance between spiral band and knife edge.

0.060” +/- .040”
(1.5mm +/- 1mm)

Note
Shims are available through the John Deere parts system as needed.

Deere Part Number	*Thickness*
HXE70820	*5mm*
HXE78021	*1mm*

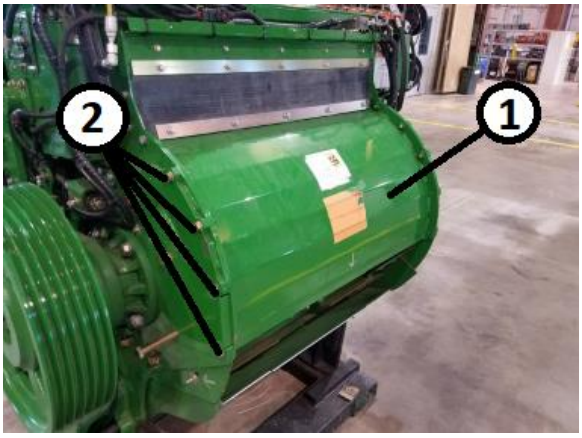


Figure 1. Rear Sheet Removal
Key 1 – Sheet Key 2 – Hardware

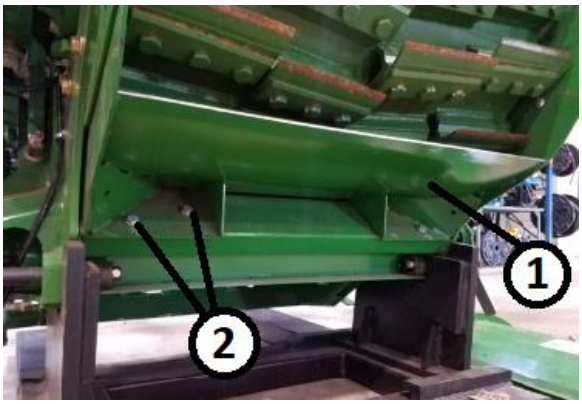


Figure 2. Spiral Band Removal
Key 1 – Spiral Band Key 2 - Hardware

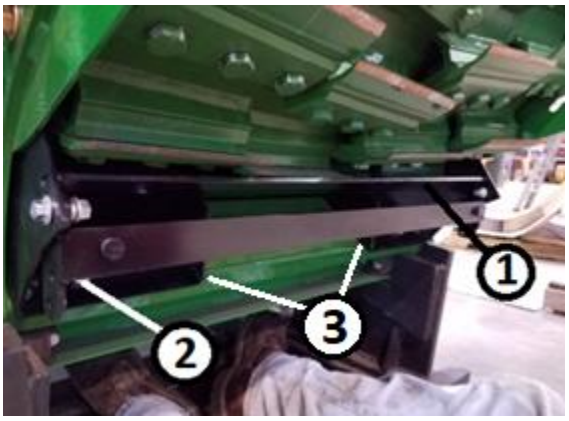


Figure 3. New Spiral Band Installation
Key 1 – Spiral Band Key 2 – Hardware
Key 3 – Shim Location

Install upper assembly using existing bolts.

Only install top bolts and tighten by hand such that the assembly can pivot for assembly.

See Figure 4.

Figure 4. Upper Assembly Installation
Key 1 – Upper Assembly
Key 2 – Hardware Locations

Install guide sheets with existing M8 carriage bolts and provided hardware at each side of the cutterhead frame.

Install at pivot bushing to the spiral band.

Tighten hardware finger-tight.

See Figure 5.

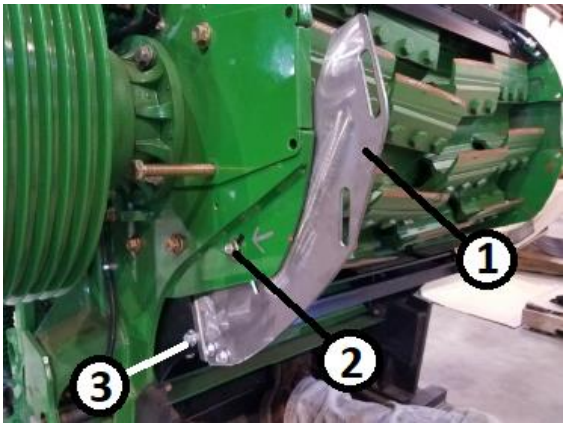


Figure 5. Side Sheet Installation
(LH side shown)
Key 1 – Side Sheet
Key 2 – M8 Carriage Bolt Location
Key 3 – Pivot Bushing

Install recutter screen at the bottom hook pins. The slots of the screen should be oriented towards the bottom of the cutterhead.

Check to make sure the screen is properly located in the screen holes.

See Figure 6.

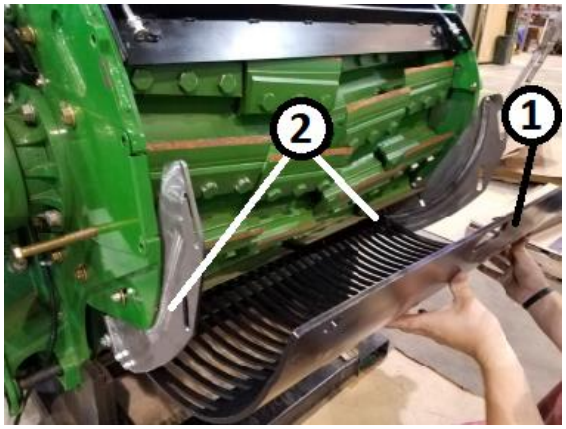


Figure 6. Screen Installation
Key 1 – Screen Key 2 - Holes

Pivot the screen on the bottom frame towards the top.

Lift upper assembly such that the screen passes under the upper assembly.

Loosen the draw bolts completely on the upper frame. Slide the upper frame down to the limit of the three slots at the top.

Align the pins of the upper assembly with the upper holes in the recutter screen. See Figure 7.

Install remaining hardware on upper assembly at each side. Reuse existing hardware. It may be necessary to draw the screen up with the draw bolts to align the lower holes of the upper assembly. Tighten hardware finger tight. See Figure 8.

Carefully rotate cutterhead by hand in reverse to ensure that no components are contacting the cutting knives or other components.

Correct any contact that may occur.

Install bolts at side supports and tighten the hardware finger-tight.

The zinc plates with threaded holes are oriented such that the threads are at the outside of the cutterhead frame.

The zinc-plated plates with countersink are oriented on the inside of the frame with the countersink oriented to the center of the machine to provide clearance for the heads of the bolts.

See Figure 9.

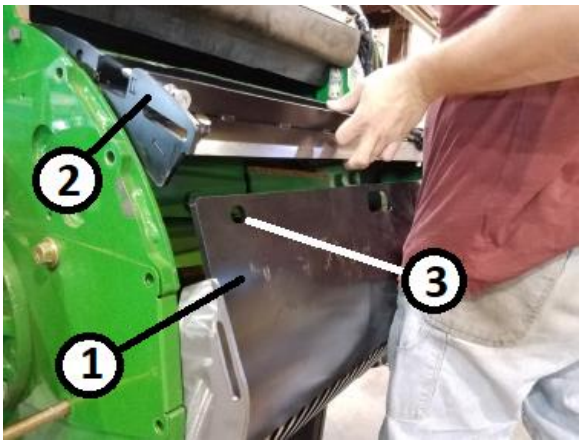


Figure 7. Screen Installation
Key 1 – Screen
Key 2 – Upper Assembly
Key 3 – Alignment Hole

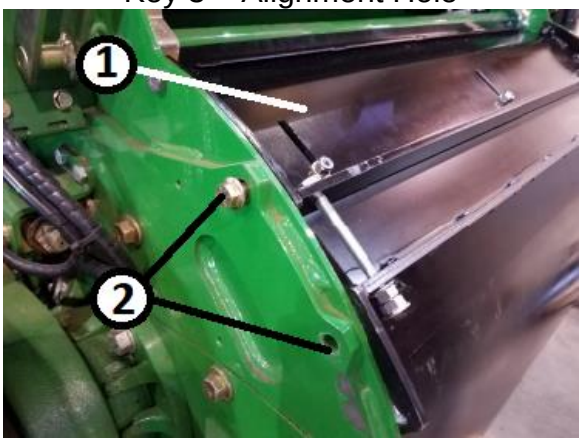


Figure 8. Upper Assembly Installation
Key 1 – Upper Assembly
Key 2 – Hardware Location

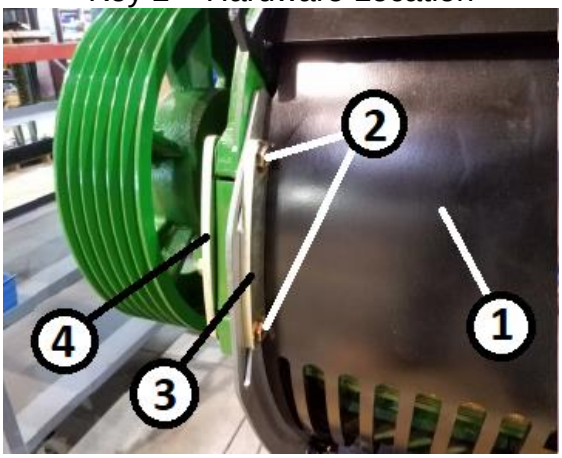


Figure 9. Side Hardware Installation
Key 1 – Screen Key 2 – Hardware
Key 3 – Countersunk Zinc Plates
Key 4 – Tapped Zinc Plates.

Tension Screen

With the hardware only finger-tight, adjust the draw bolts of the upper assembly to draw the recutter screen to Specification. Loosen the jam nut to perform the adjustment. Adjust both sides evenly and verify the measurement across the screen.

