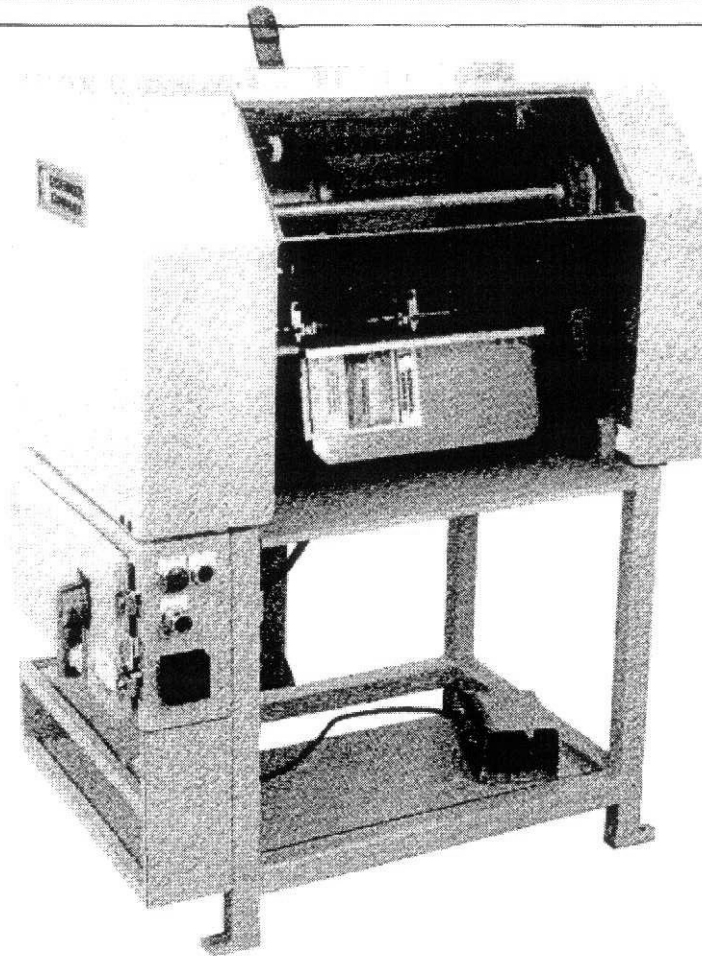


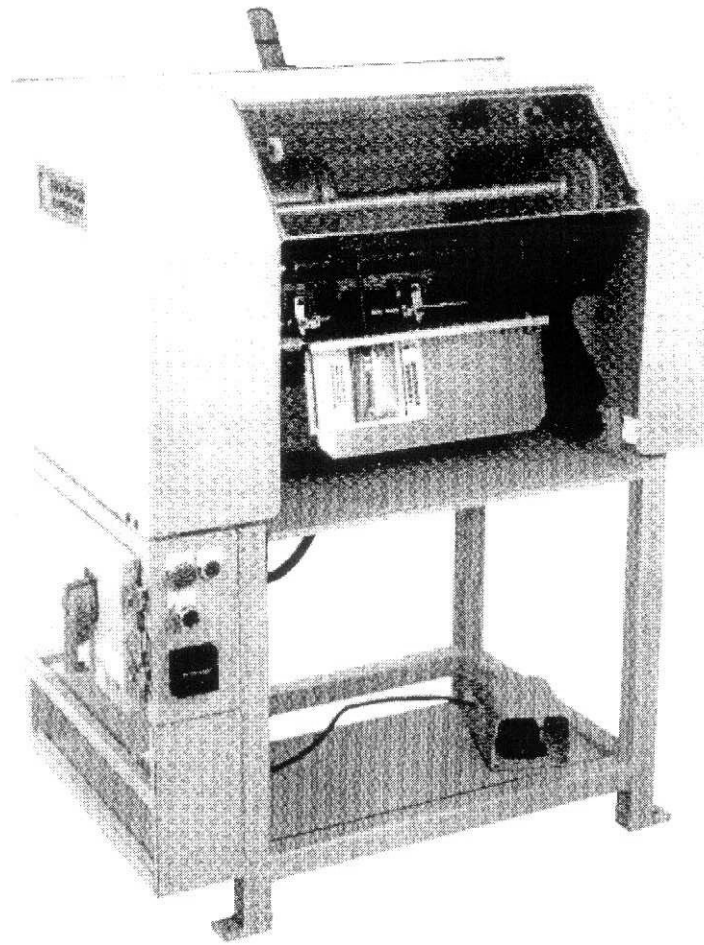


**SICKINGER
COMPANY**



**Model PS517
Model PS525**

**SEMI AUTOMATIC
COIL BINDER**
Operating Instructions



Model PS517 - 3'' to 17'' binding edge
Model PS525 - 3'' to 25'' binding edge

Semi Automatic COIL BINDER

These machines consistently outproduce other coil binders of this type and are virtually maintenance free. A preset digital wire length control cuts and tucks both ends of the coil to prevent snagging. The bound book is then released for operator removal. Digital wire length control allows precise wire length settings.

The Sickinger PS517 and PS525 machines were designed specifically for coil binding prepunched books

in tinned or coated wire. Wire feeds directly from a drum or spool and is automatically formed and inserted into the book. The entire cycle is automatic as soon as the operator places a prepunched book into position and presses the foot pedal. After the cycle begins, the operator's hands are free to pick up the next book.

SEMI AUTOMATIC COIL BINDER

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WARNING:

SUPERVISORS PLEASE NOTE:

*THESE PRECAUTIONS MUST BE FOLLOWED
WHEN OPERATING OR SERVICING THIS MACHINE.*

- ALL OPERATORS MUST BE PROPERLY TRAINED PRIOR TO USING THIS EQUIPMENT.
