

Troubleshooting

RK-2

Problem: Wheel head speeds up automatically; Pedal walking/slipping; Pedal must be depressed far before wheel head turns

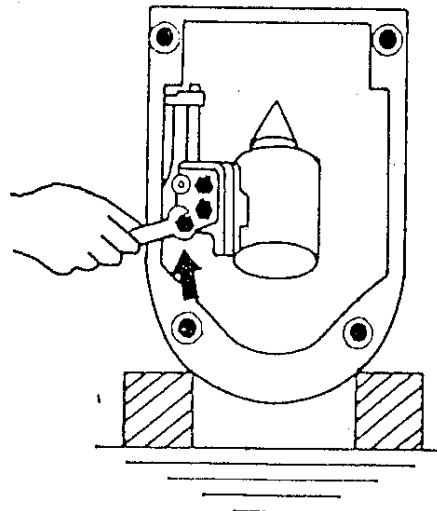
Solution: Adjust power, if drive ring needs replacing adjust power after replacement.

Power Adjustment

Power may be increased or decreased by adjusting the pressure between the ring and the cone on the Ringcone Drive System.

To do this:

- ① With the spanner provided with the wheel, loosen the three bolts illustrated in Draw. No. 4.
- ② Slide the casting and motor on the shaft (move it towards the pedal to increase power and away to decrease power). If you move the unit too far up, it will tighten the pressure between the cone and ring to a point where the variable speed control will not work. Make slight adjustments instead of one complete move.
- ③ Retighten the three bolts.



DRAW. No. 4

ADJUSTMENT FOR INCREASING TORQUE

In order to achieve the maximum amount of torque from a Shimpo RK-2 Basic Wheel it is necessary that the drive cone be exactly perpendicular to the drive ring.

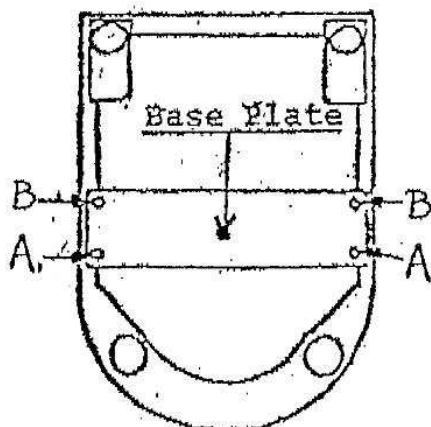
In order to achieve this perpendicular state you must adjust the base plate on which the motor is sitting. If the base plate has been moved then it is not holding the motor with its attached cone exactly perpendicular to the drive ring.

To adjust the base plate simple loosen the bolts holding the plate stationary so that you can move the plate. Slide the plate either forwards or backwards, whichever direction that will align the motor and its cone into its proper position. It should only be necessary to move the plate about a quarter of an inch in either direction to achieve this. (Unless, of course, it has either been severely jarred or moved out of its original alignment and not out of alignment due to normal use and operation).

Once you have adjusted the base plate check to make sure the cone is perpendicular and that the "cone breaking point" is resting on the drive ring with a slight amount of pressure. If this has been achieved then tighten the bolts to hold in this position.

Please refer to the attached diagrams.

Shimpo-West, Inc.
2-15-82



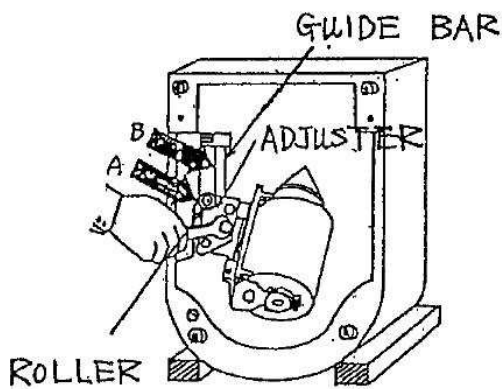
BASICALLY, YOU CAN GET ENOUGH TORQUE BY MOVING BASE PLATE TOWARD THE RING.

- 1) SCRATCH A LINE WITH A SHARP POINTED TOOL ALONG THE EDGE OF THE BASE PLATE ON EACH SIDE OF THE CASING.
- 2) LOOSEN BOTH BOLTS (A) ABOUT 2 ROTATIONS.
- 3) LOOSEN BOLT (B) ABOUT ONE ROTATION AND THEN SLIDE THE RIGHT SIDE OF THE BASE PLATE TOWARD THE RUBBER RING ABOUT 1 OR 2MM.
- 4) TIGHTEN BOLT (B).
- 5) REPEAT PROCEDURE 3 WITH BOLT (C).
- 6) TIGHTEN BOTH BOLTS (A) AND BOLT (C).
- 7) CHECK TO SEE WHETHER YOU HAVE THE DESIRED AMOUNT OF TORQUE. IF YOUR WHEEL STILL LACKS TORQUE, REPEAT FROM ITEM 1 TO ITEM 6 AGAIN.

* See supplemental page for more instructions.

