

OWNER'S MANUAL



B702ST HEAVY DUTY WOOD SHAPER WITH SLIDING TABLE







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GENERAL SAFETY INSTRUCTIONS

EXTREME CAUTION SHOULD BE USED IN OPERATING ALL POWER TOOLS. KNOW YOUR POWER TOOL, BE FAMILIAR WITH ITS OPERATION. READ THE OWNER'S MANUAL AND PRACTICE SAFE USAGE PROCEDURES AT ALL TIMES.

- **CONNECT** your machine **ONLY** to the matched and specified power source.
- WEAR SAFETY GLASSES, RESPIRATORS, HEARING PROTECTION and SAFETY SHOES when operating this machine.
- DO NOT wear loose clothing or jewellery when operating machinery.
- A Safe Environment is important. Keep the area free of dust, dirt and other debris in the immediate vicinity of the machine.
- BE ALERT! Do Not Use prescription or other drugs that may affect your ability or judgement to safely use this machine.
- DISCONNECT the power source when changing drill bits, hollow chisels, router bits, shaper heads, blades, knives or making other adjustments or repairs.
- **NEVER** leave an operating tool unattended.
- **NEVER** reach over the table when the tool is in operation.
- **NEVER** make crosscuts with the rip fence in place.
- **NEVER** attempt cut material that is warped or twisted.
- □ ALWAYS keep blades, knives or bits sharp and properly aligned.
- **ALWAYS** keep all safety guards in place and ensure their proper function.
- **ALWAYS** use push sticks and featherboards to safely feed your work through the machine.
- **ALWAYS** make sure that any tools used for adjustments are removed before operating the machine.
- □ ALWAYS secure your work with the appropriate clamps or vises.
- ALWAYS keep bystanders safely away while operating machinery.
- **THINK SAFETY. WORK SAFELY.** Never attempt a procedure if it does not feel safe or comfortable.



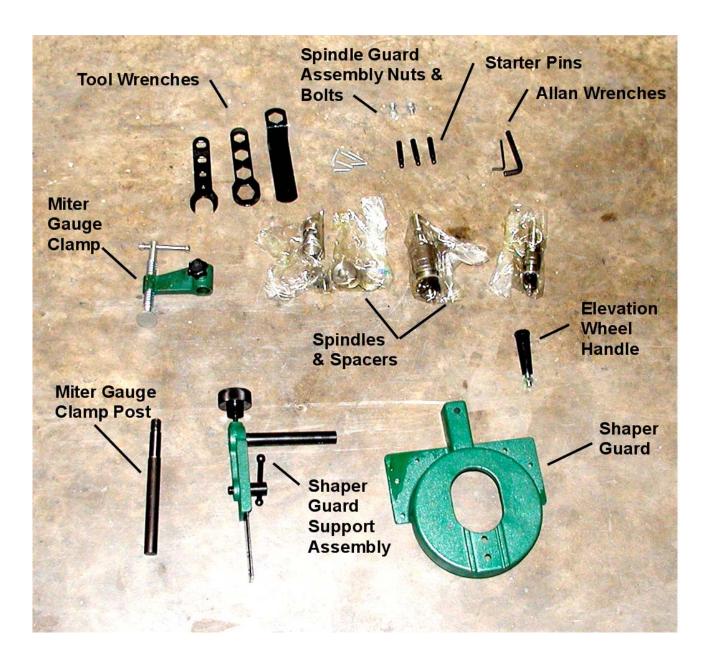
INTRODUCTION

As part of a growing line of Craftex woodworking equipment, we are proud to offer you the B702ST Heavy-Duty Wood Shaper. The Craftex name guarantees *Craft Excellence*. By following the instructions and procedures laid out in this owner's manual, you will receive years of excellent service and satisfaction. The B702ST Shaper is a professional tool, and like all other power tools, proper care and safety procedures should be adhered to.