- READ INSTRUCTION MANUALS BEFORE OPERATING OR SERVICING THIS MACHINE.
- ONLY A TRAINED, QUALIFIED TECHNICIAN SHOULD SERVICE THIS MACHINE.
- DO NOT ATTEMPT SET-UP CHANGES UNLESS FULLY TRAINED.
- FOLLOW ALL STATE, LOCAL AND FEDERAL POWER LOCK OUT/TAG OUT STANDARDS WHEN SERVICING THIS EQUIPMENT.
- HAVING THE MACHINE UNDER POWER WHILE MAKING SET-UP CHANGES CAN RESULT IN SERIOUS BODILY INJURY. **ALWAYS DISCONNECT POWER** WHEN MAKING SET-UP CHANGES.
- NEVER OPERATE MACHINE WITHOUT ALL GUARDS IN OPERATING POSITION.
- MAKE SURE THE 5/8-11 DRUM TIGHTENING BOLTS, WHICH SECURE THE DRUM TO THE FRAME, ARE TIGHTENED BEFORE RUNNING THIS MACHINE.
- SAFETY GLASSES SHOULD BE WORN AT ALL TIMES WHEN OPERATING THIS MACHINE OR MANUALLY CLIPPING WIRE.
- KEEP HANDS AND ALL LOOSE CLOTHING AWAY FROM ALL MOVING PARTS.

SET- UP AND CHANGEOVER

The type of change you contemplate may require you to replace the front and rear combs, coiling tool assembly, the knives, coil hole hook, book placing fingers and wire. Check the tooling chart on page 8 to assure that you have all of the required parts.

Remove the coil hole hook and book placing finger.

Loosen the rear comb and remove the beater bar drive O-ring. Remove the front and rear combs if they are to be replaced.

Remove the coil tool nut and the coiling tool assembly.