See Figures 10 and 11.

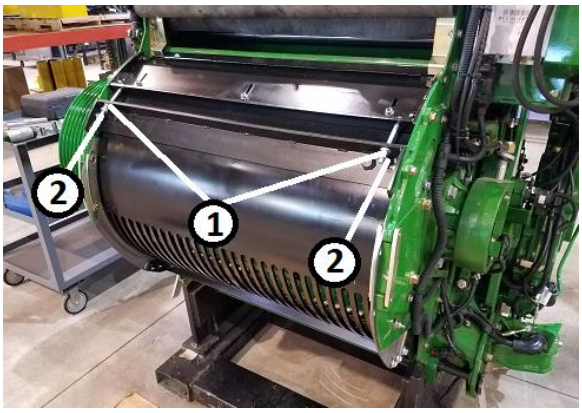


Figure 10. Screen Tension
Key 1 – Draw Bolts
Key 2 – Jam Nuts

Specification

Recutter screen gap at top of slot

0.080” to 0.160” gap
(2.0 to 3.0 mm gap)

Measure as indicated in Figure 11.

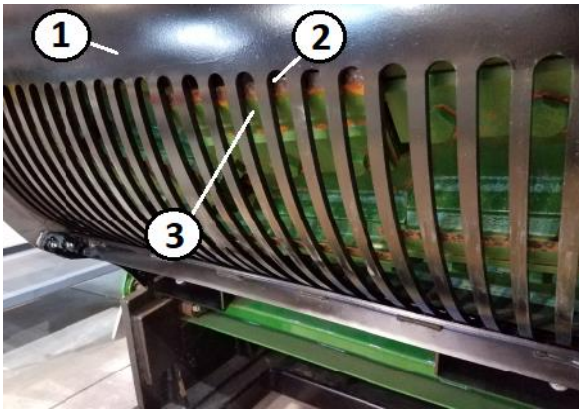


Figure 11. Screen Gap Setting
Key 1 – Screen Key 2 – Measurement
Key 3 - Knife

Once the screen is properly adjusted, tighten the three nuts at the carriage bolts on the upper frame.

See Figure 12.

Carefully rotate cutterhead by hand in reverse to ensure that no components are contacting the cutting knives or other components.

Correct any contact that may occur.

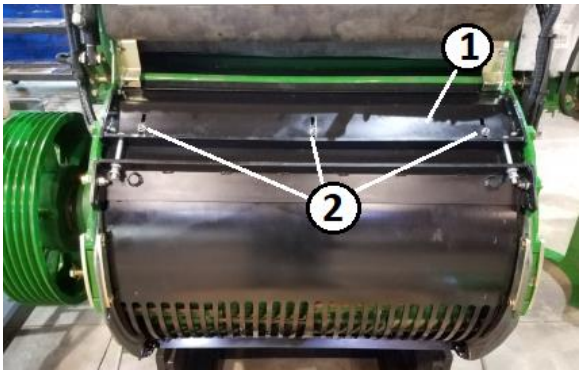


Figure 12. Carriage Bolt Locations
Key 1 – Upper Frame
Key 2 – Carriage bolts

With the screen properly tensioned, use a punch at the side of the screen guide to pull the screen guide away from the cutterhead at each side. This is to seat the support on the screen.

See Figure 13.

Tighten all hardware at the sides of the screen supports and guides. Tighten the lower carriage bolt on the guide. See Figure 13. Repeat process on opposite side.

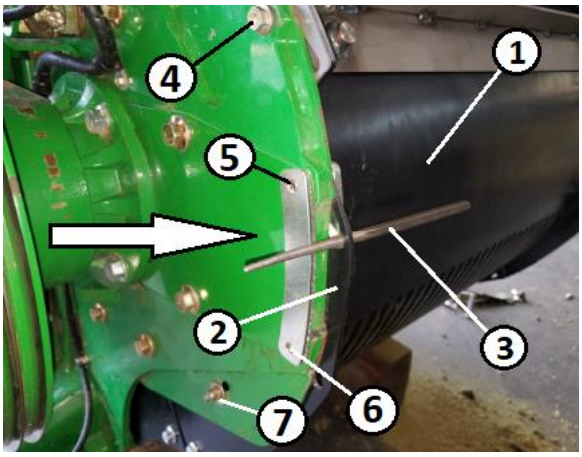


Figure 13. Screen Guide
Key 1 – Screen Key 2 – Guide
Key 3 – Punch (ref) Key 4 – Upper Bolt
Key 5 – Screen Guide Upper Bolt
Key 6 – Screen Guide Lower Bolt
Key 7 – Lower Carriage Bolt

Install Chute

At the base machine, remove the chute in front of the Blower or KP. Remove two side bolts to remove the chute. See Figure 14.

IMPORTANT

The new chute can remain in the machine when the recutter screen is removed. The major difference between the new chute and the original is the addition of the lower scraper. When removing the recutter screen completely, remove the lower scraper and reset the upper seal.

Remove the rear seal from the original chute and install at the rear of the new chute.

See Figure 15.

Install new chute in place of the original chute in the same manner as the original was removed. Tighten all hardware properly.

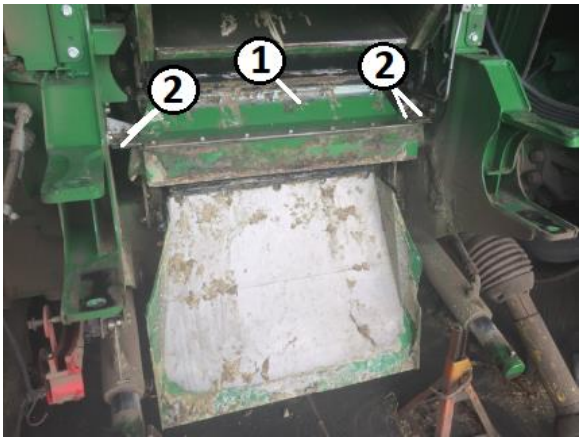


Figure 14. Chute Removal
Key 1 – Chute Key 2 – Hardware

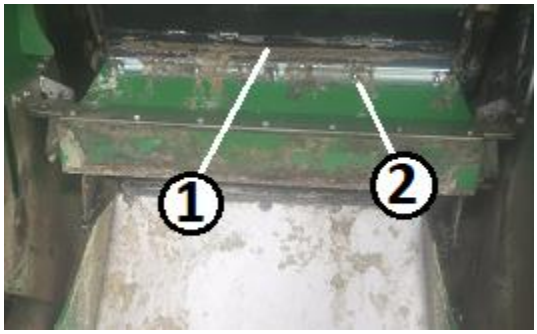


Figure 15. Seal Removal
Key 1 – Seal Key 2 – Hardware (qty 5)

Lower Pan Wear Plate Installation
Remove the lower pan from the machine.

Remove the original wear plate from the lower pan.

Install the new wear plate reusing the original hardware.

See Figure 16.

Reinstall the lower pan on the machine.

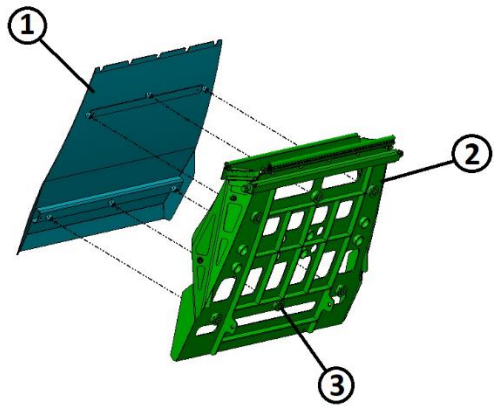


Figure 16. Lower Pan Wear Plate
Key 1 – New Wear Plate
Key 2 – Lower Pan Frame
Key 3 – Hardware Locations (qty 6)

Cutterhead and Feed Roll Assembly
Refer to the 8000-Series SPFH Repair manual for the procedure to install the Cutterhead and Feed Roll Assembly.

Adjust Upper Seal
With the cutterhead assembly installed on the machine, adjust the rear seal to close the gap to the recutter screen.

Loosen the bolts at the seal and move the seal to close the gap at the screen.

See Figure 17.

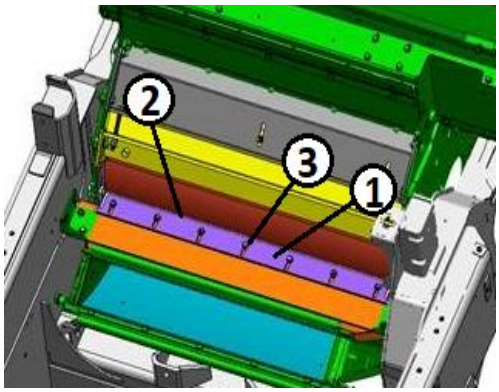


Figure 17. Upper Seal
Key 1 – Plate Key 2 – Seal
Key 3 – Bolts (qty 7)

Adjust Lower Scraper
With the lower pan open, access the scraper location at the bottom of the chute.

Adjust the scraper to be within 1.0 mm of the screen. Do not adjust the scraper tight to the screen.

Tighten hardware properly.

See Figure 18.

Close the lower pan.