- □ Motor, 3 Horsepower.
- □ Voltage, 220 volt, Single Phase.
- Cast-Iron Table.
- □ Cast-iron Sliding Extension Table with 28" Travel.
- Magnetic Starting Switch.
- Magnetic Reversing Switch.
- □ Speeds, 7,000 and 10,000 RPM's.
- Belt Drive with 2-Stage Pulleys.
- \square Spindle Sizes, 1/2", 3/4" and 1".
- □ Spindle Travel, 3".
- □ Spindle Table Openings, 1 1/2", 3", 4 1/4".
- □ Two Independently Adjustable Hardwood Fences.
- □ Adjustable Spindle Guard.
- □ Four Adjustable Hold-Down-Hold-In Clamps.
- Attached Miter gauge with Positive Stops and Hold-Down Clamps.
- □ Three Starter Pins Included.
- □ Cast-Iron Spindle Guard.
- □ Table Size with Extension, 28" x 24"
- □ Table Height, 34".
- Gross Weight, 220kg.



PACKAGING CONTENTS





B702ST ASSEMBLY INSTRUCTIONS

Carefully disassemble the wooden crate and discard. Do not remove the shipping base at this time unless the tool is in its final position. The base may prove to be useful when moving the tool.

Remove the cabinet access door by undoing the threaded knob on the door panel.

Remove the cardboard parts carton from the interior of the cabinet and set aside.

The B702ST is shipped fully assembled with a few minor exceptions.

The B702ST is shipped with a protective coating on it and this should be removed with mineral spirits before proceeding further. The spindle guard/fences should be removed to facilitate the cleaning and this is done through the bolt access holes as shown.

Some components in the parts carton should be cleaned as well. Be sure to clean <u>all</u> areas so as not to contaminate any work pieces that you will be using.

Reassemble after cleaning.

The Sliding Miter Gauge Table is in its 'Locked' position and should be unlocked to facilitate cleaning as well by turning the lock tabs located on the ends of it.

From the parts carton, select the miter gauge clamp post and install it on the miter gauge of the sliding table. Install the hold-down clamp onto the post as pictured.



Acces Pane Screy Knob





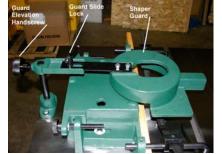


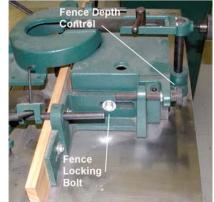
B702ST ASSEMBLY INSTRUCTIONS Continued

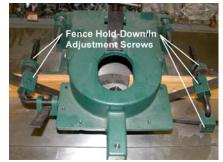
Select the spindle guard and the spindle guard assembly. Attach the guard to the assembly using the two hex bolts and the corresponding nuts. Install the post of the guard assembly into the bracket at the rear of the shaper as shown.

Adjust the Shaper Fences independently with the fence adjusting Knurled knobs to suit your particular operation. Loosen the fence locking bolts to adjust and then re-tighten them.

Adjust the Hold-Down/Hold-in Clamps to suit your particular operation by loosening the Allen Screws on the clamp rods with the Allen wrench provided.







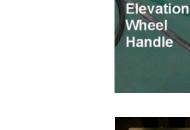
B702ST ASSEMBLY INSTRUCTIONS Continued

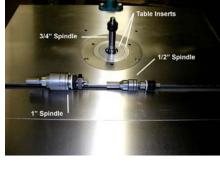
Install the Elevation Wheel Handle on the elevation wheel.

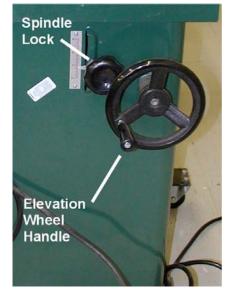
Installing The Shapers

The B702ST accepts 1/2", 3/4" and 1" shaper spindles as well as 1/2" and 1/4" shank router bits (with the optional Router Bit Adapter Kit, Craftex Part No.B702CA).

The B702ST is fitted with a 3/4" spindle at the factory and may already have some spacers on it. To use this size spindle, remove the table insert(s) as required for the size of the cutter that you intend to use. Remove the upper locknuts from the spindle and install the required spacers or rub collar and cutter. Replace the locknuts and tighten securely. 9









B702ST ASSEMBLY INSTRUCTIONS Installing The Shapers

To install a different size spindle, raise the spindle and then remove the existing one by loosening the spindle lock knob and removing the nut on the spindle lock-down rod under the shaper table. Lift the spindle assembly up and out of the machine. Remove the spindle rod by unscrewing it.

