

**Date Created:** 07-03-2018

**Product:** Pegasus S4

**Title:** 'LocTek' Roller Retention System - Upgrade Instructions



**SAFETY!** Before attempting to make any adjustments or carry out maintenance on the mower, review the hazard identification table (section 3a of your Operator Manual) and take all necessary precautions.



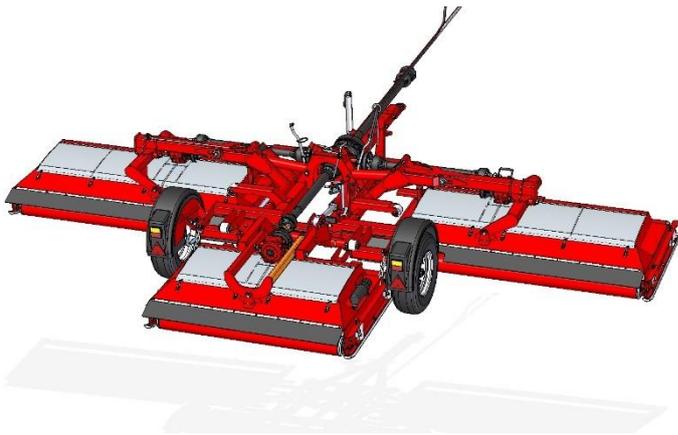
**IMPORTANT:**

An Impact Gun and a 30mm Impact Socket is **REQUIRED** for this process!

This will be used to do up the M20 x 85 Bolts used to secure the LocTek Roller Bearing Assemblies to the Rollers.

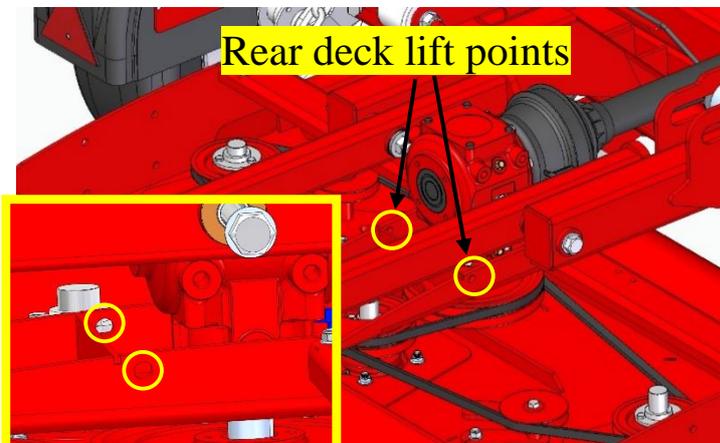


Wear all required PPE when using Impact Tools!



Lower all decks to the ground on a flat even surface where there is sufficient area around to fit and remove parts from the mower.

A means of lifting the mower decks individually will be required for this process. An overhead crane or fork hoist is suitable.



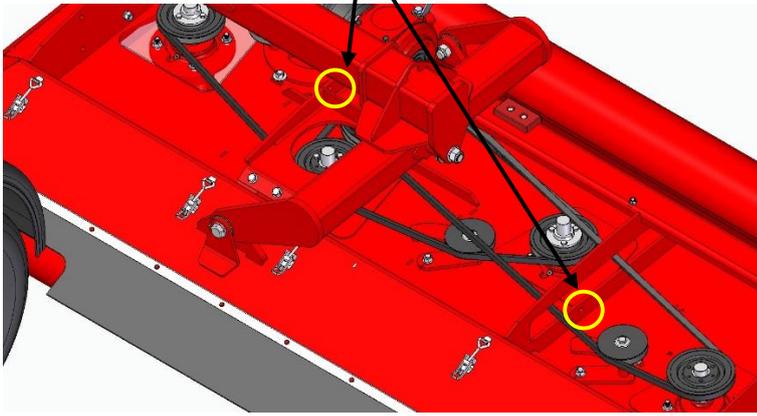
Rear deck lift points

Remove the covers from the mower decks to expose the lifting points on the mower decks.

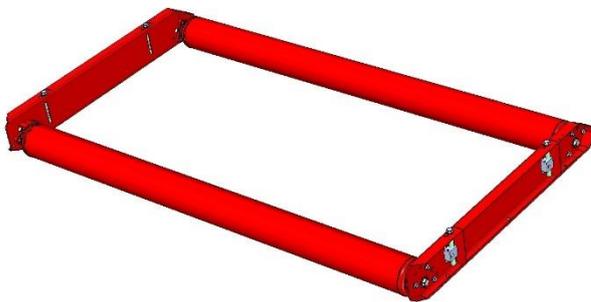
Identify the locations of the lift points. Use appropriately rated lifting strops and shackles, or chain and shackles.

Rear deck lift points are on the gearbox mount plate.

## Side deck lift points



The side deck lift points are found on the gearbox mount plate, use the hole closest to the chassis only, and the stiffener plate between the outer two spindles.