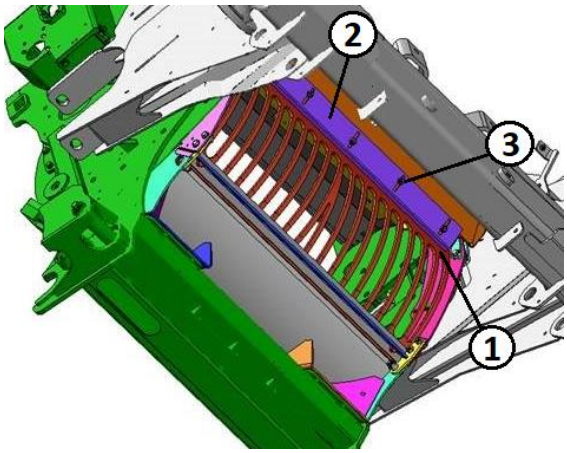


Figure 18. Lower Scraper
Key 1 – Screen Key 2 – Scraper
Key 3 – Hardware (qty 5)

Adjustments

Adjust Screen Tension

Lower header to the ground. Shut off the engine and remove the key. Wait for all rotating components to stop. See 8000-Series SPFH Operator Manual for more safety information.

Loosen the nuts on the carriage bolts at the center of the top of the upper frame.

Loosen the side bolts of the upper frame on both sides.

Loosen the side bolts at the recutter screen guide at each side.

Loosen the nuts on the lower carriage bolts at each side.

See Figure 19.

With the hardware only finger-tight, adjust the draw bolts of the upper assembly to draw the recutter screen to Specification. Loosen the jam nut to perform the adjustment. Adjust both sides evenly and verify the measurement across the screen.

See Figures 20 and 21.

Specification

Recutter screen gap at top of slot

0.080” to 0.160” gap
(2.0 to 3.0 mm gap)

Measure as indicated in Figure 21.

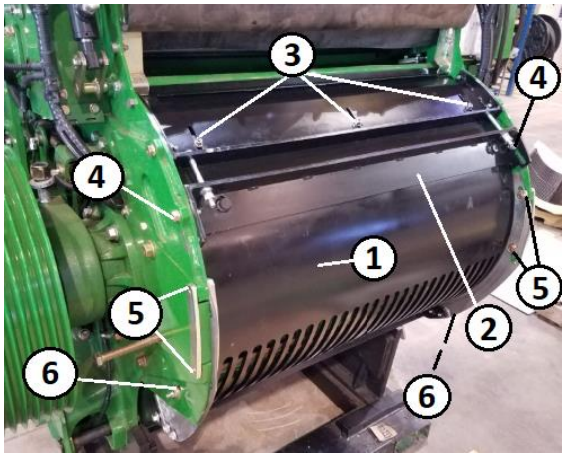


Figure 19. Screen Hardware
Key 1 – Screen Key 2 – Upper Frame
Key 3 – Upper Frame Carriage Bolts
Key 4 – Upper Frame Side Bolts
Key 5 – Screen Guide Bolts
Key 6 – Lower Carriage Bolts

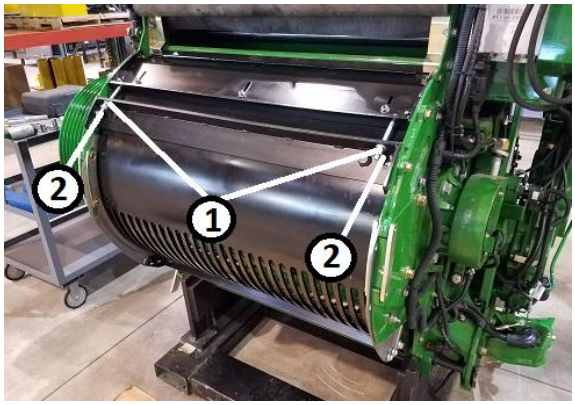


Figure 20. Screen Tension
Key 1 – Draw Bolts
Key 2 – Jam Nuts

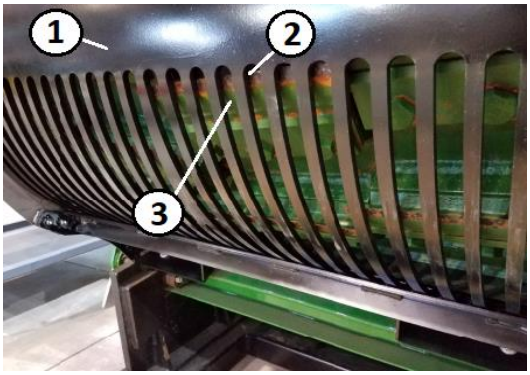


Figure 21. Screen Gap Setting
Key 1 – Screen Key 2 – Measurement
Key 3 - Knife

Once the screen is properly adjusted, tighten the three nuts at the carriage bolts on the upper frame.

See Figure 22.

Carefully rotate cutterhead by hand in reverse to ensure that no components are contacting the cutting knives or other components.

Correct any contact that may occur.

With the screen properly tensioned, use a punch at the side of the screen guide to pull the screen guide away from the cutterhead at each side. This is to seat the support on the screen. If adjusting the screen closer to the knives after use, this step may be omitted as long as the guides remain in contact with the screen at the inside face during adjustment.

See Figure 23.

Tighten all hardware at the sides of the screen supports and guides. Tighten the lower carriage bolt on the guide.

See Figure 23.

Repeat process on opposite side.

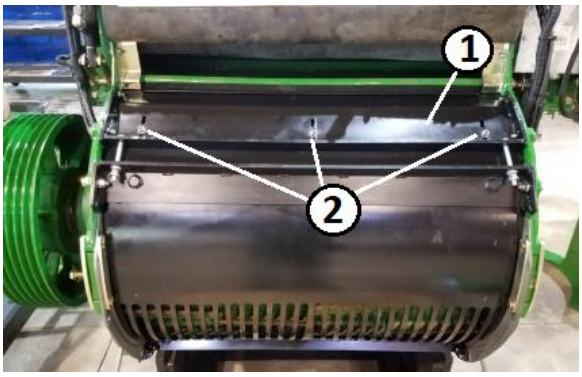


Figure 22. Carriage Bolt Locations
Key 1 – Upper Frame
Key 2 – Carriage bolts

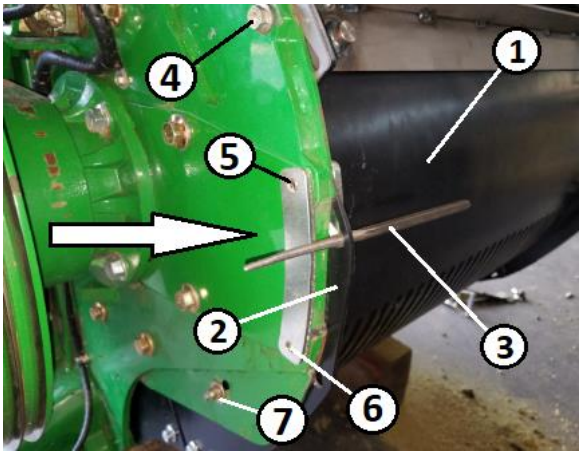


Figure 23. Screen Guide
Key 1 – Screen Key 2 – Guide
Key 3 – Punch (ref) Key 4 – Upper Bolt
Key 5 – Screen Guide Upper Bolt
Key 6 – Screen Guide Lower Bolt
Key 7 – Lower Carriage Bolt

Service
Recutter Screen Removal For Quick-Change

This process is to be used to change the recutter screen after use in the field. A screen “blank” can be used for quick change, or the original parts can be reinstalled. If installing the original parts, see notes regarding hardware at the end of this section.

To remove the recutter screen and install a blank screen, first remove the header from the machine. Refer to the Operator Manual for the Base Machine and Header for more information.

Lower the feed rolls and cutterhead assembly to the lowest position to maximize clearance between the bottom of the cab and the knife sharpener system. Turn off the engine, remove the key, and lock out the machine. Use jack stands to support the cutterhead and feedroll assembly.

Lower the bottom pan as indicated in Figure 24.

Retract the KP or grass chute for more clearance in the next steps. See Operator Manual for the SPFH for more information.

Remove lower scraper of upper pan. See Figure 25.

Reset upper seal to fully retracted position. See Figure 26.

Figure 24. Bottom Pan Lowered
(CH Removed for clarity)
Key 1 – Pan

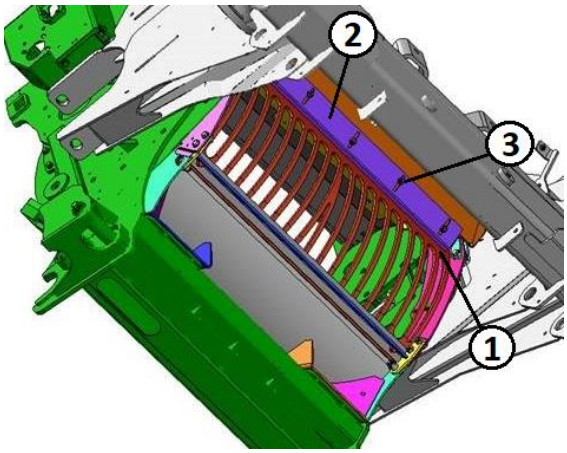


Figure 25 – Lower Scraper
Key 1 – Clearance
Key 2 – Scraper Key 3 - Hardware

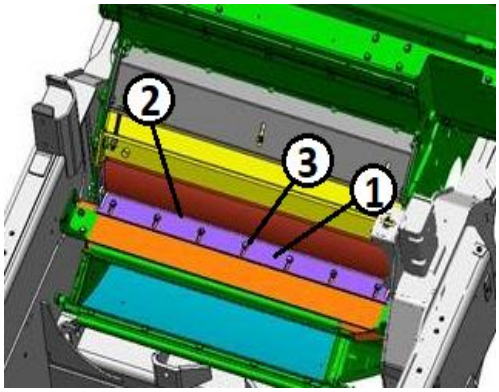


Figure 26. Upper Seal
Key 1 – Plate Key 2 – Seal
Key 3 – Bolts (qty 7)

Remove four bolts retaining the upper pan.