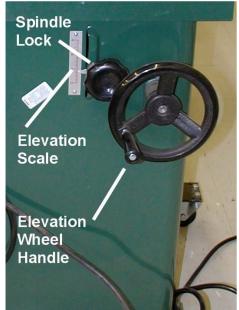
Select the shaper spindle of your choice, the required spacers or rub collars and assemble them onto the spindle and tighten the upper locknuts. Install the appropriate table insert plate(s). Install the spindle rod on the spindle and insert the assembly through the shaft. Install and tighten the spindle rod nut.

Adjust the spindle elevation height as required and tighten the spindle lock knob.

To install the optional router bit collet, refer to the instructions included with the part. However, the router bit collet must always rotate counter-clockwise. Failure to do so may cause it to loosen and possibly cause personal injury or damage.

& Belt





B702ST ASSEMBLY INSTRUCTIONS Continued Installing The Shapers

Changing Speeds

To change speeds on the B702ST Shaper, first open the access panel and move the motor belt up or down on the spindle pulley and on the corresponding motor pulley.

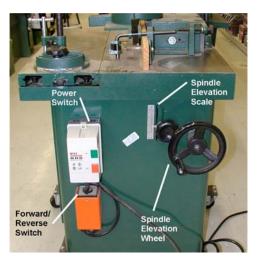
Electrical Power

The B702ST operates on 220 volt, single phase and may be hard wired to the corresponding power supply or the appropriate power plug (not supplied).

WARNING, Do not change spindles, shaper cutters or make any changes to the machine while the machine is connected to the electrical power source.

The B702ST is equipped with a magnetic on/off switch located on the lower right-hand side of the machine cabinet.

The B702ST is also equipped with a forward/reverse switch below the on/off switch. <u>The shaper must be turned off and the spindle stopped before changing directions.</u>

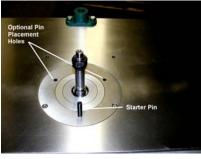




B702ST OPERATING INSTRUCTIONS

BEFORE CONNECTING THE B702ST SHAPER TO A POWER SOURCE OR TURNING THE MACHINE ON, THE FOLLOWING SAFETY MEASURES SHOULD BE CHECKED.

- □ Make certain that you are connecting the machine to the correct power source.
- Make certain that the spindle and the shaper cutters are securely tightened and that the spindle lock-down nut is tight.
- Make certain that the shaper head guard is in place and that the hold-down and hold-in clamps are in place and secure or, alternatively, a starter pin in position.



- Make certain that the shaper cutter is correctly positioned for the work you plan to do and that the elevation does not interfere with the table inserts.
- □ Make certain that the table inserts are flush with the table top.
- Make certain that the out-feed side of the fence is correctly adjusted with the fence depth control.
- □ Make certain that the spindle lock-knob is securely tightened.
- Make certain that the correct rotation of the spindle has been selected and make certain that you work is fed <u>against</u> the rotation of the shaper cutters.



B702ST OPERATING INSTRUCTIONS USING THE FENCE

The safest way of using the shaper is with the split fence in position. It is the safest way of producing straight cuts. To adjust the fence, first loosen the fence-locking bolt and then rotate the fence depth control. When positioned, tighten the fence-locking nut.

For shaping where the width of the wood will not be altered, the two fences <u>must</u> be on the same plane. This should be verified with a straight edge <u>before</u> installing the shaper cutter. The fences should be set so that your work clears the body of the shaper cutters.

For shaping where the edge of the work will be removed such as in jointing or doing a full bead, the out-feed fence <u>must</u> be adjusted forward so that your work piece benefits from the support of the out-feed fence.

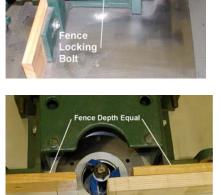
USING THE RUB COLLARS AND THE STARTING PIN

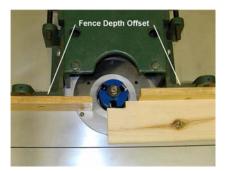
When shaping without the use of the split fence, rub collars <u>must always be used</u>. The rub collars may be placed in a variety of positions on the shaper spindle above or below the shaper cutter. A rub collar must be placed so that the work piece makes full contact with it as it is being shaped.

The starter pin acts as a fulcrum to brace your work as it is being fed into the shaper cutter. The work must always be fed <u>against the shaper cutter rotation</u>.