It is easiest to fit the new rollers and bearings to the side channels all together as shown. Then swap these complete for each deck.

The following steps will guide you through this process.

If the optional Anti-Bounce Skids are fitted to the existing machine they need to be removed.

Re-install them at the end of this procedure. See Trimax Instruction Bulletin #18a.



Insert the Roller Stub Sleeves into the rear of Bearing Assemblies as shown.

Ensure the sleeves are fully inserted!  
4 per deck.



### **IMPORTANT:**

This is **CRITICAL** to the Roller Bearing Fitment procedure!



Turn the bearing assemblies over.

Remove **BOTH** Grub Screws.

Apply **Loctite 243** to **BOTH** Grub Screws.

Reposition **BOTH** Grub Screws.

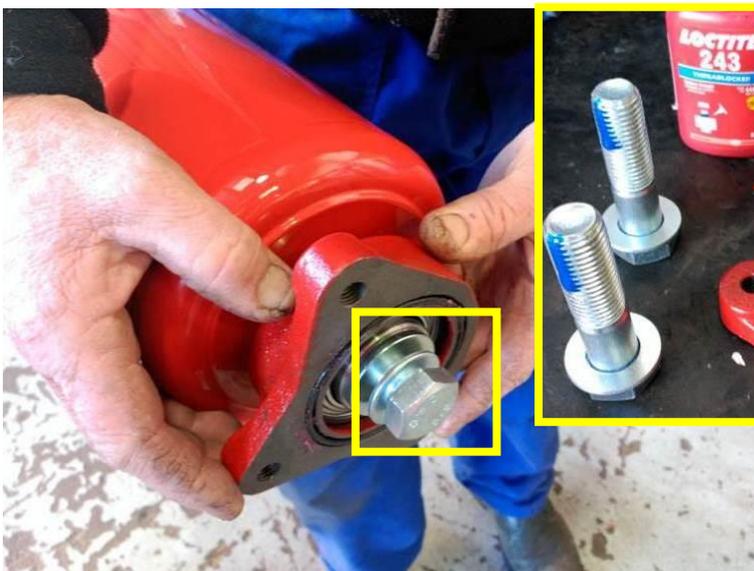
Fully tighten **BOTH** Grub Screws.

Repeat for each Bearing Assembly.

The Roller Bearing Sub-Assembly process is now complete.



Insert a Bearing Assembly into the end of the Roller by aligning the oval protrusion of the Roller Stub Sleeve with the oval recess in the Roller Dome.



Apply **Loctite 243** to the M20 x 85 Bolts as shown inset.

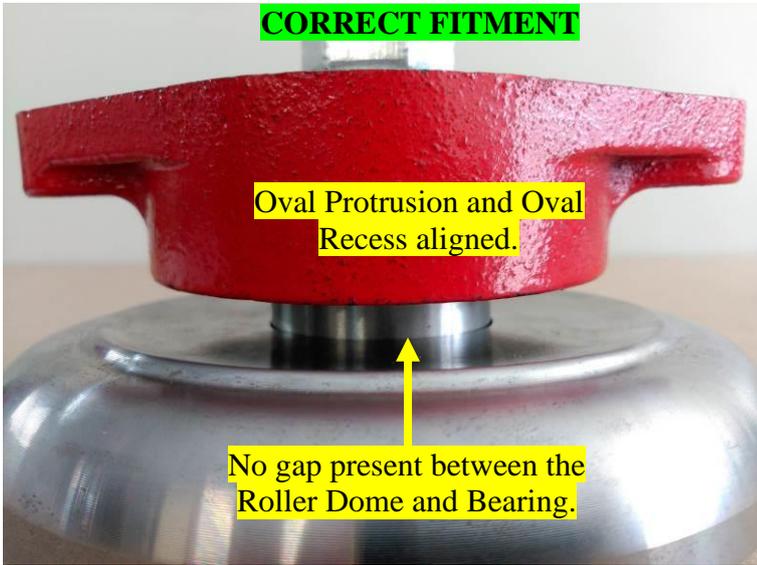
Fit the M20 x 85 Bolt and M20 Flat Washer into the **REAR** of the Bearing Assembly as shown.

Fully wind the Bolt in by hand.