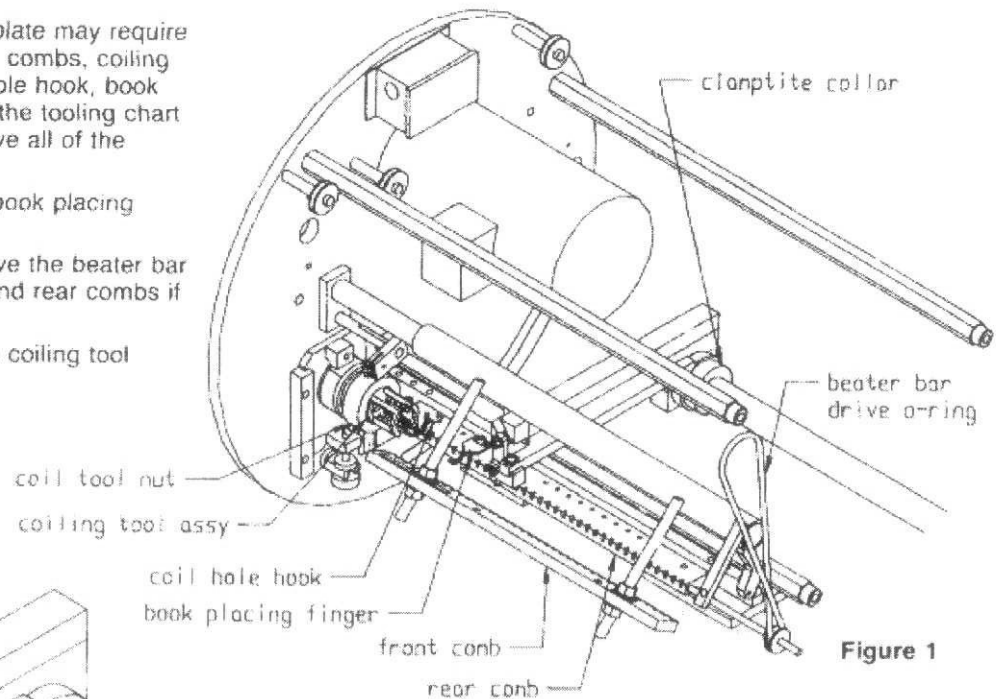


Figure 1

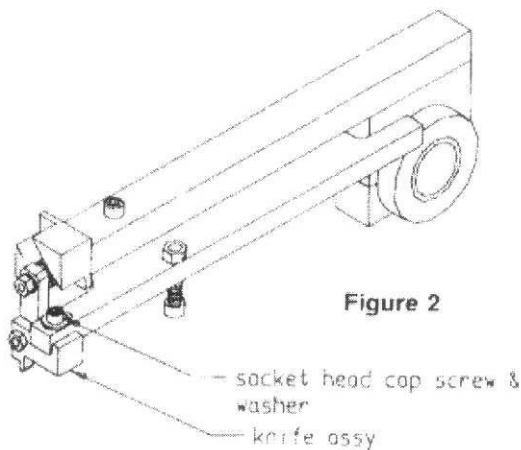


Figure 2

If the knives are to be changed, remove them at this time by removing the socket head cap screw.

Install new coiling tool mandrel. The roll pin in the coiling tool mandrel must be inserted into the slot in the coiling tool shaft. After inserting, rotate the coiling tool mandrel counter-clockwise (while holding the shaft), then tighten the mandrel draw bolt.

Install the coiling tool pins and clamp into place with the coil tool nut.

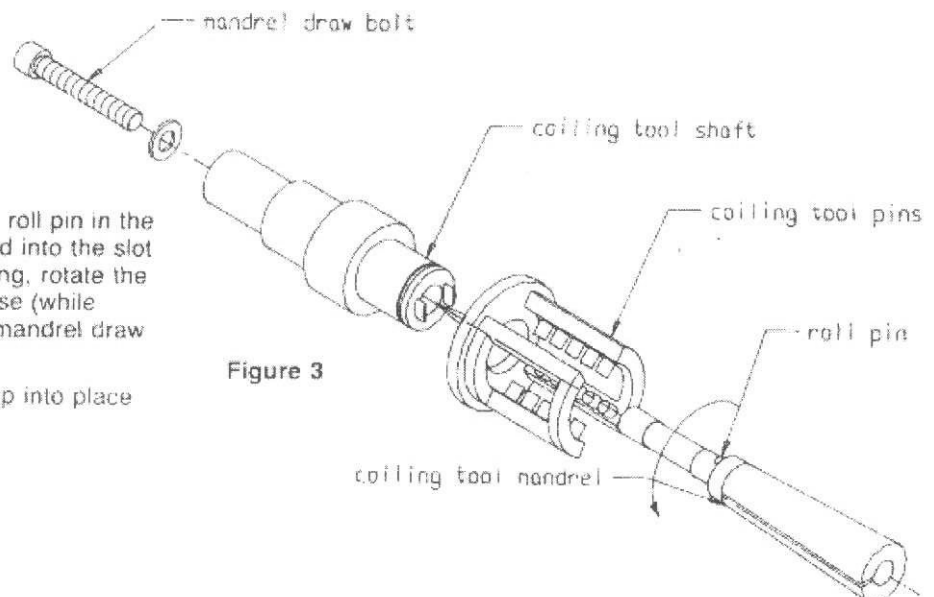


Figure 3

Go to the rear of the machine and start wire from the drum or spool. Note the direction of the de-reeling.

Check the anti-twist rollers to assure that they are installed in accordance with figure 4 relative to the way the wire is packed.