Fence Depth





B702ST OPERATING INSTRUCTIONS USING THE SLIDING MITER GAUGE TABLE

The sliding miter gauge table is designed to provide with accurate wood shaping across the grain or where 'with the grain' shaping is desired without the use of the out-feed fence. In either case, your work <u>must</u> be secured with the miter gauge clamp.

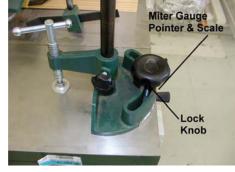
To change the angle of the miter gauge, loosen the lock knob and rotate the gauge to the desired point. Tighten the knob securely.

You may wish to add a length of hardwood to the face of the miter gauge to provide a longer surface. Screw holes are provided on the gauge face for this purpose.

The sliding table slides the full length of the shaper table and there are locks provided at both ends of the table to restrict this movement if so desired. To restrict the back movement of the table, rotate the left-hand (facing the table) lock knob. Do the same to restrict the forward travel. To keep the table stationary, engage both table locks.

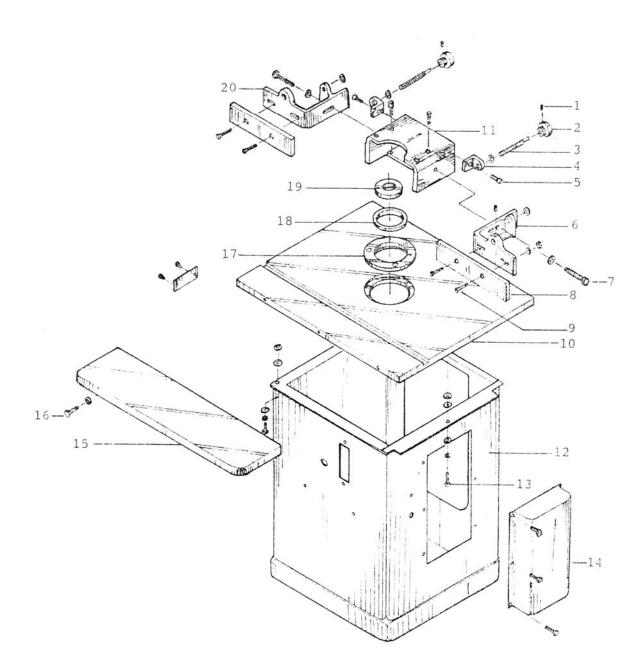
nger surface. Screw noies are provided on the gauge face for this purpose.