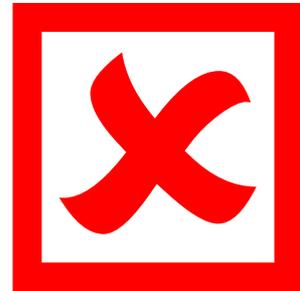
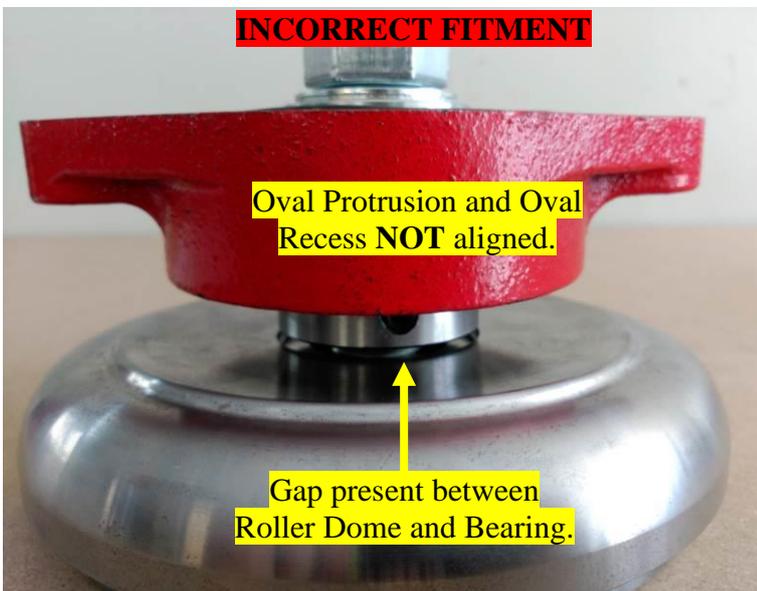


**IMPORTANT:**

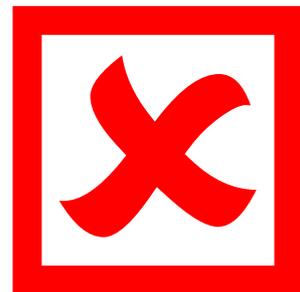
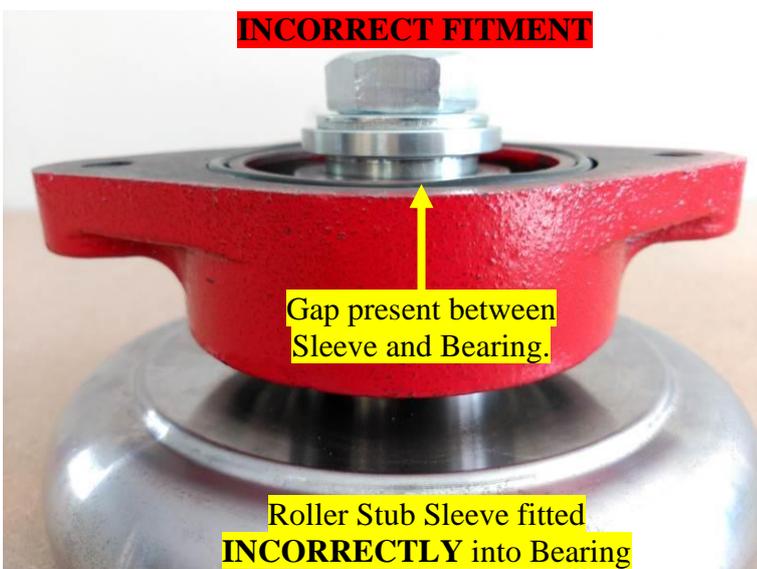
Check that the Sleeve is **FULLY** seated in the Roller Dome and Roller Bearing, see below for details!



**IMPORTANT:**  
The image shows **CORRECT** Roller Bearing Fitment!



**IMPORTANT:**  
The image shows **INCORRECT** Roller Bearing Fitment!



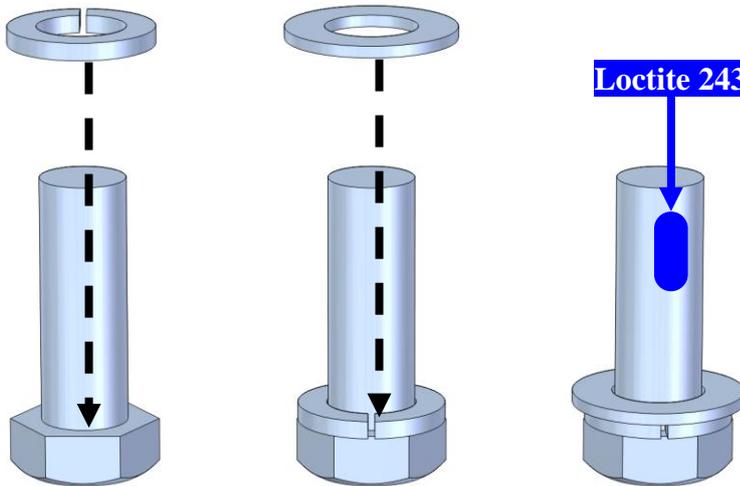
**IMPORTANT:**  
The image shows **INCORRECT** Roller Bearing Fitment!



Fully tighten the M20 x 85 Bolt with an Impact Wrench.

After tightening, stripe the Roller Bearing Assembly as shown with a Marker.