Wind one complete turn of wire around counter wheel before feeding into the wire straightener. Lubricate tinned wire with oil or soap and nylon coated wire with offset powder or soap. Be sure to remove all traces of oil when using nylon coated wire.

Pull wire straight into cabinet and inspect wire. If wire turns to the left of right, adjust horizontal wire rollers on wire straightener. If wire turns up or down, adjust vertical wire rollers on wire straightener. If wire rolls to left or right, adjust tension on anti-twist rollers.

Run wire over pulleys, through pitch guide and feed into the right side of the first pin at the rear of the coiling tool. (See figure 6). Continue threading the wire on the right side of each pin until all the pins have the wire on the right side.

Run a coil and remove from the PS517 machine.

Compare coil pitch to pitch of the punched holes in your book. Decide if coil pitch must be lengthened or shortened.

Adjusting Coil Pitch:

To lengthen: move the pitch guide to your left.

To shorten: move the pitch guide to your right.

If the pitch guide should rotate up or down, it will effect the pitch. Try to always keep the pitch guide at the same height.

After a pitch change, check the 2nd or 3rd coil. (disregard the 1st coil after a change).

Repeat the above procedure until the coil pitch and book pitch are equal.

Install the rear comb so that the first slot is in line with the first coil of the coiling tool.

Install the front comb so that the slots in the front comb are in line with the slots in the rear comb.

Install the book placing finger and coil hole hook, if required, on rear comb (Figure 1).

Place the second hole of the book on the coil hole hook. Inspect to assure that the front comb does not hit the hook.

Position the front and rear combs so that the coil is centered in the book. Move the combs in or out to get the desired position.

Insert book to be bound and close comb.

Loosen locking screw and adjust the height of the coil by turning the thumb screw until the coil is centered in the book. (See figure 7).

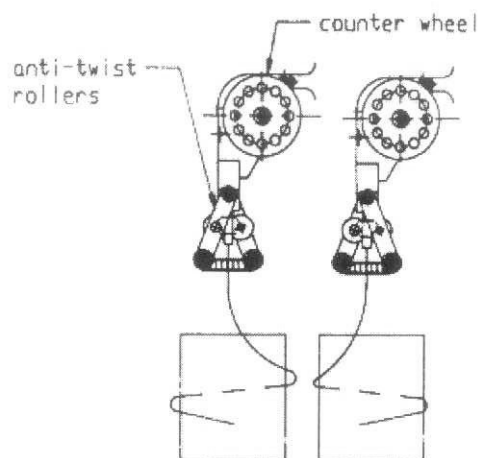


Figure 4

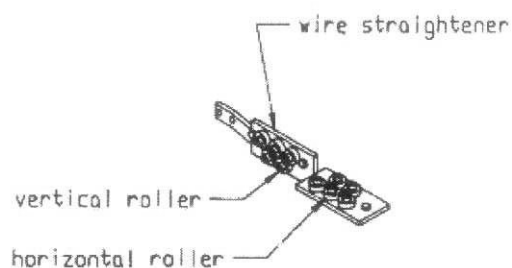


Figure 5

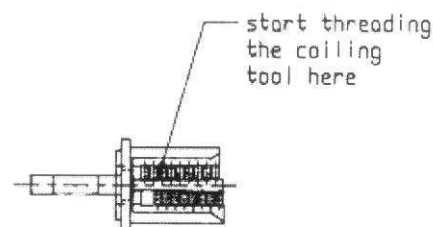


Figure 6

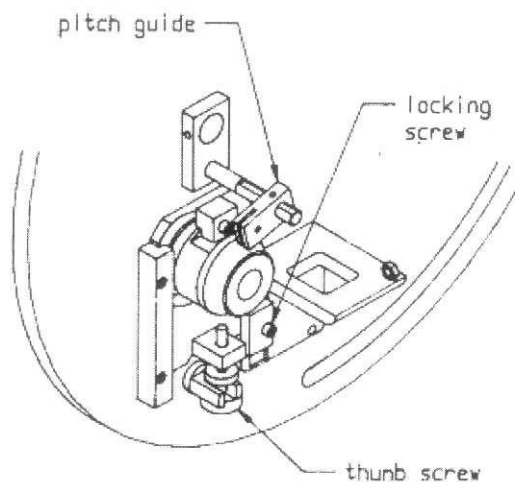


Figure 7

Install left and right knives.