B702ST WOOD SHAPER CABINET SCHEMATIC



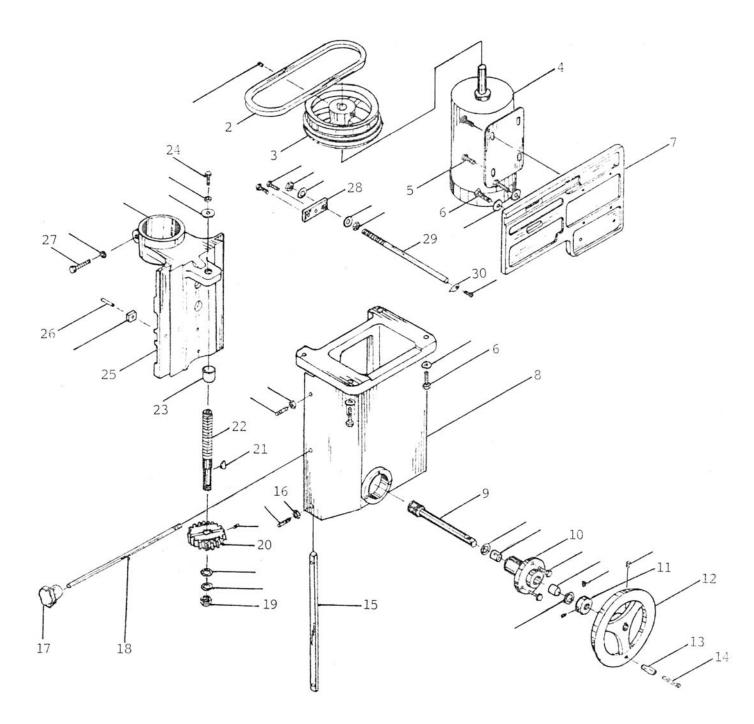


B702ST CABINET PARTS LIST

Number	Description	Part Number	Quantity
1	Socket Set Screw	P702/1	2
2	Adjusting Knob	P702/2	2
3	Adjusting Screw	P702/3	2
4	Fence Bracket	P702/4	2
5	Locking Bolt	P702/5	2
6	Fence Mounting Bracket (R.H.)	P702/6	1
7	Bracket Lock Bolt	P702/7	2
8	Fence Board	P702/8	2
9	Flat head machine Screws	P702/9	4
10	Shaper Table	P702/10	1
11	Shaper Guard Body	P702/11	1
12	Cabinet Housing	P702/12	1
13	Bolts – Cabinet to Table Top	P702/13	3
14	Motor Cover	P702/14	1
15	Extension Table	P702/15	1
16	Extension table Bolts	P702/16	3
17	Shaper Table Insert Plate	P702/17	1
18	Shaper Table Insert Plate	P702/18	1
19	Shaper Table Insert Plate	P702/19	1
20	Fence Mounting Bracket (L.H.)	P702/20	1



B702ST WOOD SHAPER MOTOR ASSEMBLY SCHEMATIC DRAWING

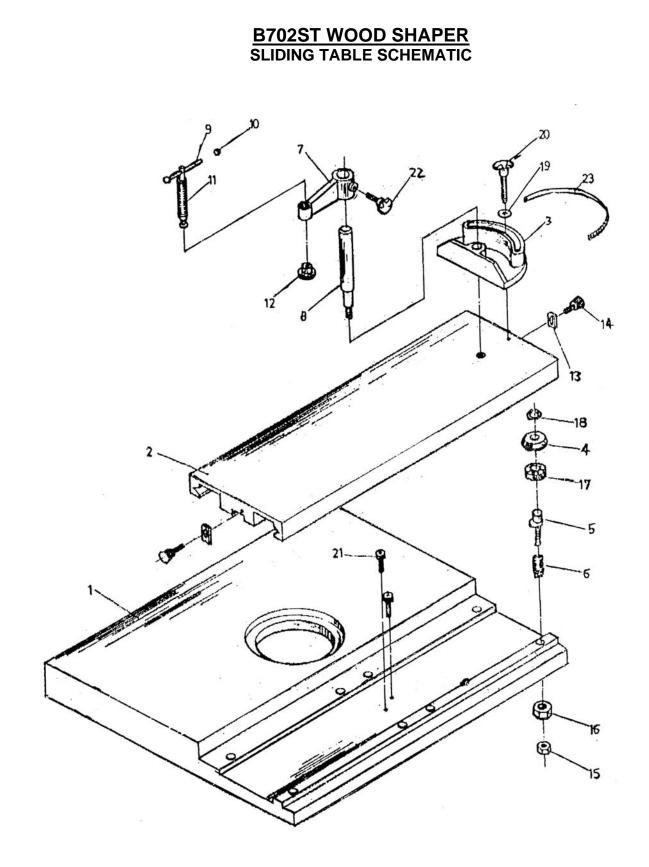




B702ST WOOD SHAPER MOTOR ASSEMBLY PARTS LIST

Number	Description	Part Number	Quantity
2	V Belt – 7M-710	P702/21	1
3	2 Speed Motor Pulley	P702/22	1
4	Motor – 3 HP Single Phase – 220 Volt	P702/23	1
5	Motor Base Machine Screws	P702/24	4
6	Machine Bolts – Motor Base to Body	P702/25	6
7	Motor Base	P702/26	1
8	Shaper Base	P702/27	1
9	Pinion	P702/28	1
10	Adj. Shaft Bushing	P702/29	1
11	Collar	P702/30	1
12	Hand Wheel	P702/31	1
13	Handle	P702/32	1
14	Threaded Pin	P702/33	1
15	Gib Head Slide	P702/34	1
16	Gib Screws & Jamb Nuts	P702/35	2
17	Shaft Lock Knob	P702/36	1
18	Shaft Lock	P702/37	1
19	Lock Nut	P702/38	1
20	Spiral Head Raising Gear	P702/39	1
21	Woodruff Key	P702/40	1
22	Elevating Screw	P702/41	1
23	Spacer	P702/42	1
24	Retaining Screw	P702/43	1
25	Head Slide	P702/44	1
26	Motor Base Key	P702/45	1
27	Bolt	P702/46	1
28	Pointer Base	P702/47	1
29	Pointer Rod	P702/48	1
30	Pointer	P702/49	1