Rotate pan from position and remove from the machine through the bottom.

See Figure 27.

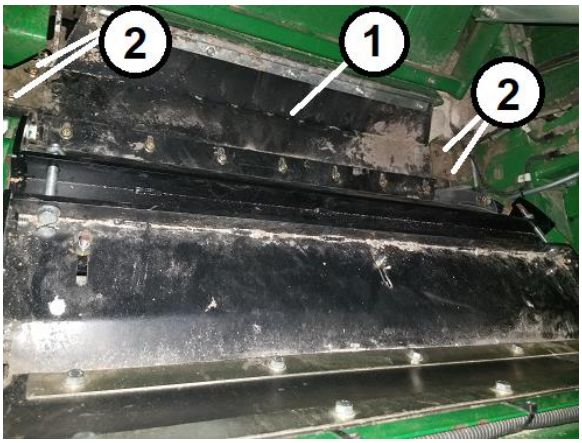


Figure 27. Upper Pan Removal
Key 1 – Upper Pan
Key 2 – Bolts (qty 4)

Release screen tension. Loosen draw bolts at top of screen at top frame. See Figure 28.

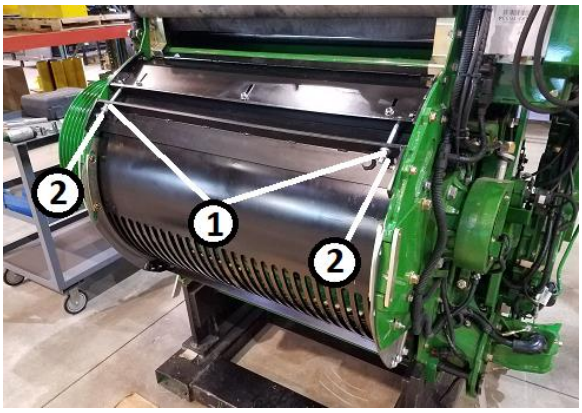


Figure 28. Screen Tension
Key 1 – Draw Bolts
Key 2 – Jam Nuts

Loosen three lock nuts at the center of the top frame such that the frame can slide back and forth. See Figure 29.

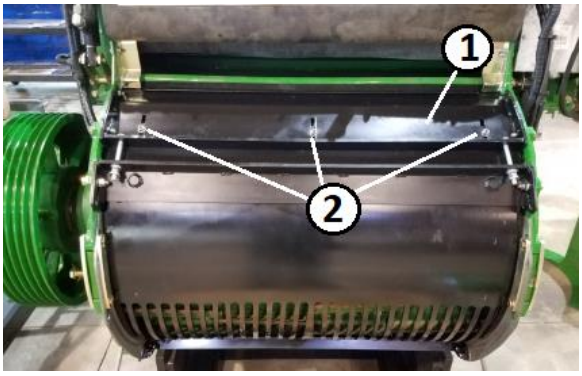


Figure 29. Carriage Bolt Locations
Key 1 – Upper Frame
Key 2 – Carriage bolts

Remove all but the two top bolts of the upper frame of the recutter screen.

Loosen the top two bolts.

This will enable the upper frame assembly to pivot in the cutterhead frame.

See Figure 30.

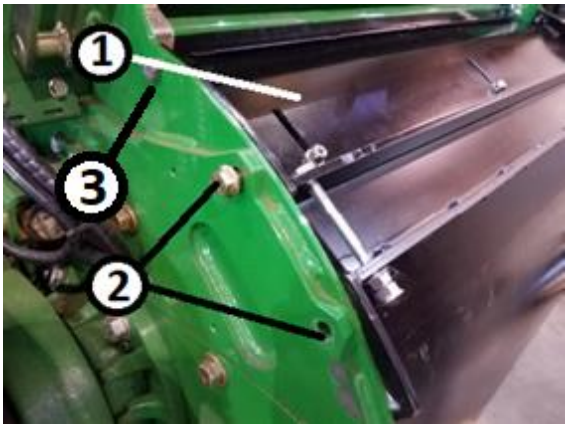


Figure 30. Upper Assembly Installation
Key 1 – Upper Assembly
Key 2 – Hardware Location for Removal
Key 3 – Loosen Bolts Only

With the help of an assistant, lift the upper frame slightly to release the recutter screen.

Using a punch or ratchet strap, retain the upper frame in a raised position.

IMPORTANT
Take care in retaining the frame properly. Failure to do so may result in personal injury.

See Figure 31.

Figure 31. Screen Removal
Key 1 – Screen
Key 2 – Upper Assembly
Key 3 – Alignment Hole

Remove bottom pivot frame (6 bolts) and loosen the carriage bolts on the side plates. Each side has one carriage bolt.

See Figure 32.

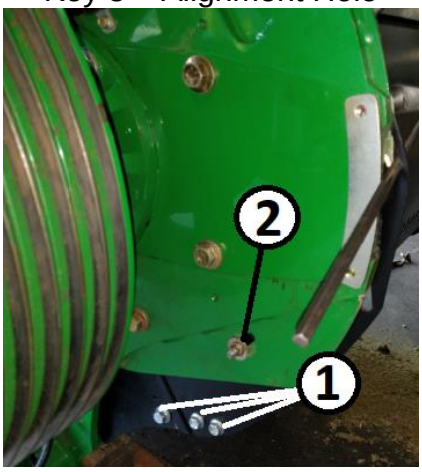


Figure 32. Lower Hardware
Key 1 – Pivot Frame Bolts
Key 2 – Carriage Bolt

Remove side bolts at both sides of the recutter screen supports. Take care to support the screen during this process. Once the zinc plates are removed, the screen will be loose and can be removed.

See Figure 33.

Optional

If it is desired to reinstall the original John Deere parts in the machine, remove the spiral band and lower frame of the recutter screen. If installing a blank screen, proceed to the next page.

See Figure 34.

IMPORTANT
Follow procedures in the John Deere Repair manual for proper spiral band installation and clearance setting.

At this point in the process, the original John Deere parts can be installed in the machine.

One modification will be needed for the top frame of the John Deere parts.

The only modification that should be needed is the removal of two weld nuts at the side of the original top cover of the cutterhead. Depending on vintage of part, tapped holes might be used. In the event tapped holes are used, drill out the threaded holes to fit the bolts used.

This is due to insufficient clearance at the side frame to install the original bolts.

If clearance is not provided for the bolt, remove two weld nuts and then use the threaded, zinc-plated plates and bolts from the RCI bundle to fasten the top cover at the side location. See Figure 35.

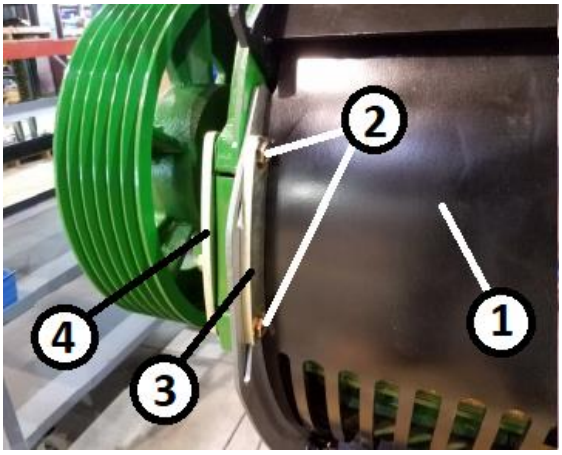


Figure 33. Side Hardware Installation
Key 1 – Screen Key 2 – Hardware
Key 3 – Countersunk Zinc Plates
Key 4 – Tapped Zinc Plates

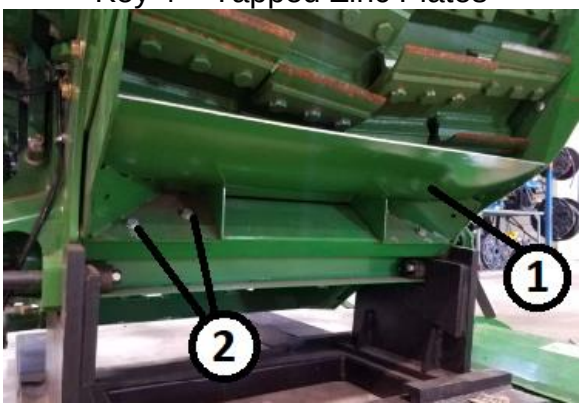


Figure 34. Spiral Band Hardware
Key 1 – Spiral Band Key 2 - Hardware

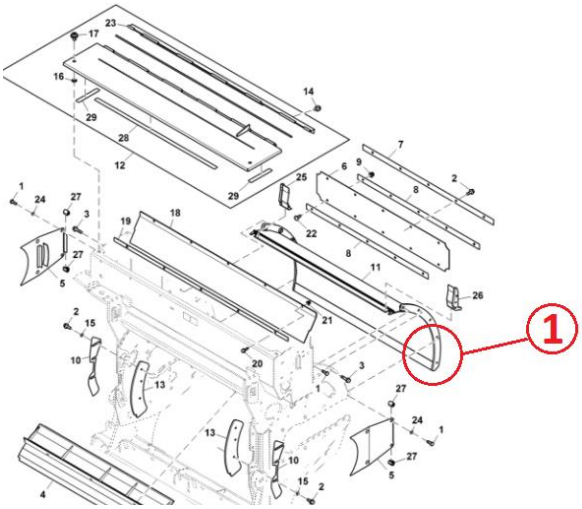


Figure 35. Weld Nut or Tapped Hole Removal
Key 1 – Lower Two Holes Each Side

Installing Blank Screen

To install a screen blank, replace the removed screen with the blank screen from RCI.