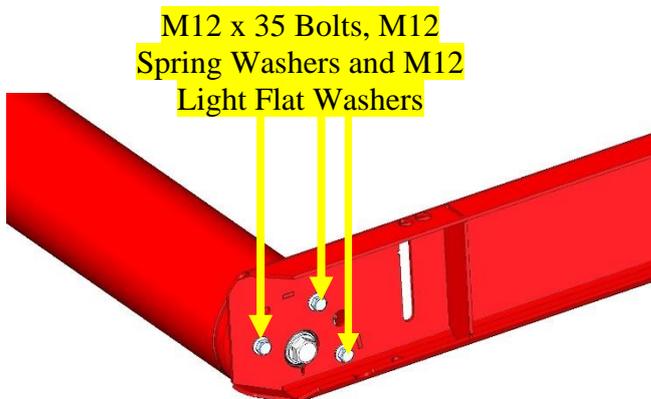
Repeat the Roller Bearing Fitment process at the opposite end of the Roller.



Fit M12 Spring Washers over each of M12 x 35 Bolts. There are 12 per deck.

Fit M12 Flat Washers over each of M12 x 35 Bolts.

Apply **Loctite 243** to the threads of each of the M12 x 35 Bolts.

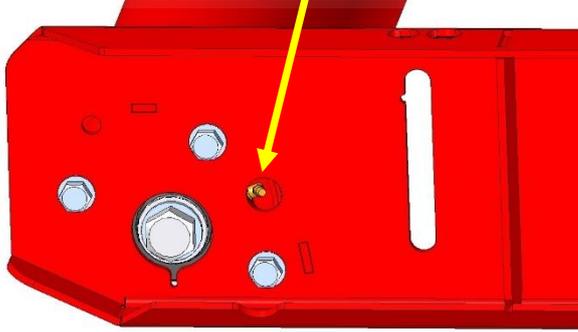


Manoeuvre the Roller Assembly against the side channel.

Fit the prepared M12 x 35 Bolts, M12 Light Flat Washers and M12 Spring Washers through the side channel and into the Roller Bearing.

Fully tighten **ALL** three Roller Bearing Mounting Bolts.

Greasing access hole.

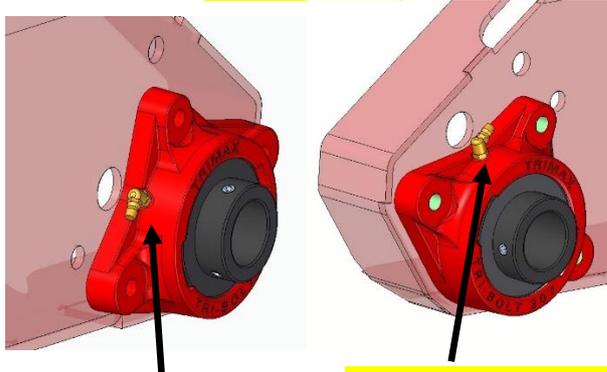


Ensure the grease nipple (if fitted) is orientated correctly and accessible through the greasing access hole in the Side Channel.



**Note:** On the front roller of rear deck the grease nipple orientation differs from the rest as shown below.

Rear Deck Only



Orient the grease nipple as shown for use on the left hand side of the front roller

Orient the grease nipple as shown for use on the right hand side of the front roller

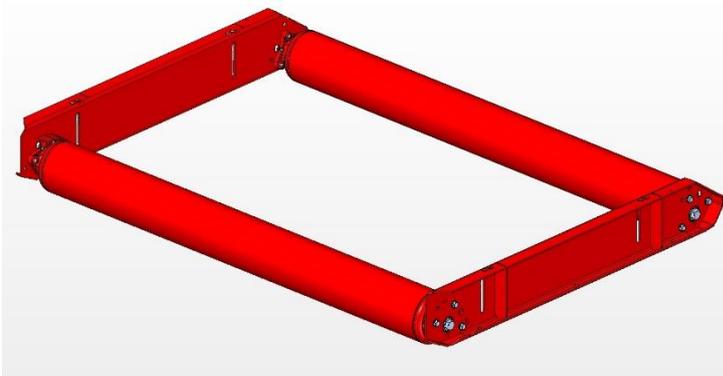
The picture on the left shows the correct orientation of the front roller bearing grease nipples on the rear deck only.



**Note:** These two greasing points are not accessible from the hole in the Side Channel due to the chassis wheels being in the way.

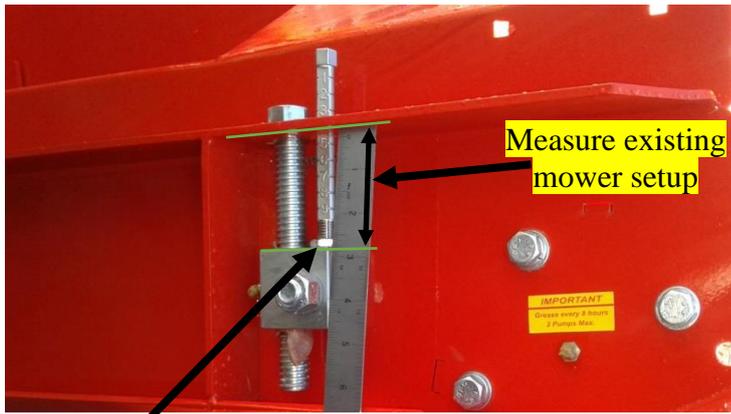
When fully assembled, the grease nipple on the front left roller bearing on the rear deck is accessed by first raising the deck using the tractor hydraulics. It can then be accessed from the rear of the mower.