Adjust the knife assembly's front to rear so that the tucking portion of the knife is centered on the wire coil.

Move the left knife holder so that the left knife is just over the first coil as it enters the book.

Turn adjusting bolt on knife holder so that the knife is deep enough to cut and tuck. Tighten lock nut.

Move the clamp-tight collar to knife actuator and tighten. (See figure 1, page 3). This will prevent the knife holder from moving out of position.

Lift the knife arm assembly so the adjusting bolt is about 3/8" above the tie bar. Tighten the screw on the clamp collar to lock the arm in place. (See figure 11).

Repeat the above steps for the right knife assembly.

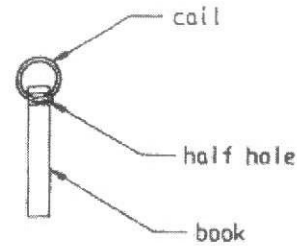


Figure 8

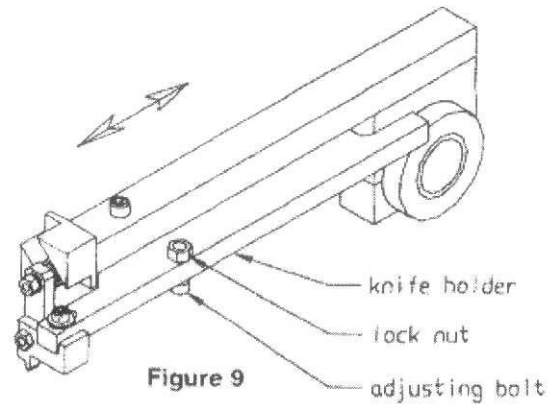


Figure 9

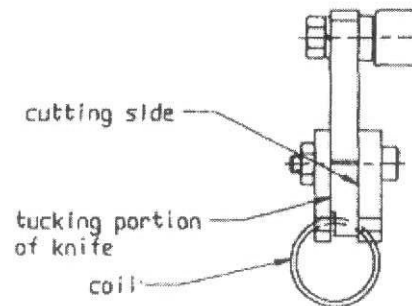


Figure 10

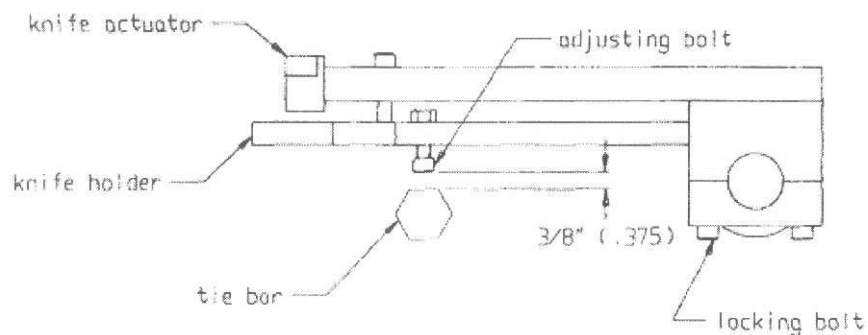
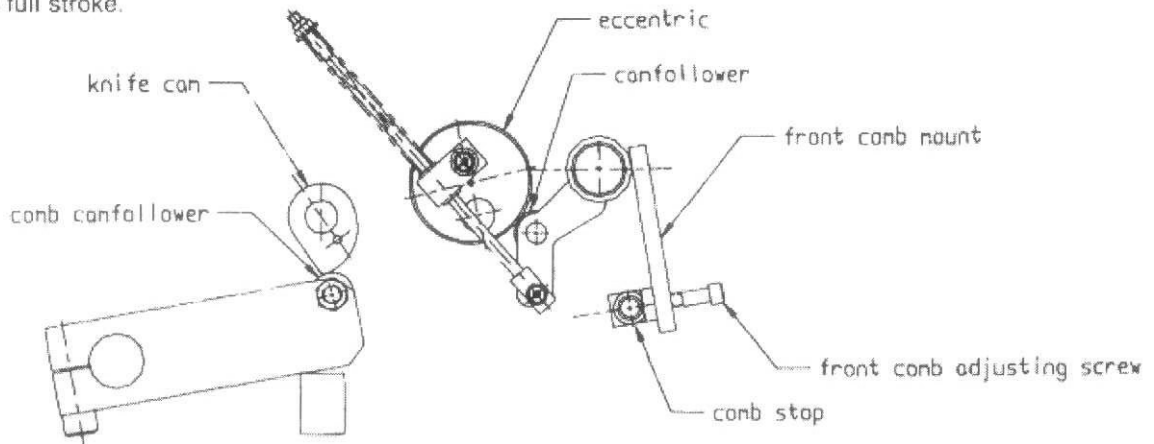