With the help of an assistant, hold the screen in place and reinstall the bottom pivot frame. The slots of the screen should be oriented towards the bottom of the cutterhead.

Check to make sure the screen is properly located in the screen holes.

See Figure 36.

Pivot the blank screen on the bottom frame towards the top.

Lift upper assembly such that the screen passes under the upper assembly.

Loosen the draw bolts completely on the upper frame. Slide the upper frame down to the limit of the three slots at the top.

Align the pins of the upper assembly with the upper holes in the recutter screen. See Figure 37.

Install remaining hardware on upper assembly at each side. Reuse existing hardware. The top four bolts that retain the top weldment can be tightened in this step.

Once the upper hardware is tightened, it may be necessary to draw the screen up with the draw bolts to align the lower holes of the upper assembly. Tighten hardware finger tight. See Figure 38.

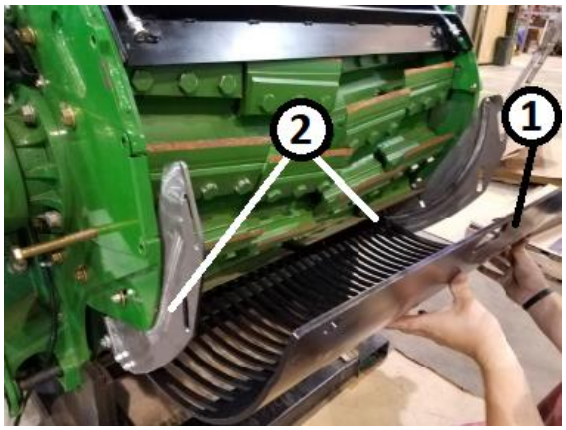


Figure 36. Screen Installation
Key 1 – Screen Key 2 - Holes

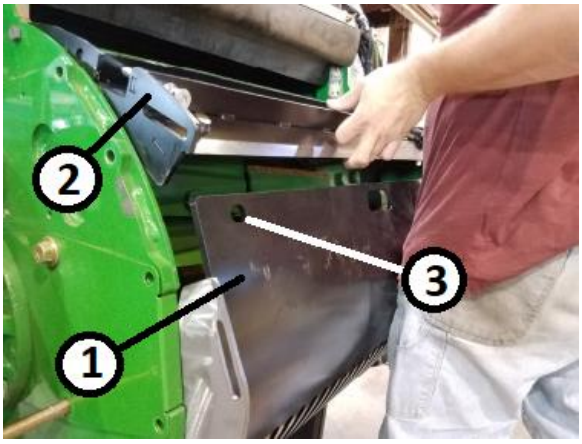


Figure 37. Screen Installation
Key 1 – Screen
Key 2 – Upper Assembly
Key 3 – Alignment Hole

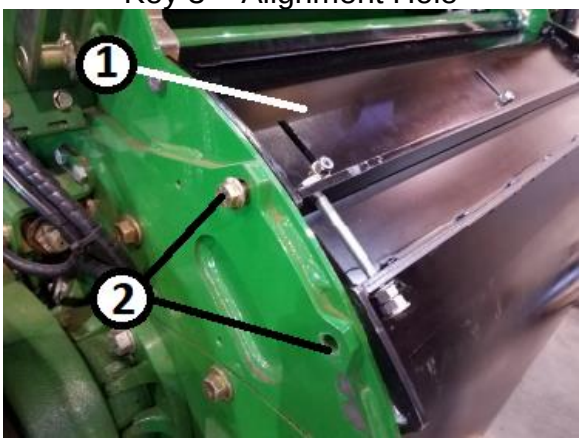


Figure 38. Upper Assembly Installation
Key 1 – Upper Assembly
Key 2 – Hardware Location

Install bolts at side supports and tighten the hardware finger-tight.

The zinc plates with threaded holes are oriented such that the threads are at the outside of the cutterhead frame.

The zinc-plated plates with countersink are oriented on the inside of the frame with the countersink oriented to the center of the machine to provide clearance for the heads of the bolts.

Carefully rotate cutterhead by hand in reverse to ensure that no components are contacting the cutting knives or other components.

Correct any contact that may occur. Failure to do so may result in machine damage.

See Figure 39.

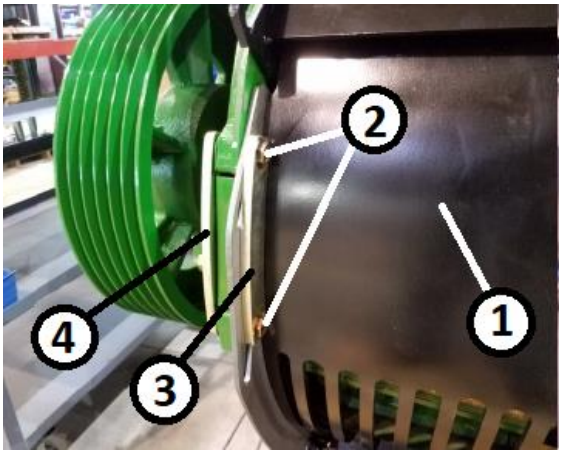


Figure 39. Side Hardware Installation
Key 1 – Screen Key 2 – Hardware
Key 3 – Countersunk Zinc Plates
Key 4 – Tapped Zinc Plates

Tension Blank Screen

With the hardware only finger-tight, adjust the draw bolts of the upper assembly to draw the recutter screen to Specification. Loosen the jam nut to perform the adjustment. Adjust both sides evenly and verify the measurement across the screen.

See Figures 40 and 41.

Specification

Recutter screen gap at top of slot

0.080” to 0.160” gap
(2.0 to 3.0 mm gap)

Measure as indicated in Figure 41.

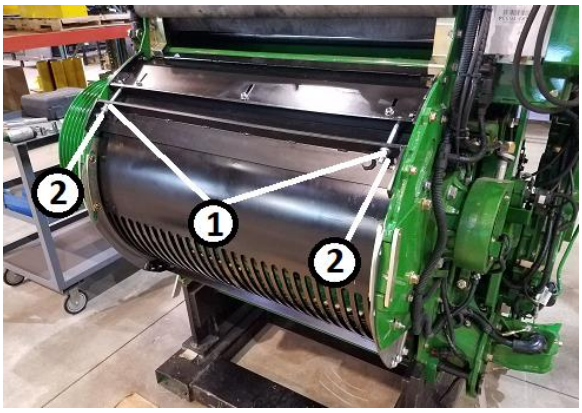


Figure 40. Screen Tension
Key 1 – Draw Bolts
Key 2 – Jam Nuts

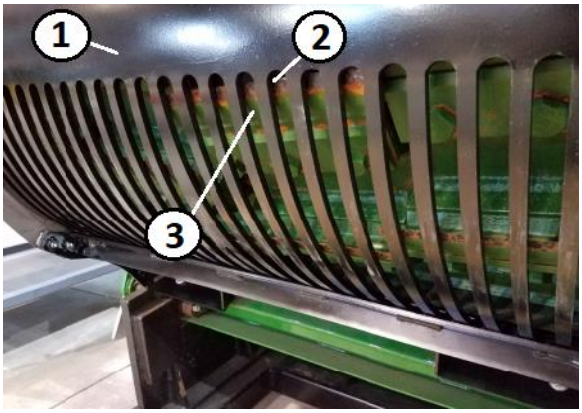


Figure 41. Screen Gap Setting
Key 1 – Screen Key 2 – Measurement
Key 3 - Knife

Once the screen is properly adjusted, tighten the three nuts at the carriage bolts on the upper frame.

See Figure 42.

Carefully rotate cutterhead by hand in reverse to ensure that no components are contacting the cutting knives or other components.

Correct any contact that may occur.

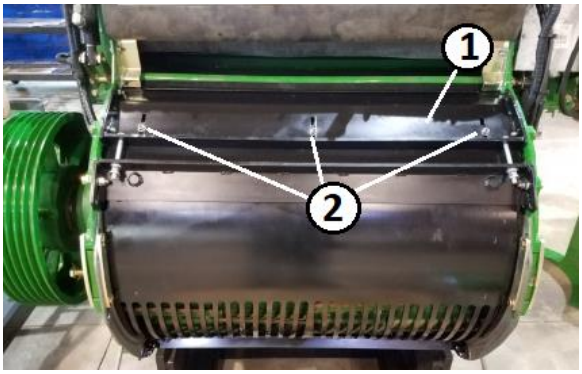


Figure 42. Carriage Bolt Locations
Key 1 – Upper Frame
Key 2 – Carriage bolts

With the screen properly tensioned, use a punch at the side of the screen guide to pull the screen guide away from the cutterhead at each side. This is to seat the support on the screen.

See Figure 43.

Tighten all hardware at the sides of the screen supports and guides. Tighten the lower carriage bolt on the guide. See Figure 43. Repeat process on opposite side.

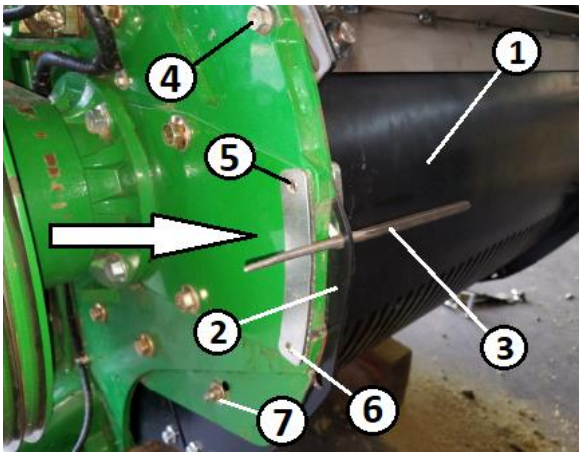


Figure 43. Screen Guide
Key 1 – Screen Key 2 – Guide
Key 3 – Punch (ref) Key 4 – Upper Bolt
Key 5 – Screen Guide Upper Bolt
Key 6 – Screen Guide Lower Bolt
Key 7 – Lower Carriage Bolt

Install Chute

At the base machine, reinstall the chute in front of the Blower or KP. Install two side bolts to remove the chute. See Figure 44.