The grease nipple on the front right of the rear deck is accessed from above the front of the deck when the deck is in its lowered position.



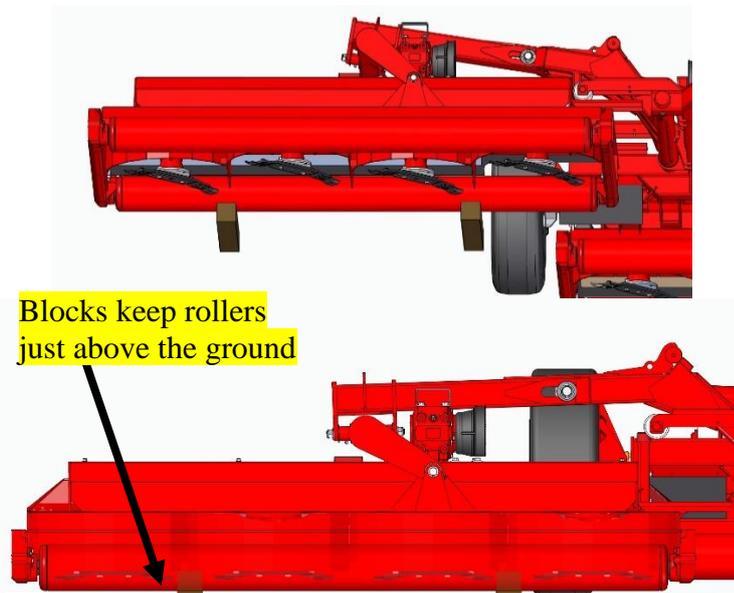
At this point the assembly of the LocTek Roller Retention System for a single deck should look like the picture on the left.

Now the height adjustment datums on the existing deck need to be measured.



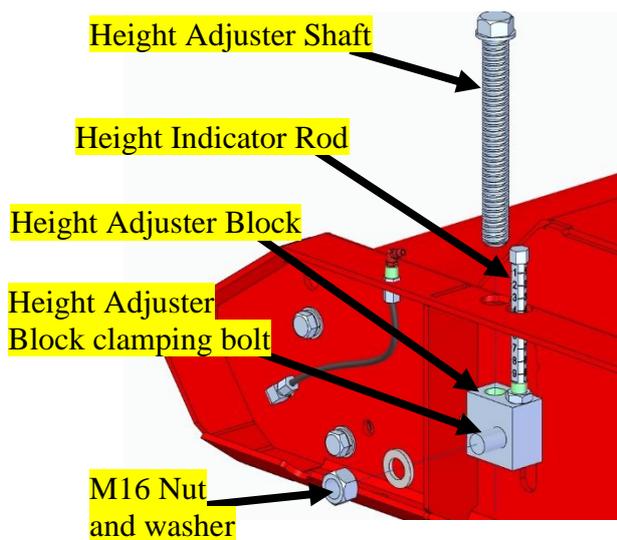
Do NOT loosen Height Indicator Rod locknut

Before removing any Height Adjustment hardware from the existing mower, measure the distance from the underside of the upper plate of the Side Channel to the top of the Height Adjuster Block as shown. Do NOT loosen the lock nut on the Height Indicator Bar. Do this for each corner of the deck. Record the information.

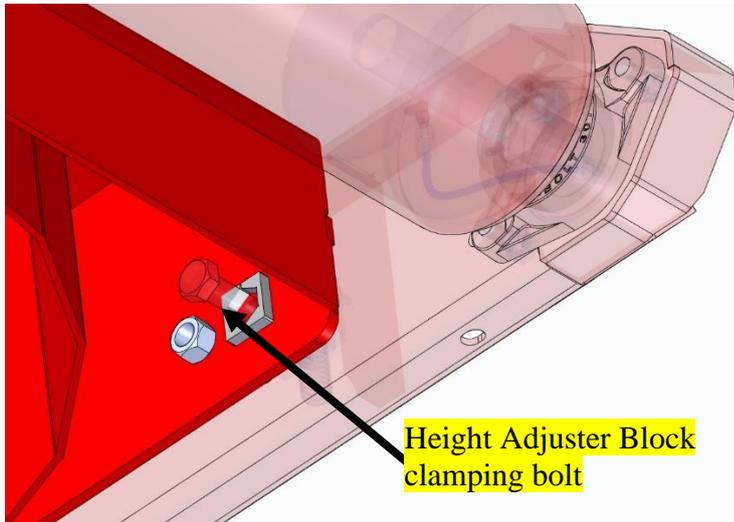


Blocks keep rollers just above the ground

Using the tractor hydraulics, partially raise the deck and place suitably sized blocks under the deck in line with the baffles. Then lower the deck down onto the blocks. The blocks should be of a height that keeps the rollers just above the ground when the deck is fully rested on the blocks.

