

# WSM

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WORKSHOP MANUAL  
TRACTOR, FRONT LOADER,  
BACKHOE, ROTARY MOWER

**BX24, LA240, BT601, RCK54,  
RCK54P, RCK60B**

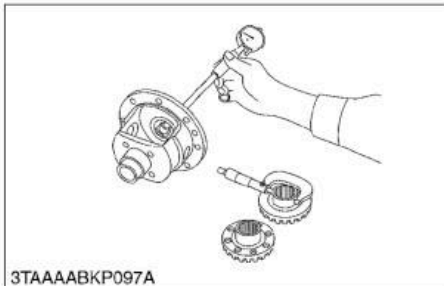
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**Кубота**

# MECHANISM

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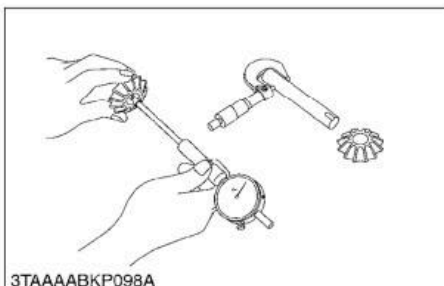
**Clearance between Differential Case and Differential Side Gear**

1. Measure the differential side gear boss O.D. with an outside micrometer.
2. Measure the differential case I.D. with a cylinder gauge and calculate the clearance.
3. If the clearance exceeds the allowable limit, replace faulty parts.

Clearance between differential case and differential side gear	Factory spec.	0.050 to 0.151 mm 0.0020 to 0.0059 in.
	Allowable limit	0.30 mm 0.0118 in.

Differential case I.D.	Factory spec.	38.000 to 38.062 mm 1.4961 to 1.4985 in.
Differential side gear O.D.	Factory spec.	37.911 to 37.950 mm 1.4926 to 1.4941 in.

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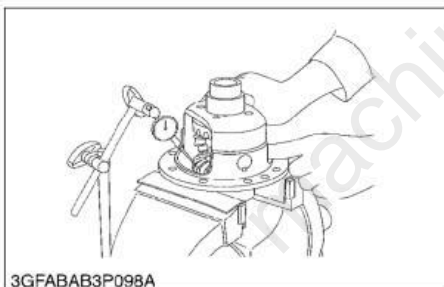
**Clearance between Differential Pinion Shaft and Differential Pinion**

1. Measure the differential pinion shaft O.D. with an outside micrometer.
2. Measure the differential pinion I.D. with a cylinder gauge, and calculate the clearance.
3. If the clearance exceeds the allowable limit, replace faulty parts.

Clearance between differential pinion shaft and differential pinion	Factory spec.	0.080 to 0.122 mm 0.0031 to 0.0048 in.
	Allowable limit	0.30 mm 0.0118 in.

Differential pinion I.D.	Factory spec.	20.060 to 20.081 mm 0.7898 to 0.7906 in.
Differential pinion shaft O.D.	Factory spec.	19.959 to 19.980 mm 0.7858 to 0.7866 in.

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**Backlash between Differential Pinion and Differential Side Gear**

1. Secure the differential case with a vise.
2. Set the dial indicator (lever type) with its finger on the tooth of the differential side gear.
3. Press differential pinion and side gear against the differential case.
4. Hold the differential pinion and move the differential side gear to measure the backlash.
5. If the backlash exceeds the allowable limit, adjust with differential side gear shims.

Backlash between differential pinion and differential side gear	Factory spec.	0.15 to 0.30 mm 0.0059 to 0.0118 in.
	Allowable limit	0.40 mm 0.0157 in.

**(Reference)**

- Thickness of shims :  
1.5 mm (0.0591 in.), 1.6 mm (0.0630 in.), 1.7 mm (0.0669 in.)