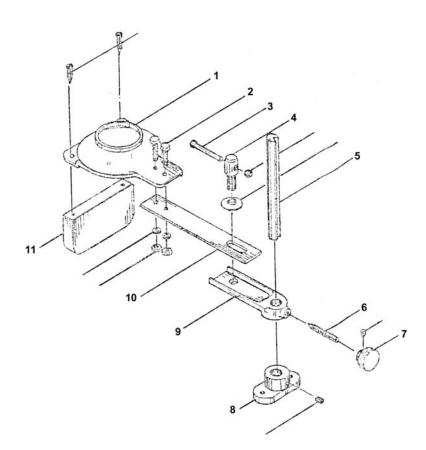


B702ST WOOD SHAPER SLIDING TABLE PARTS LIST

Number	Description	Part Number	Quantity
1	Shaper Table	ST-01	1
2	Sliding Table	ST-02	1
3	Miter Gauge	ST-03	1
4	Slide Wheel	ST-04	8
5	Eccentric Shaft	ST-05	8
6	Micro Adjusting Screw	ST-06	8
7	Index Lock Set	ST-07	1
8	Lock Spindle	ST-08	1
9	Clamp Handle	ST-09	1
10	Handle Ball	ST-10	2
11	Lock Arbor	ST-11	1
12	Loose Washer	ST-12	1
13	Table Lock Nut	ST-13	2
14	Table Lock Knob	ST-14	2
15	Hex Nut	ST-15	8
16	Lock Nut	ST-16	8
17	Wheel Bearing	ST-17	8
18	Clip	ST-18	8
19	Washer	ST-19	1
20	Miter Gauge Lock Knob	ST-20	1
21	Machine Screw	ST-21	2
22	Hold-down Lock Knob	ST-22	1
23	Miter Gauge Index Ring	ST-23	1



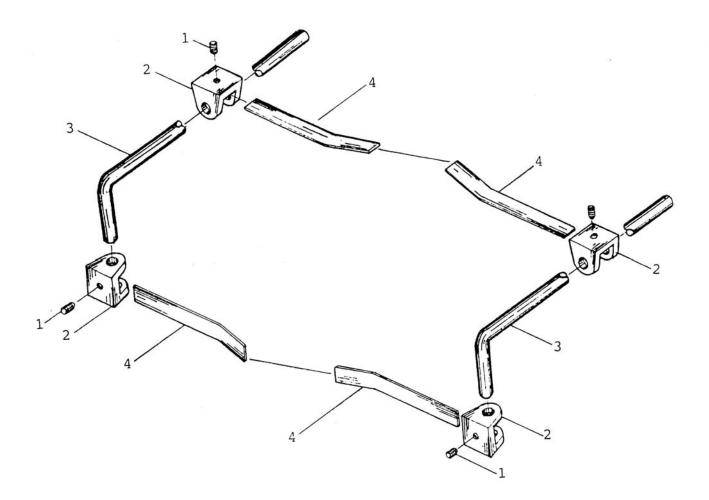
B702ST WOOD SHAPER SHAPER GUARD SCHEMATIC & PARTS LIST



Number	Description	Part Number	Quantity
1	Ring Guard	P702/82	1
2	Hex Head Bolt	P702/83	2
3	Lock Screw Handle	P702/84	1
4	Lock Screw	P702/85	1
5	Elevation Rod	P702/86	1
6	Set Screw (60 degree point)	P702/87	1
7	Knurled Adjusting Knob	P702/88	1
8	Shaper Guard Bracket	P702/89	1
9	Adjustable Shaper Guard Bracket	P702/90	1
10	Adjustable bar	P702/91	1
11	Guard Support (Not Included)		



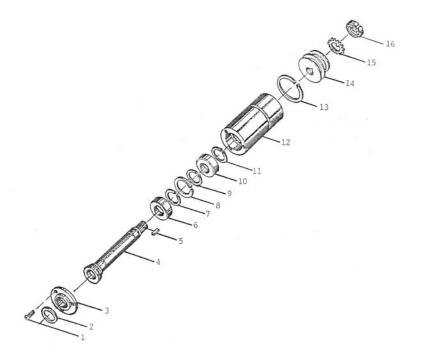
B702ST WOOD SHAPER HOLD DOWN SCHEMATIC & PARTS LIST