IMPORTANT

The major difference between the RCI chute and the original is the addition of the lower scraper. When removing the recutter screen and returning to John Deere parts installed, remove the RCI chute and install the John Deere chute.

If not done so already, remove the rear seal from the original chute and install at the rear of the new chute.

See Figure 45.

Install desired chute in the same manner as the original was removed. Tighten all hardware properly.

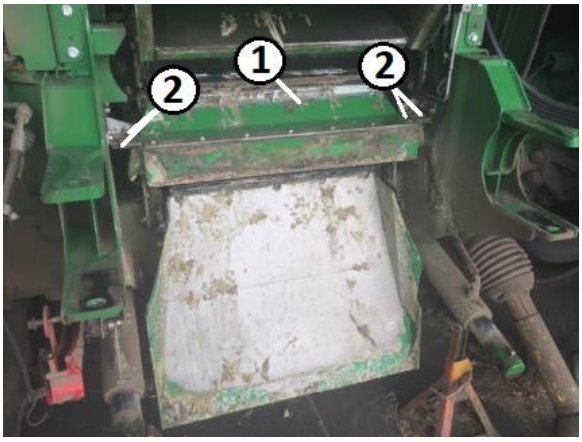


Figure 44. Chute Removal
Key 1 – Chute Key 2 – Hardware

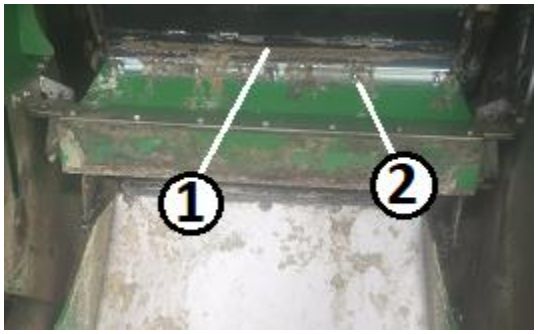


Figure 45. Seal Removal
Key 1 – Seal Key 2 – Hardware (qty 5)

Lower Pan Wear Plate Installation
If switching between John Deere and RCI parts, the wear plate needs to be changed. The RCI wear plate is only compatible with the recutter screen and blank.

If needed, remove the wear plate from the lower pan.

Install the new wear plate reusing the original hardware.

See Figure 46.

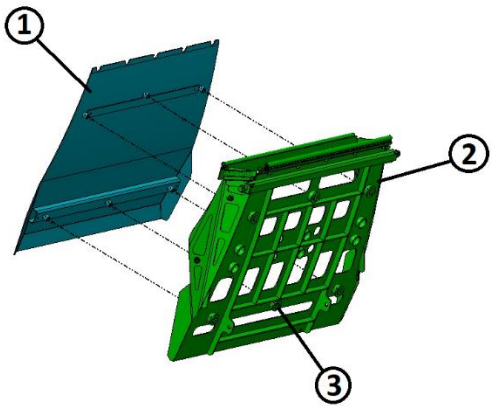


Figure 46. Lower Pan Wear Plate
Key 1 – New Wear Plate
Key 2 – Lower Pan Frame
Key 3 – Hardware Locations (qty 6)

Adjust Upper Seal
With the cutterhead assembly installed on the machine with RCI parts for a screen or blank screen, adjust the rear seal to close the gap to the recutter screen.

Loosen the bolts at the seal and move the seal to close the gap at the screen.

See Figure 47.

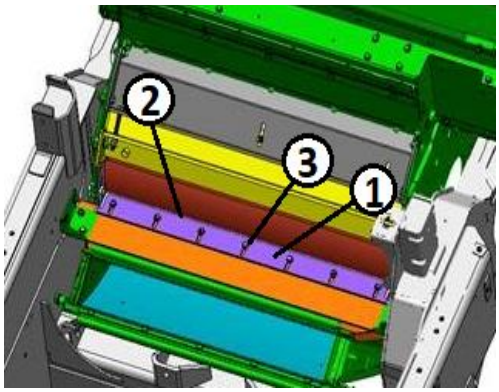


Figure 47. Upper Seal
Key 1 – Plate Key 2 – Seal
Key 3 – Bolts (qty 7)

Adjust Lower Scraper
With the lower pan open, access the scraper location at the bottom of the chute.

Adjust the scraper to be within 1.0 mm of the screen. Do not adjust the scraper tight to the screen.

Tighten hardware properly.

See Figure 48.

Close the lower pan.

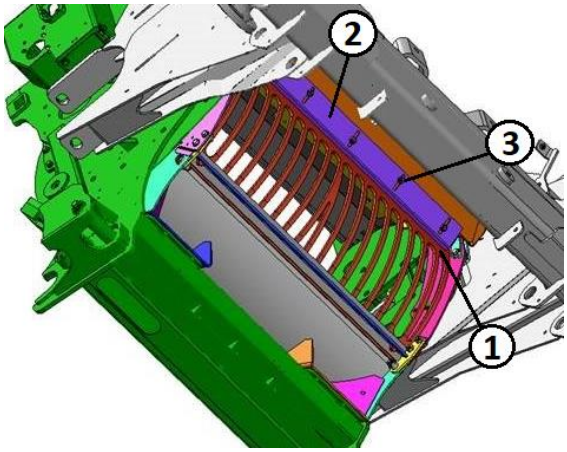
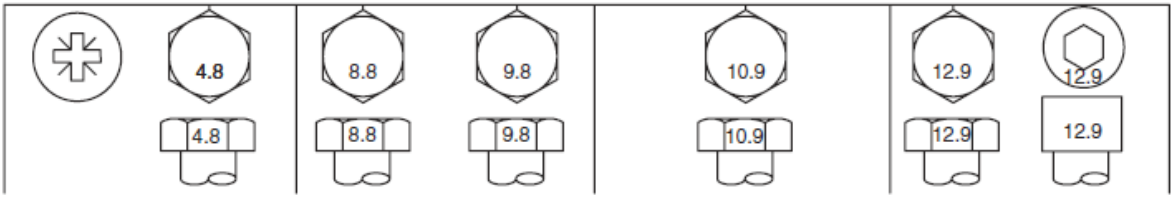


Figure 48. Lower Scraper
Key 1 – Screen Key 2 – Scraper
Key 3 – Hardware (qty 5)

Metric Bolt and Screw Torque Values



Bolt or	Class 4.8				Class 8.8 or 9.8				Class 10.9				Class 12.9			
Screw	Lubricated[a]		Dry[b]		Lubricated[a]		Dry[b]		Lubricated[a]		Dry[b]		Lubricated[a]		Dry[b]	
Size	N•m	lb-in	N•m	lb-in	N•m	lb-in	N•m	lb-in	N•m	lb-in	N•m	lb-in	N•m	lb-in	N•m	lb-in
M6	4.7	42	6	53	8.9	79	11.3	100	13	115	16.5	146	15.5	137	19.5	172
									N•m	lb-ft	N•m	lb-ft	N•m	lb-ft	N•m	lb-ft
M8	11.5	102	14.5	128	22	194	27.5	243	32	23.5	40	29.5	37	27.5	47	35
			N•m	lb-ft	N•m	lb-ft	N•m	lb-ft								
M10	23	204	29	21	43	32	55	40	63	46	80	59	75	55	95	70
	N•m	lb-ft														
M12	40	29.5	50	37	75	55	95	70	110	80	140	105	130	95	165	120
M14	63	46	80	59	120	88	150	110	175	130	220	165	205	150	260	190
M16	100	74	125	92	190	140	240	175	275	200	350	255	320	235	400	300
M18	135	100	170	125	265	195	330	245	375	275	475	350	440	325	560	410
M20	190	140	245	180	375	275	475	350	530	390	675	500	625	460	790	580
M22	265	195	330	245	510	375	650	480	725	535	920	680	850	625	1080	800
M24	330	245	425	315	650	480	820	600	920	680	1150	850	1080	800	1350	1000
M27	490	360	625	460	950	700	1200	885	1350	1000	1700	1250	1580	1160	2000	1475
M30	660	490	850	625	1290	950	1630	1200	1850	1350	2300	1700	2140	1580	2700	2000
M33	900	665	1150	850	1750	1300	2200	1625	2500	1850	3150	2325	2900	2150	3700	2730
M36	1150	850	1450	1075	2250	1650	2850	2100	3200	2350	4050	3000	3750	2770	4750	3500

Torque values listed are for general use only, based on the strength of the bolt or screw. DO NOT use these values if a different torque value or tightening procedure is given for a specific application. For stainless steel fasteners or for nuts on U-bolts, see the tightening instructions for the specific application. Tighten plastic insert or crimped steel type lock nuts by turning the nut to the dry torque shown in the chart, unless different instructions are given for the specific application.

Shear bolts are designed to fail under predetermined loads. Always replace shear bolts with identical property class. Replace fasteners with the same or higher property class. If higher property class fasteners are used, tighten these to the strength of the original. Make sure fastener threads are clean and that you properly start thread engagement. When possible, lubricate plain or zinc plated fasteners other than lock nuts, wheel bolts or wheel nuts, unless different instructions are given for the specific application.