SW SALES TOOL		REF #	SW - RK-026
		PAGE	1 / 1
TITLE	LUBRICATION FOR RK-2, ZB, ZC	ISSUE DATE	4 / 22 / 04
		MADE BY	

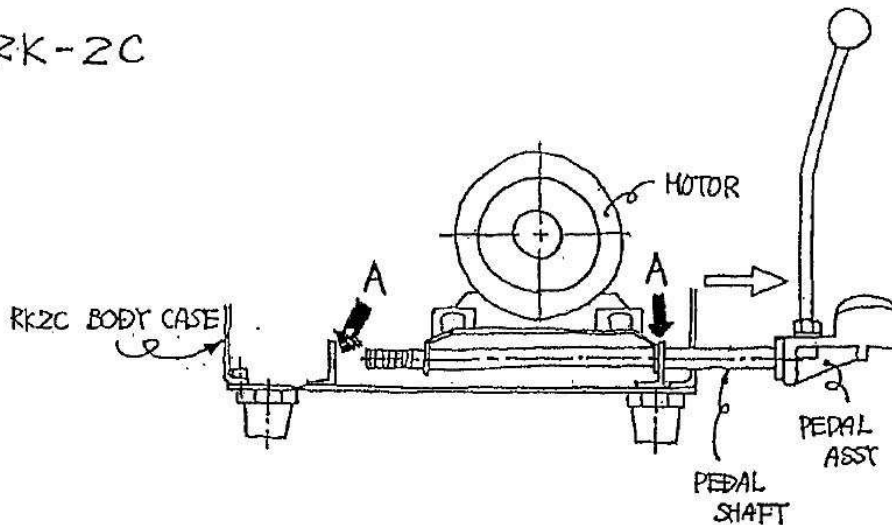
1. RK-2, RK-ZB



A: Add grease on ROLLER
each year

B: Add grease on GUIDE BAR
when Pedal does not work well.

2. RK-ZC



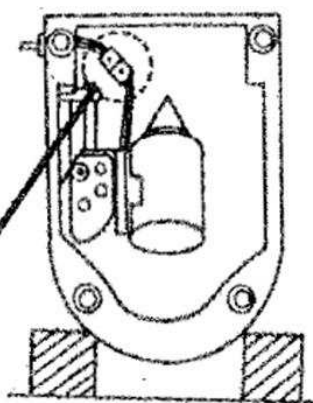
A: Add grease when Pedal does not work well.

HOW TO CHANGE DIRECTION OF ROTATION

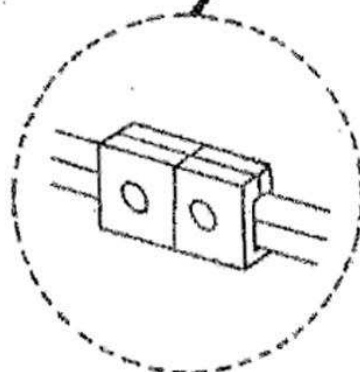
Clockwise rotation is possible if you require.

To do this:

1. Place pedal to "STOP" position and SWITCH OFF.
2. Set the wheel on end as shown in Draw. No. 3.
3. Change the connection of wires as follows:

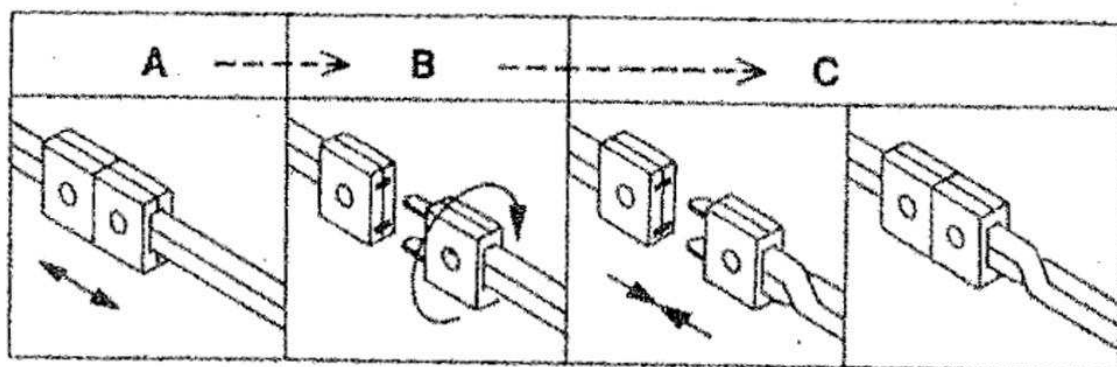


DRAW. No. 3



Wire connector;
controls the
direction of
rotation

PROCEDURE: A→C



SW SALES TOOL		REF #	SW - RK - 018
		PAGE	1 / 1
TITLE	STRANGE NOISE OF RK- 2 2B 2C	ISSUE DATE	2/24/94
		MADE BY	

High pitched squeal on
low speed position

Tapping sounds on
all speed positions

Replace Drive
Ring

*****High pitched squeal when ONLY the motor is on:
Need to replace motor**

NOISE RK-2 Series

High Squeal
Humming Sound
Thumping Sound

Replace Drive Ring

The thumping sound occurs because the cone is resting on the drive ring when the wheel is not in use. This causes an indentation in the drive ring.

Please make sure to push the pedal with your heel as far back as it will go when you finish working.

If you still have a problem adjust cone to drive ring (see attached sheet).

If the wheel is run approx. 20 minutes, any indentation should disappear.

VIBRATE / BINDING

Problem: At medium or high speed, intermittent binding causes top surface to jump

Tips forward and back - not every revolution

Solution:

1. Tighten or replace V Belt
2. May need new bearings.

If it vibrates in neutral: check for loose nuts and bolts.

If it vibrates while in use: may need new drive ring

If model is RK-2C: Replace non-vibration rubbers

VOLTAGE

If voltage is 208V, use 220V

Voltage is $\pm 10 - 15\%$.