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### 3. CONTROL VALVE

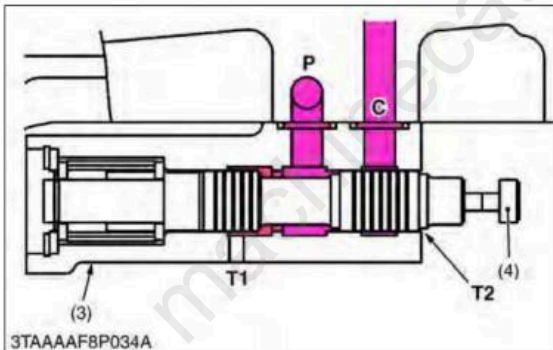
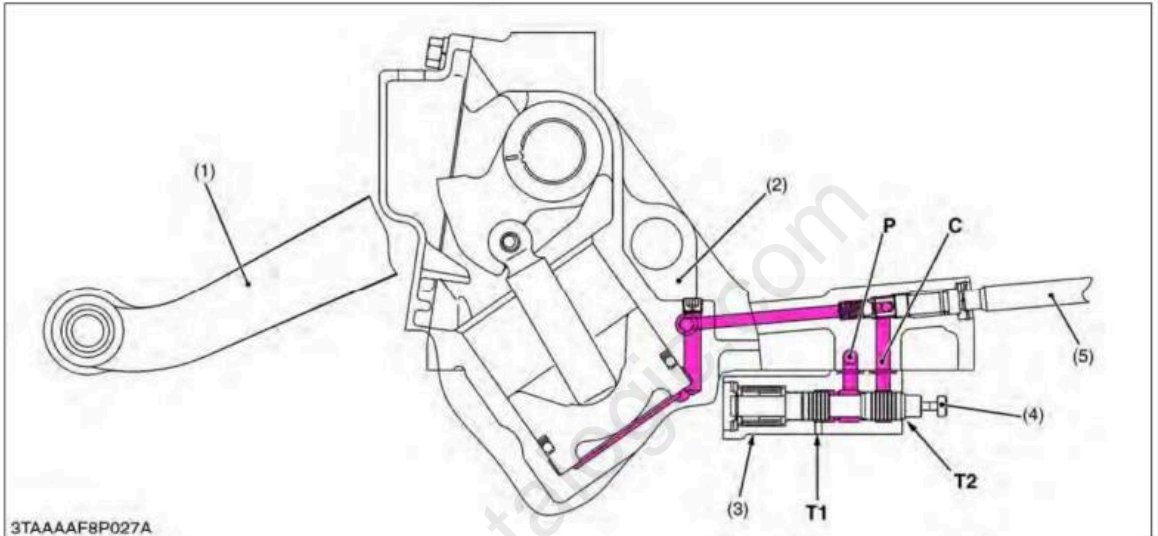
This position control valve is located under the hydraulic cylinder.

This control valve is mechanically connected to the position control lever.

Since the feedback rod is not equipped to the lift arm, the neutral position adjustment is adjusted by controlling the position control lever.

The control valve controls the oil flow forced from the hydraulic pump and the oil returned back from the hydraulic cylinder.

■ Neutral



When stopping the position control lever, the spool is stopped.

The spool closes the oil flow from passage between **P** port and **C** port.

Since the oil in the hydraulic cylinder is not drained to **T2** port, "Neutral" position is kept.

- |                              |                          |
|------------------------------|--------------------------|
| (1) Lift Arm                 | <b>P</b> : Pump Port     |
| (2) Hydraulic Cylinder       | <b>C</b> : Cylinder Port |
| (3) Control Valve            | <b>T1</b> : Tank Port    |
| (4) Spool                    | <b>T2</b> : Tank Port    |
| (5) Lowering Adjusting Shaft |                          |

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## [2] DISASSEMBLING AND ASSEMBLING



### Universal Joint and Belt Cover

1. Unscrew the universal joint screw.
2. Remove the universal joint (1).
3. Remove the left and right belt covers (2), (3).

- (1) Universal Joint (3) Belt Cover (Right)  
 (2) Belt Cover (Left)

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### Mower Blades (Center Blade and Outer Blades)

1. Turn over the mower.
2. Unscrew the mower blade screw (5), and remove the lock washer (4), cup washer(s) (3), mower blade (2) and dust cover (1).

#### ■ NOTE

- To remove the blade securely, wedge a block of wood between one blade and the mower deck in such position that it will hold the blade safely while loosening or tightening the blade screw.

(When reassembling)

[RCK54-23BX, RCK54P-23BX]

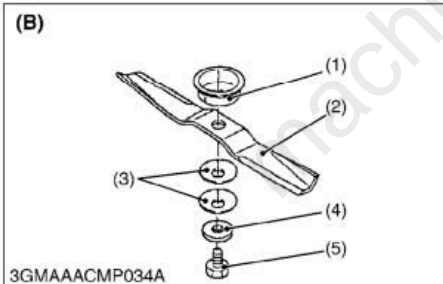
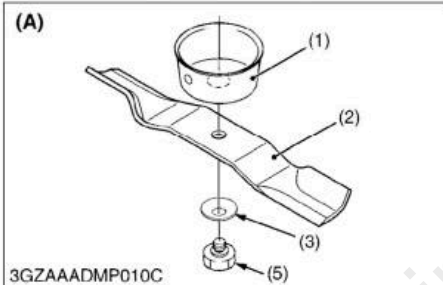
- Install the blade in position together with the dust cover and the cup washer. Tighten them up with the screw.

[RCK60B-23BX]

- Install the blade in position together with the dust cover, the lock washer and the 2 cup washers. Tighten them up with the screw.

#### ■ IMPORTANT

- Make sure the cup washer is not flattened out or worn, causing blade to slip easily.  
 Replace cup washer(s) if either is damaged.



Tightening torque	Mower blade screw	102.9 to 117.7 N·m 10.5 to 12.0 kgf·m 75.9 to 86.8 ft·lbs

- (1) Dust Cover  
 (2) Mower Blade  
 (3) Cup Washer  
 (4) Lock Washer  
 (5) Mower Blade Screw

- (A) RCK54-23BX, RCK54P-23BX  
 (B) RCK60B-23BX  
 a : Loosen

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# Full Version Available

Kubota BT601 Backhoe Workshop Manual

This is a short preview. The complete manual contains all chapters, wiring diagrams, torque specifications and full service procedures.

**VIEW THE FULL MANUAL**

<https://machinecatalogic.com/kubota-bt601-backhoe-workshop-manual/>