Number	Description	Part Number	Quantity
1	Socket Screw	P702/78	4
2	Spring Clamp	P702/79	4
3	"L" Rod	P702/80	2
4	Hold Down/Hold In Spring	P702/81	4

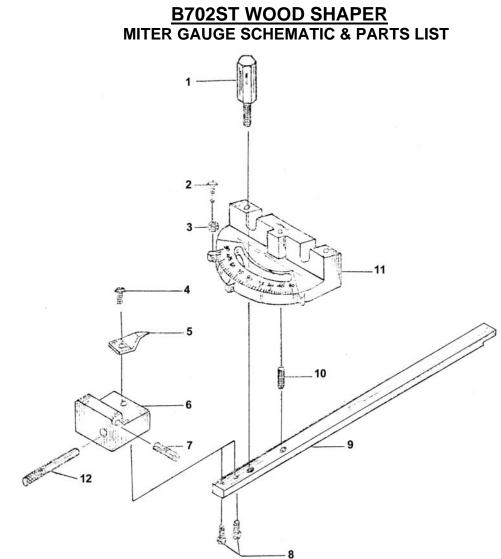


B702ST WOOD SHAPER INTERCHANGEABLE SPINDLE SCHEMATIC



Number	Description	Part Number	Quantity
1	Retainer Screw	P702/50	1
2	Retainer Ring	P702/51	1
3	Retainer Ring	P702/52	1
4	Interchangeable Spindle	P702/53	1
5	Key	P702/54	1
6	Bearing	P702/55	1
7	CIR Clip	P702/56	1
8	Retainer	P702/57	1
9	CIR Clip	P702/58	1
10	Bearing	P702/59	1
11	Retainer	P702/60	1
12	Quill	P702/61	1
13	Quill retainer Ring	P702/62	1
14	Spindle Pulley	P702/63	1
15	Lock Washer	P702/64	1
16	Lock Nut	P702/65	1





Number	Description	Part Number	Quantity
1	Miter Gauge Knob	P702/66	1
2	Stop Screw	P702/67	1
3	Jamb Nut	P702/68	1
4	Pointer Screw	P702/69	1
5	Pointer	P702/70	1
6	Pointer Block	P702/71	1
7	Retainer pin	P702/72	1
8	Guide Bar Screws	P702/73	2
9	Guide Bar	P702/74	1
10	Pivot Pin	P702/75	1
11	Miter Gauge	P702/76	1
12	Stop Pin	P702/77	1



B702ST WOOD SHAPER ACCESSORIES

This page provides you with a brief look at some of the accessories that Busy Bee Tools has to offer for your B702ST Wood Shaper. In addition to those listed below, consult the latest Busy Bee Tools Catalogue, visit a Busy Bee store nearest to you, or check out *busybeetools.com*

D2058 – Mobile Base

Extra heavy-duty 1200 lbs. Capacity



B2216 – Safety Combo Pack

- 2 Push Pads
- 1 Push Stick
- 1 5pc Dust Mask
- 1 Pair of safety glasses
- 1 pair of ear plugs



CRAFTEX - Dust Collection Systems

These powerful lower noise factor dust collection systems are portable or may be set up in semipermanent locations. Rigid pipe connectors are ideal for fixed installations with flex pipe to machine. Shake dust from top bag and remove dust and chips from lower bag only. New dust bags reduce to 1 micron the size of dust particles entering your workplace from the collector. New polyethylene (lower) bags are transparent and allow visual inspection of the contents.



<u>CT029N</u> – 1 HP,110V,1PH 825CFM, 62dB 1 Micron bag 3 Year Warranty



<u>CT030</u> – 2HP, 220V, 1PH 1596 CFM, 77dB **1 Micron bag 3 Year Warranty**



<u>CT031</u> – 3 HP, 220V, 1PH 2300 CFM, 85 dB *1 Micron upper bags 3 Year Warranty*





WARRANTY

CRAFTEX 2 YEAR WARRANTY

Craftex warrants every product to be free from defects in materials and agrees to correct such defects where applicable. This warranty covers <u>two years</u> for parts and 90 days for labour (unless specified otherwise), to the original purchaser from the date of purchase but does not apply to malfunctions arising directly or indirectly from misuse, abuse, improper installation or assembly, negligence, accidents, repairs or alterations or lack of maintenance.