[a]"Lubricated" means coated with a lubricant such as engine oil, fasteners with phosphate and oil coatings, or M20 and larger fasteners with JDM F13C zinc flake coating.

[b]"Dry" means plain or zinc plated without any lubrication, or M6 to M18 fasteners with JDM F13B zinc flake coating.

Repair Parts

General Comments

The following pages include information regarding parts for the Recutter Screen Bundle. Right- or left-hand parts are determined by sitting in the operator seat facing forward. The abbreviation “A.R.” in the “USED” column indicates “As Required.” This is because a different number of the specific component may be needed for proper assembly depending on the tolerance of the individual implement.

All parts listed are available through your local John Deere Dealer.

Dealers, contact RCI directly for all part orders for this attachment. Please include a serial number and model of the attachment when placing a parts order. The serial number plate is attached to the spiral band near the mounting bolts.

Replacement Hardware

All bolts, cap screws, washers and machine screws are metric grade 8.8 and zinc plated unless markings on the part indicate otherwise.

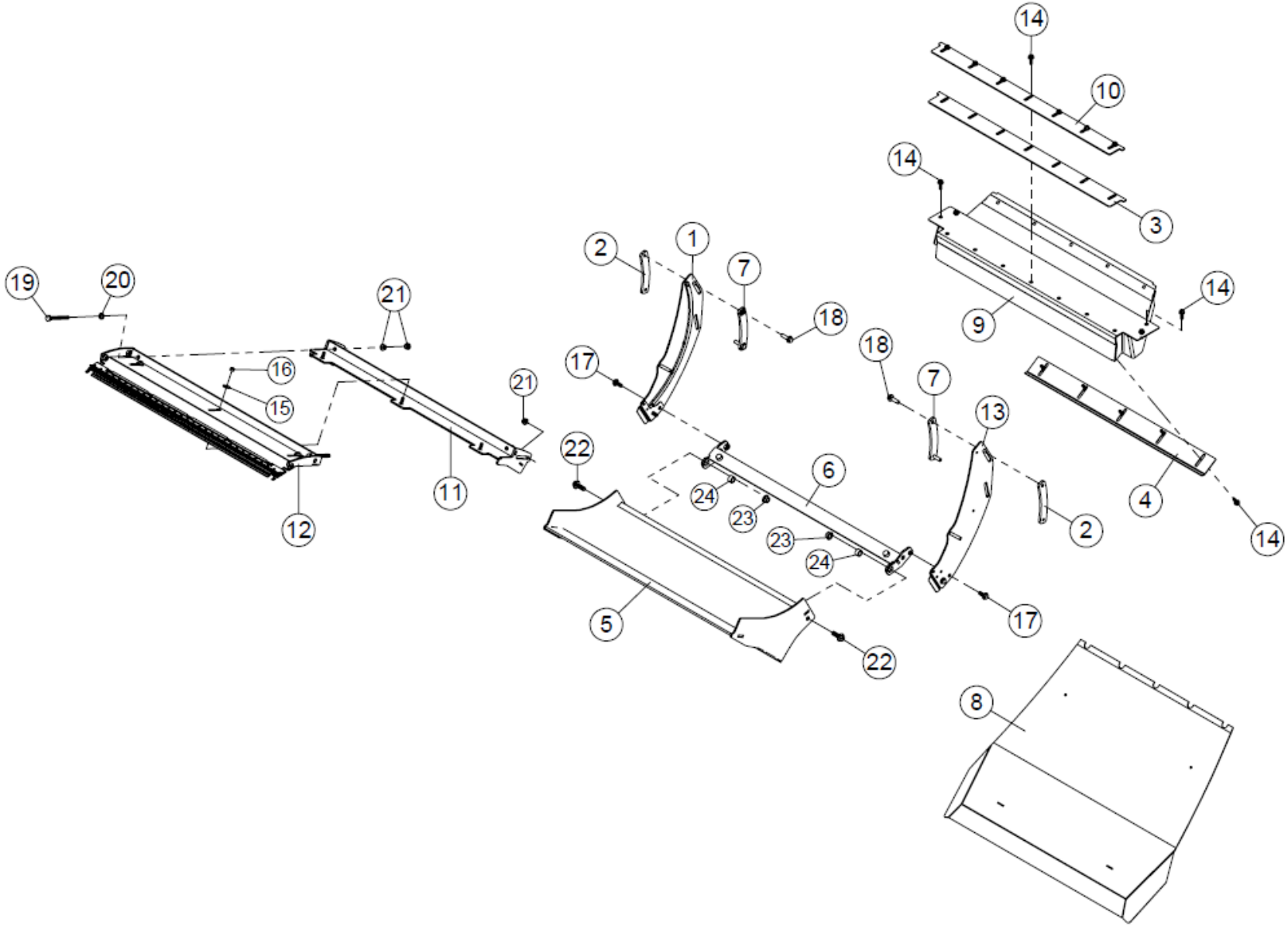
The use of improper hardware in any location can result in the failure of the component fastened with the hardware or related structures, and can cause personal injury, further damage to the product, or loss of property.

Replacement Parts

Replacement parts may have occasional differences to the parts being replaced. This difference is typically providing the benefit of a design change made after the release of this publication.

Repair Parts Index

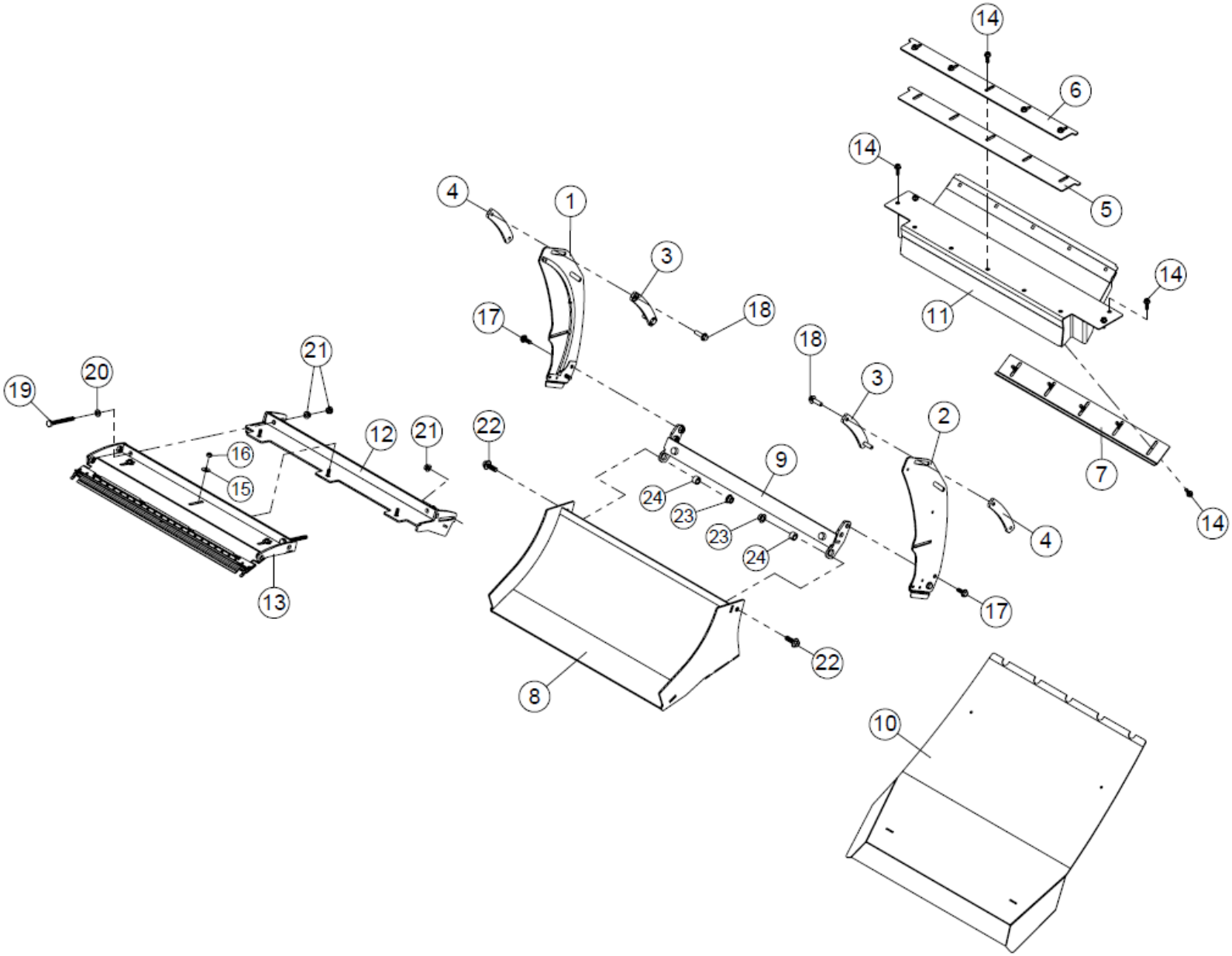
Wide-Body SPFH Recutter Screen Bundle



Wide-Body SPFH Recutter Screen Bundle

Key	Part Number	Description	Qty	Comments
1	RC180087	Guide, RH Screen	1	
2	RC180092	Plate, Threaded	2	
3	RC180044	Seal	1	
4	RC180089	Scraper	1	
5	RC180093	Weldment, Lower Wide Band	1	
6	RC180094	Weldment, Lower Wide Support	1	
7	RC180091	Plate	2	
8	RC180095	Weldment, Wide Chute Liner	1	
9	RC180096	Weldment, Wide Hood	1	
10	RC180097	Cover, Seal	1	
11	RC180098	Weldment, Wide Recutter Top Frame	1	
12	RC180099	Weldment, Wide Upper Support	1	
13	RC180088	Guide, LH Screen	1	
14	RC902405	Bolt, M8-1.25 x 25mm Gr 8.8 YZ Hex Serrated Flange	16	
15	RC900680	Washer, 3/8 CZ Heavy Fender	3	
16	RC902510	Nut, M10-1.5 CZ Nylock	3	
17	RC901377	Bolt, M10-1.5 x 25 Gr 8.8 CZ Hex Flange	4	
18	RC902404	Bolt, M10-1.5 x 35 Gr. 8.8 YZ Hex Flange	4	
19	RC902407	Bolt, M10-1.5 x 100mm Gr 10.9 CZ Hex Full Thread	2	
20	RC901287	Washer, M10 CZ Flat	2	
21	RC901379	Nut, M10-1.5 CZ Flange	6	
22	RC902417	Bolt, M12-1.75 x 35 Gr 10.9 CZ Flange	2	
23	RC901702	Nut, M12-1.75 CZ Flange	2	
24	RC180100	Spacer	2	