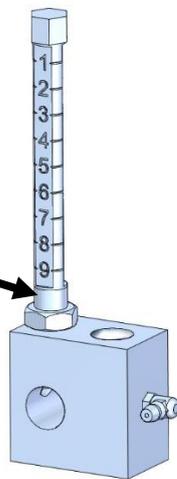


Once the height measurements are recorded, loosen the Height Adjuster Blocks by undoing the M16 nut, and fully unscrew the threaded Height Adjuster Shaft. Then fully remove the M16 nuts and washers. The rollers and side channels will drop a small distance onto the ground.



To be able to remove the Height Adjuster Blocks with the Height Indicator Rod intact, it will be necessary to tap the Height Adjustment Block clamping bolts with a soft hammer and remove them through the inside of the deck. 4 per deck.

Do not remove or adjust the Height Indicator Rod in relation to the Height Adjuster Block



Keep each of the Height Adjuster Blocks and Height Indicator Rods together as an integral unit. Keep track of which corner of the deck they are associated with and be sure to re-install in the correct place. This is essential to retain cut height accuracy.

Front Left  
Height measurement xx



Front Right  
Height measurement xx



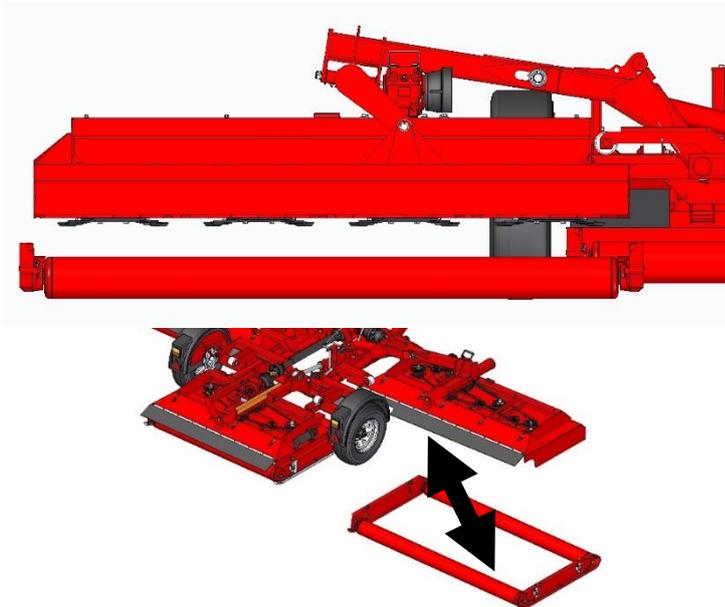
Rear Left  
Height measurement xx



Rear Right  
Height measurement xx

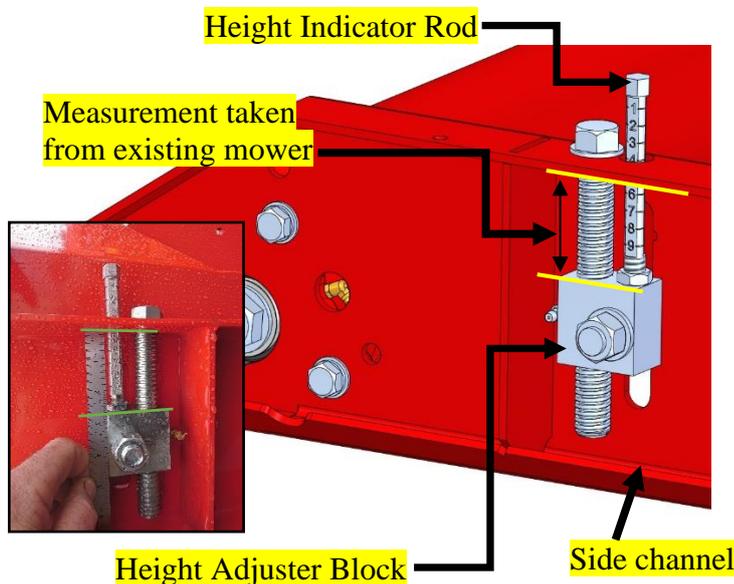


Be sure to keep track of the position and height measurement of each Height Adjuster Block for each deck by labelling them and recording the relevant measurements. There is a page at the end of this document for recording these measurements for each deck.