Proof of purchase is necessary.

All warranty claims are subject to inspection of such products or part thereof and Craftex reserves the right to inspect any returned item before a refund or replacement may be issued.

This warranty shall not apply to consumable products such as blades, bits, belts, cutters, chisels, punches etcetera.

Craftex shall in no event be liable for injuries, accidental or otherwise, death to persons or damage to property or for incidental contingent, special or consequential damages arising from the use of our products.

RETURNS, REPAIRS AND REPLACEMENTS

To return, repair, or replace a Craftex product, you must visit your nearest Busy Bee Tools showroom. Craftex is a brand of equipment that is exclusive to Busy Bee Tools.

For replacement parts directly from Busy Bee Tools, for this machine, please call 1-800-461-BUSY, and have your credit card and part number handy.

All returned merchandise will be subject to a minimum charge of 15% for re-stocking and handling with the following qualifications.

- Returns must be pre-authorized by us in writing.
- We do not accept *collect* shipments.
- Items returned for warranty purposes must be insured and shipped pre-paid to the nearest warehouse (see locations on inside back cover of this manual).
- Returns must be accompanied with a copy of your original invoice as proof of purchase. Returns must be in an un-used condition and shipped in their original packaging a letter explaining your reason for the return. Incurred shipping and handling charges are not refundable.
- o Busy Bee will repair or replace the item at our discretion and subject to our inspection.
- o Repaired or replaced items will be returned to you pre-paid by our choice of carriers.
- Busy Bee reserves the right to refuse reimbursement or repairs or replacement if a third party without our prior authorization has carried out repairs to the item.
- o Repairs made by Busy Bee are warranted for 30 days on parts and labour.
- Any unforeseen repair charges will be reported to you for acceptance prior to making the repairs.
- The Busy Bee Parts & Service Departments are fully equipped to do repairs on all products purchased from us with the exception of some products that require the return to their authorized repair depots. A Busy Bee representative will provide you with the necessary information to have this done.
- For faster service it is advisable to contact the nearest Busy Bee location for parts availability prior to bringing your product in for repairs.



BUSY BEE TOOLS - - - SHOWROOMS - Coast to Coast

<u>Head Office</u> 355 Norfinch Drive, North York, Ontario, M3N 1Y7 Tel. - 416-665-8008, Fax – 416-665-8337

<u>Vancouver</u>

30 Braid Street, New Westminister, British Columbia, V3L 3P3 *Tel.* – 604-517-3922, *Fax* – 604-517-8272

<u>Mississauga</u> 6325 Dixie Rd. Unit 6 & 7, Mississauga, Ontario, L5T 2E5 Tel. – 905-795-3200, Fax – 905-795-0091

<u>Ottawa</u>

2251 Gladwin Crescent, Ottawa, Ontario, K1B 4K9 Tel. - 613-526-4696, Fax - 613-731-8636

<u>London</u>

1398 Wellington Road, London, Ontario, N5E 1M5 Tel. – 519-659-9868, Fax – 519-659-0771

<u>Dartmouth</u>

 133 Ilsley Avenue, Dartmouth, Nova Scotia, B3B 1S9 Tel. – 902-468-8088, Fax – 902-468-8830

<u>Barrie</u> 21 Commerce Park Drive, Barrie, Ontario, L4N 8X1 Tel. – 705-730-0498, Fax – 705-730-0495

<u>Pickering</u> 1064 Salk Road, Pickering, Ontario, L1W 4B5 Tel. – 905-831-9582, Fax – 905-831-4292

<u>Calgary</u> 2611 Hopewell Place, N.E, Unit#109, Calgary, Alberta, T1Y 7K3 Tel – (403) 250-1986, Fax – ((403) 250-7768

We have been serving the Canadian woodworking and metalworking industry for over 27 proud years. We stand behind our machines. If you have any questions, comments, or concerns, please call or write to our head office or call toll free at 1-800-461-BUSY (2879).

Email us at busybee@busybeetools.com or contact us though our web site at

busybeetools.com