Standard-Body SPFH Recutter Screen Bundle

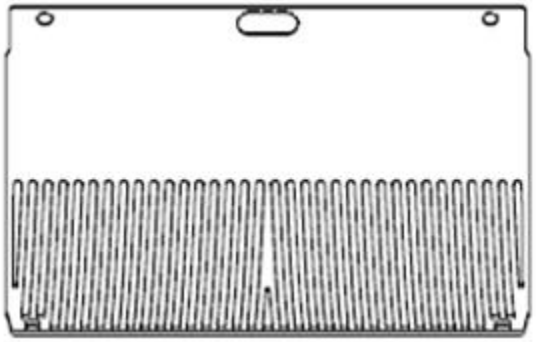


Standard-Body SPFH Recutter Screen Bundle

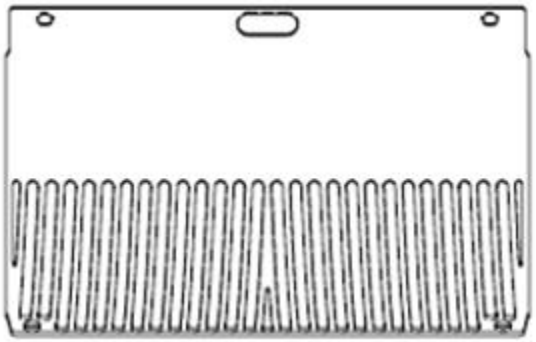
Key	Part Number	Description	Qty	Comments
1	RC180087	Guide, RH Screen	1	
2	RC180088	Guide, LH Screen	1	
3	RC180091	Plate	2	
4	RC180092	Plate, Threaded	2	
5	RC180052	Seal, Standard Body	1	
6	RC180104	Cover, Standard Body Seal	1	
7	RC180105	Scraper, Standard Body	1	
8	RC180106	Weldment, Standard Body Lower Band	1	
9	RC180107	Weldment, Standard Body Lower Support	1	
10	RC180108	Weldment, Standard Body Chute Liner	1	
11	RC180109	Weldment, Standard Body Hood	1	
12	RC180110	Weldment, Standard Body Top Frame	1	
13	RC180111	Weldment, Standard Body Upper Support	1	
14	RC902405	Bolt, M8-1.25 x 25mm Gr 8.8 YZ Hex Serrated Flange	14	
15	RC900680	Washer, 3/8 CZ Heavy Fender	3	
16	RC902510	Nut, M10-1.5 CZ Nylock	3	
17	RC901377	Bolt, M10-1.5 x 25 Gr 8.8 CZ Hex Flange	4	
18	RC902404	Bolt, M10-1.5 x 35 Gr. 8.8 YZ Hex Flange	4	
19	RC902407	Bolt, M10-1.5 x 100mm Gr 10.9 CZ Hex Full Thread	2	
20	RC901287	Washer, M10 CZ Flat	2	
21	RC901379	Nut, M10-1.5 CZ Flange	6	
22	RC902417	Bolt, M12-1.75 x 35 Gr 10.9 CZ Flange	2	
23	RC901702	Nut, M12-1.75 CZ Flange	2	
24	RC180100	Spacer	2	

Wide-Body SPFH Recutter Screens

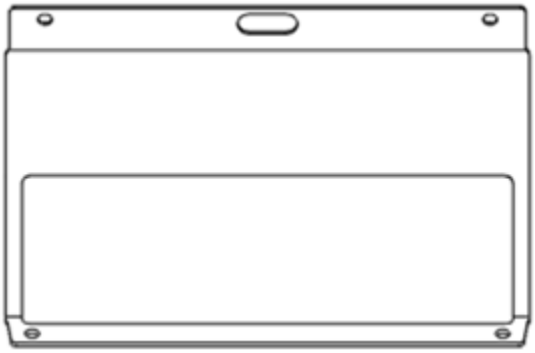
RC180084 – 13mm Wide Body Recutter Screen



RC180085 – 19mm Wide Body Recutter Screen

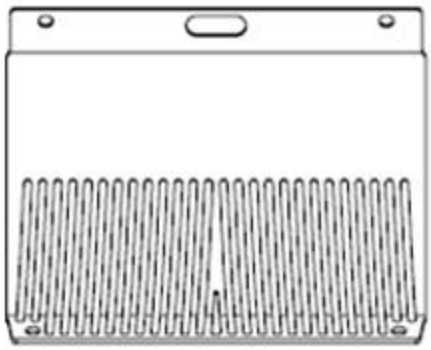


RC180082 – Blank Wide Body Recutter Screen

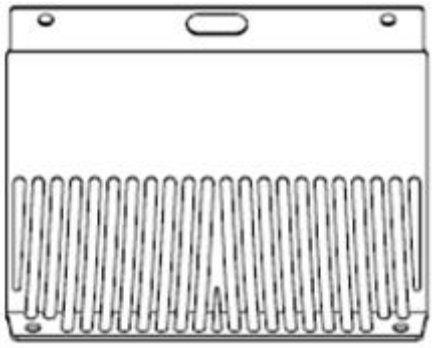


Standard-Body SPFH Recutter Screens

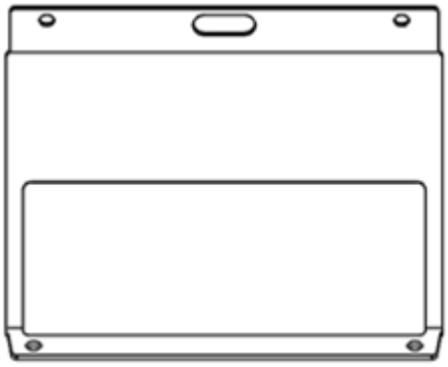
RC180101 – 13mm Standard Body Recutter Screen



RC180102 – 19mm Standard Body Recutter Screen



RC180083 – Blank Standard Body Recutter Screen



Pre-delivery Checklist (Copy for Return to RCI)

After the unit has been assembled and lubricated and prior to delivery to customer, the bundle needs to be inspected thoroughly to ensure it is in proper working order. The following checklist must be reviewed and each item found to be satisfactorily completed.

- ☐ Bundle has been setup according to the instructions included in this manual.
- ☐ All guards, shields and safety decals are in place, securely fastened, and operate correctly.
- ☐ All nuts and bolts have been tightened and inspected.
- ☐ Adjustments have been made as described in the Adjustments section of this manual.
- ☐ All moving parts operate freely.
- ☐ All applicable warranty information recorded.

I acknowledge that the pre-delivery service was performed and the unit is ready for delivery to the customer.

_____	_____	_____
Dealership's Name	Representative	Date
_____	_____	_____
Model Number	Serial Number	Date Sold

Owner's Name and Address

Name_____

Address_____

City, State, Zip _____

Original: Enclose in manual and give to customer at time of delivery.
Copy: Dealership
Copy: RCI Engineering LLC

RCI Engineering LLC
Fax: 920-387-9804
Email: info@rciengineering.com
Mail: 208 River Knoll Drive, Mayville, WI 53050

Delivery Checklist (Copy for Return to RCI)

The following items must be performed when delivering the attachment to the customer. Check off each item as it is performed.

- ☐ Provide the customer with the Operator Manual and instruct them to read prior to operating the unit.
- ☐ Review and explain all safety information and operating adjustments.
- ☐ Show how to properly adjust the recutter screen as instructed in the *Adjustments* section.
- ☐ Make it be known that if the customer can visit or call the dealership to discuss any questions or problems they may encounter.
- ☐ Complete the Owner Registration with the customer, ensure it is completely filled out, and return it to RCI Engineering.

_____
Date Delivered

_____
Signature

Original: Enclose in manual and give to customer at time of delivery.
Copy: Dealership
Copy: RCI Engineering LLC

RCI Engineering LLC
Fax: 920-387-9804
Email: info@rciengineering.com
Mail: 208 River Knoll Drive, Mayville, WI 53050

Suggestions to RCI

Use this page to provide feedback to RCI regarding this product, manual, or other ways for RCI to improve in the future.

Product: Recutter Screen Bundle for 8000-Series SPFH

Dealership Name: _____

Dealership City: _____

Dealership Phone: _____

Technician: _____

S/N: _____

Date: _____

Installation Time (hours): _____

Comments:

_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____

Send to RCI Engineering:

RCI Engineering LLC
Fax: 920-387-9804
Email: info@rciengineering.com
Mail: 208 River Knoll Drive, Mayville, WI 53050

208 River Knoll Drive ● Mayville, WI 53050 ● 920-387-9804 ● Fax 920-387-9806
www.rciengineering.com