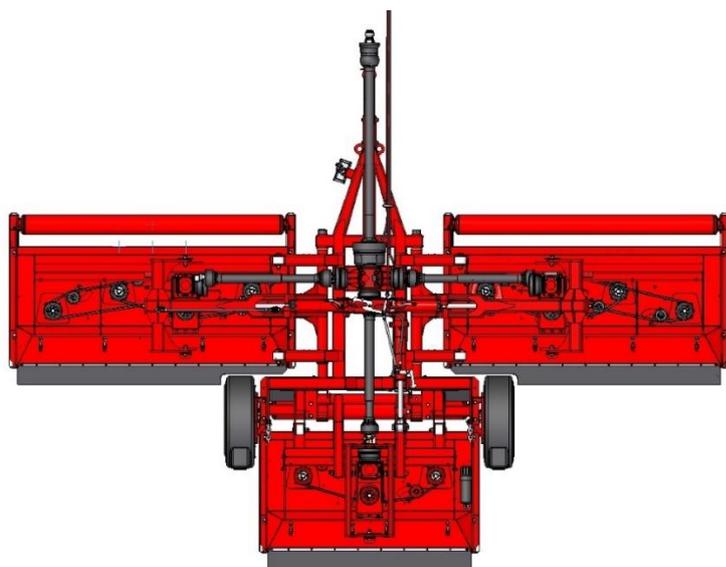


Using the tractor hydraulics lift the deck above the roller/side channel unit which will now separate from the rest of the deck.  
Slide the old roller and side channels out from under the mower deck and replace with the new LocTek Roller Retention System.

Ensure that the blocks are placed back directly underneath the baffles. This is the best location to safely support the deck.  
Carefully lower deck back into position and refit Height Adjuster Block clamp bolts loosely. Lower deck completely then tighten.



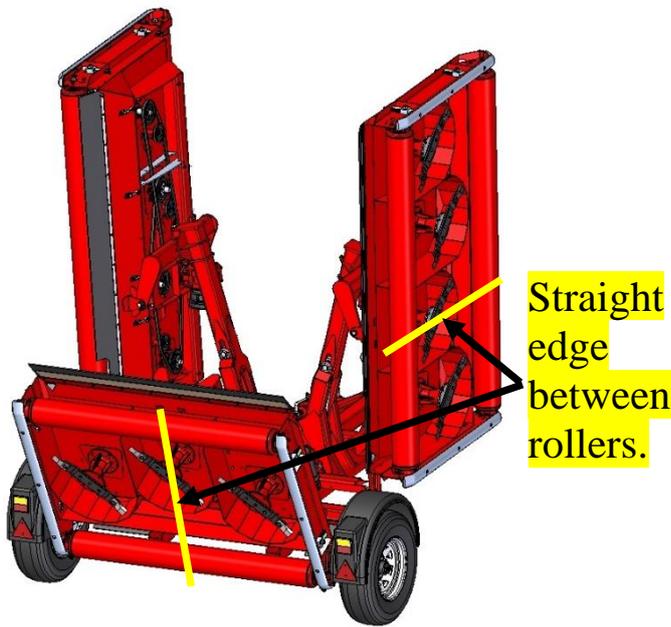
Fit and position the Height Adjuster Blocks (integral with the Height Indicator Rods) using the same measurement taken from the same position on the existing mower, this should set the mower at the same cut height as the original set.  
Do **NOT** adjust or remove the Height Indicator Rod from the Height Adjuster Block.  
When done, lift the deck, remove blocks and lower back to the ground.



Repeat this process for the other two deck transport systems.

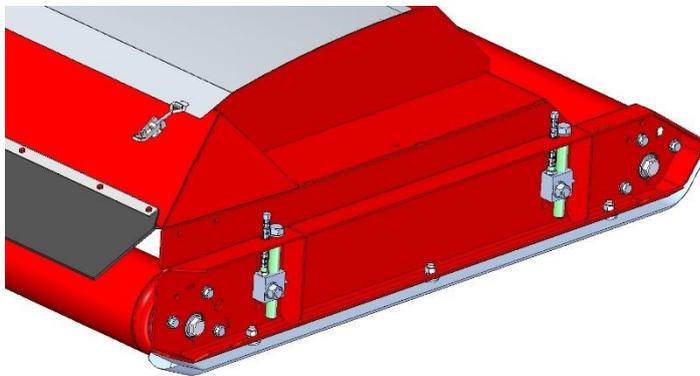
Label removed Height Adjustment Blocks so that they can be returned to the same position when required.

Note: Rear deck has anti kick-up chains attached to the front of the side channels which will need to be removed and re-fitted using **Loctite 243**.



Use straight edge to check accuracy of cut height.

Position straight edge between rollers and measure to blade tips to check cut height and consistency, repeat for all spindles across all decks.

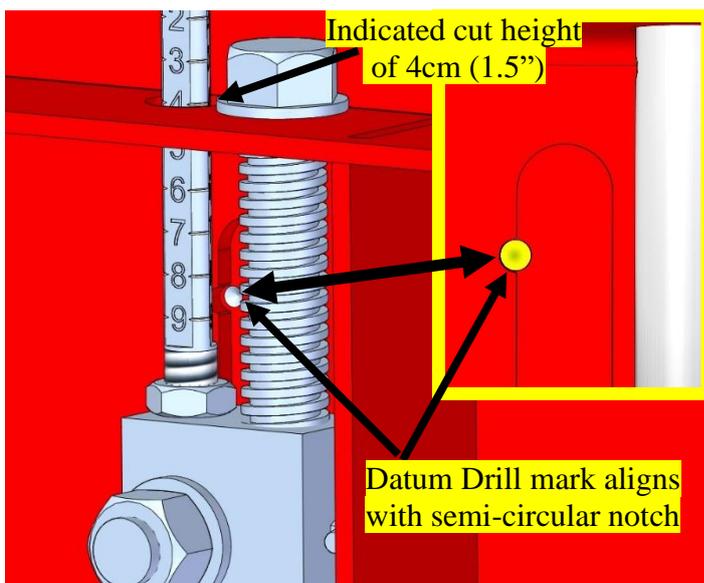


Lower decks back to the ground.