Figure 11

TIMING CAMS

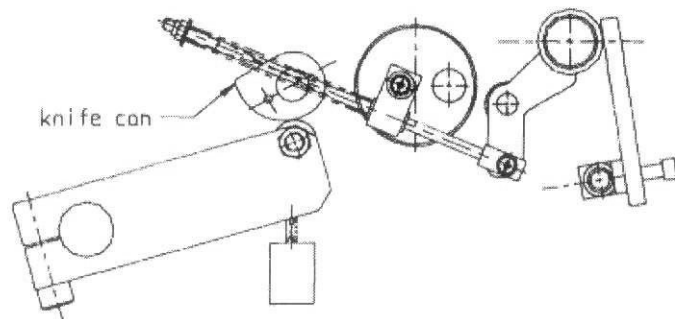
To time the machine properly, the knife cam and the eccentric should be aligned so that when the knife cam is at bottom dead center (the knife camfollower is in the lowest possible position), the eccentric should just touch the comb camfollower when the front comb mount is fully clamped in the furthest forward position. Check to assure that the front comb adjusting screw is fully retracted and is in contact with the comb stop. This is the position for the thinnest possible book. The front comb should not yet open when the knife cam is at its full stroke.



LOOKING AT THE INSIDE OF THE RIGHT HAND SIDE PLATE

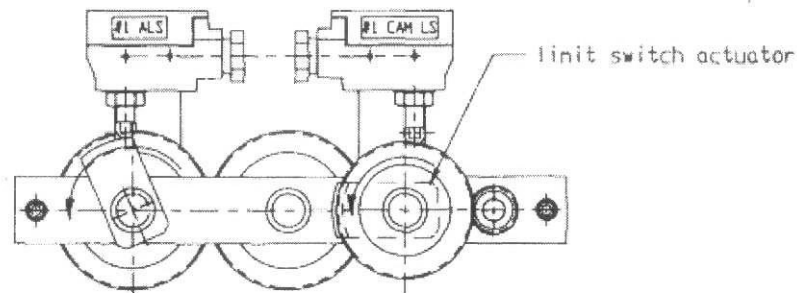
POSITIONING CAM FOR TIMING OF LIMIT SWITCH ACTUATORS

To properly adjust the limit switch actuators, the knife cam must be in the 9 o'clock position while the drum sits horizontal. (The drum must not be rotated).



LIMIT SWITCH ACTUATOR ADJUSTMENT

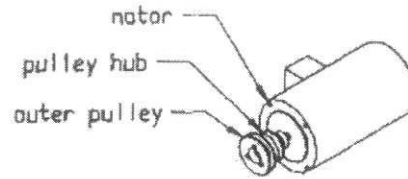
Adjust the #1 ALS limit switch actuator so the trailing edge is 1/4" from coming off. Adjust the #1 LS limit switch actuator so that it is in the 9 o'clock position.



LOOKING AT THE OUTSIDE OF THE RIGHT HAND SIDE PLATE.

SPEED CHANGE

The PS517 Coil binders are equipped with a 2 part motor pulley. The outer pulley is mounted directly onto the pulley hub.



Slowest Speed 0010028200

It is recommended that when using coils of 30mm and larger, a different pulley arrangement be used. Remove the pulley hub, the clutch, the sheave and the V-belt. Install the new sheave assembly (0500046 with bearings 4850855 pre-installed) on the spiral shaft. Place the clutch assembly back on the shaft. Install the new motor sheave on the motor shaft. Install the new V-belt.