Re-fit covers.

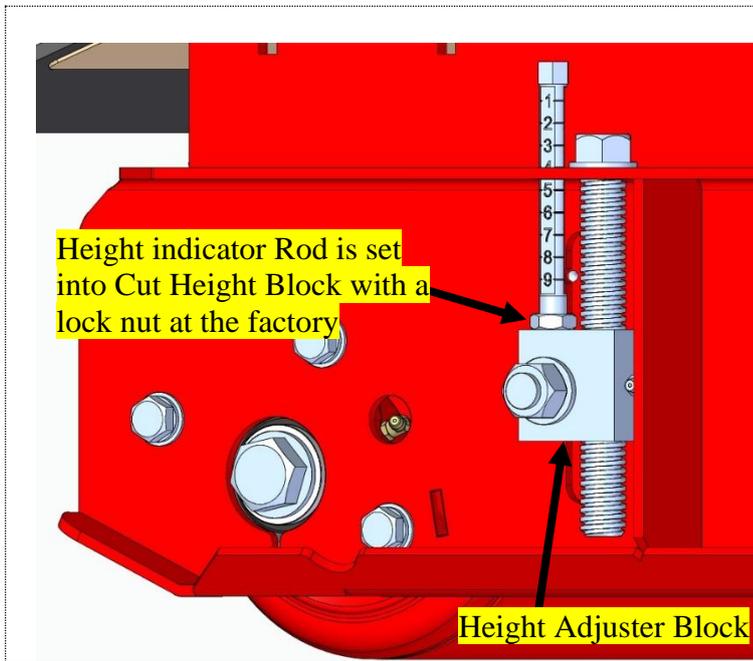
Check height indicators. They should be set to indicate height determined by straight edge measurement of cut height.

Check all nuts and bolts are tight. Grease height adjuster blocks and apply two pumps of grease into each roller bearing.



A double check on the datum for the height adjustment can be performed on mowers with Datum Drill Marks and associated semi-circular notches.

The drilled datum mark in the side plate of the deck body aligns with the semi-circular notch in the Side Channel slot ONLY at an indicated grass cut height of 4cm (or 1.5 inch). If the Cut Height Indicator Rod has been tampered with then the accuracy of this datum is lost.

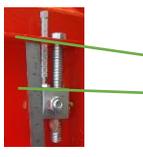
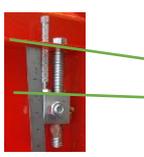
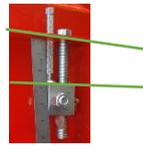
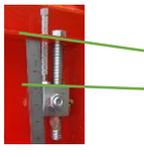


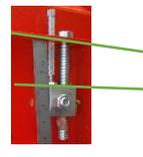
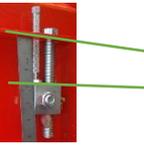
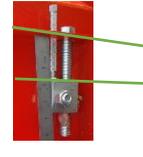
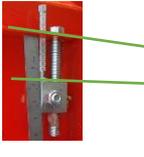
The Cut Height Indicator Rod is set by locknut into the Height Adjuster Block at the factory. This setting must remain untampered with, or the 4cm (1.5") Datum Alignment accuracy is lost.

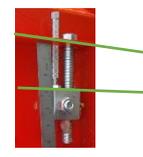
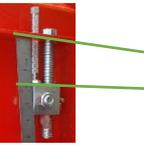
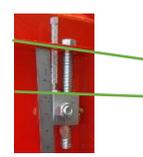
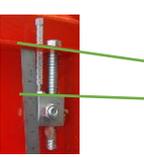
Also, the Height Adjuster Blocks must remain in the same position on the same deck.

For example, if the right-hand Height Adjust Block (integral with its cut Height Indicator Rod) on the rear deck is removed, then it must be put back in the same position on the same deck.

**Cut Height Measurements table.**

<b>Left Deck</b>	
 <p>Front Left</p> 	 <p>Front Right</p> 
 <p>Rear Left</p> 	 <p>Rear Right</p> 

<b>Rear Deck</b>	
 <p>Front Left</p> 	 <p>Front Right</p> 
 <p>Rear Left</p> 	 <p>Rear Right</p> 

<b>Right Deck</b>	
 <p>Front Left</p> 	 <p>Front Right</p> 
 <p>Rear Left</p> 	 <p>Rear Right</p> 