Slower Speed 0010021300

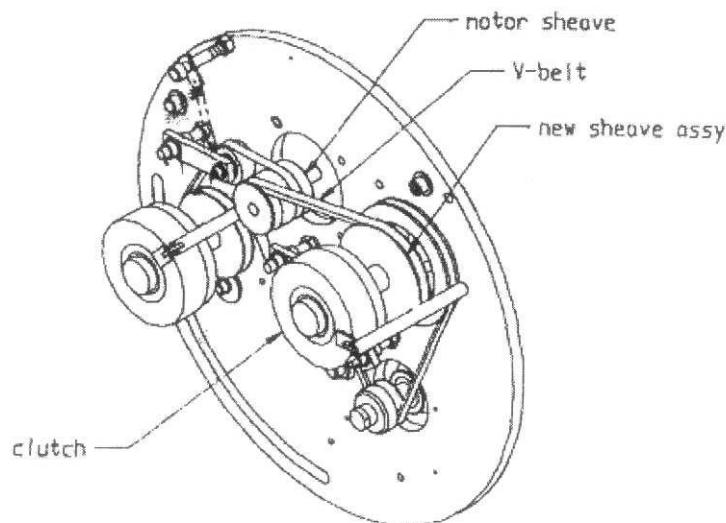
Slower speed gives better control of larger diameter coils 20-27½mm diameter and larger in .312 pitch, and is also beneficial with large diameter coils in .250 pitch which have at times been delivered as specials. (22½ -24 and larger).

Standard Speed 0010021100

Provides for proper speed of the coiling tool for most sizes and pitches of coils.

Faster Speed 0010021200

Is recommended for higher production of thin books with 10mm or smaller coil sizes, particularly for calendars.



COIL BINDER TOOLING CHART

MACHINE MODELS
PS517 PS525

BOOK THICKNESS MM INCH		PITCH	COIL O.D. MM	WIRE DIA	PUNCHING TOOL NUMBER	COILING TOOL NUMBER	KNIFE ASSY. (2 REQ.)	BOOK PLACING FINGER	HOOKE	COMBS		F R
										PS517	PS525	
3	1/8	.200 (5:1)	6.5	.028	0312311300	0230065500	0290012800	0237017000	S	0240529000 0240529100	0240329000 0240329100	F R
4	5/32		8	.031		0230085000				0240106100 0240106200	0240306100 0240306200	F R
6	1/4		10			0230105000						
8	5/16		12			0230125000						
10	13/32	.250 (4:1)	14	.037	0312020700	0230144000	0290012900	0237006300	A	0240106300 0240106200	0240306300 0240306200	F R
12	15/32		16			0230164000						
14	9/16		18			0230184000						
16	5/8		20			0230204000						
18	11/16	.312 (3.2:1)	22.5	.047	0312180100	0230225300	0290026300	0237001300	C	0240106500 0240106600	0240306500 0240306600	F R
19	3/4		25			0230253100						
21	7/8		27.5			0230275300						
25	1		30			0230303100						
27	1-1/16		33			0230333100						
29	1-1/8		35			0230353100						

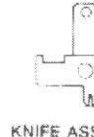
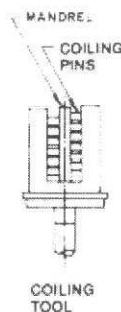
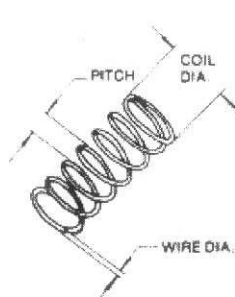
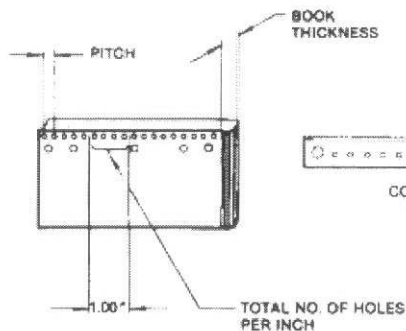
[1] IT MAY BE NECESSARY TO USE ONE COIL DIAMETER LARGER THAN INDICATED, DEPENDING ON MATERIAL QUALITY.

[2] A NEW COLLAR IS REQUIRED TO HOLD IN TOOLING. ORDER #0010042200 COLLAR ASSEMBLY FOR COILING TOOLS OVER 30mm.

[3] EXTRA LARGE TUCK KNIVES AVAILABLE. ORDER #0290050900 FOR 22½mm COILS AND UP.

[4] REQUIRES OPTIONAL MOTOR PULLEY #0010021300 FOR SLOWER COIL SPEED.

[5] THIS SIZE REQUIRES A #0237003000 BOOKSTOP, INSTEAD OF A HOOK.



THIS DATA IS SUBJECT TO CHANGE WITHOUT NOTICE AND IS TO BE USED AS A GUIDELINE ONLY