



Instructions and Parts List

AccuGlide™

HST 3-Inch (Upper)

HST 3-Inch (Lower)

Taping Heads

Type 29100



Important Safeguards

Turn to page four for operating safety information.

Important

It is recommended you immediately order the spare parts listed on page 21. These parts are expected to wear through normal use, and should be kept on hand to minimize production delays.

3M Masking and Packaging Systems Division

3M Center Bldg. 220-8W-01
St. Paul, MN 55144-1000

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St. Paul, MN 55144-1000

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To Our Customers:

This is the 3M-Matic™/AccuGlide™/Scotch™ brand equipment you ordered. It has been set up and tested in the factory with "Scotch" brand tapes. If technical assistance or replacement parts are needed, call or Fax the appropriate number listed below.

Included with each machine is an Instructions and Parts List manual.

Technical Assistance:

3M-Matic™ Helpline – 1-800/328 1390. Please provide the customer support coordinator with the machine number, machine type/model and serial number. If you have a technical question that does not require an immediate response, you may Fax it to 715/381 0248.

Replacement Parts and Additional Manuals

Order parts by part number, part description and quantity required. Also, when ordering parts and/or additional manuals, include machine name, number and type. A parts order form is provided at the back of this manual.

3M/Tape Dispenser Parts

241 Venture Drive

Amery, WI 54001-1325

1-800/344 9883

FAX# 715/268 8153

Minimum billing on parts orders will be \$25.00. Replacement part prices available on request.

\$10.00 restocking charge per invoice on returned parts.

Note : Outside the U.S., contact the local 3M subsidiary for parts ordering information.



3M Packaging Systems Division

3M Center, Building 220-8W-01
St. Paul, MN 55144-1000

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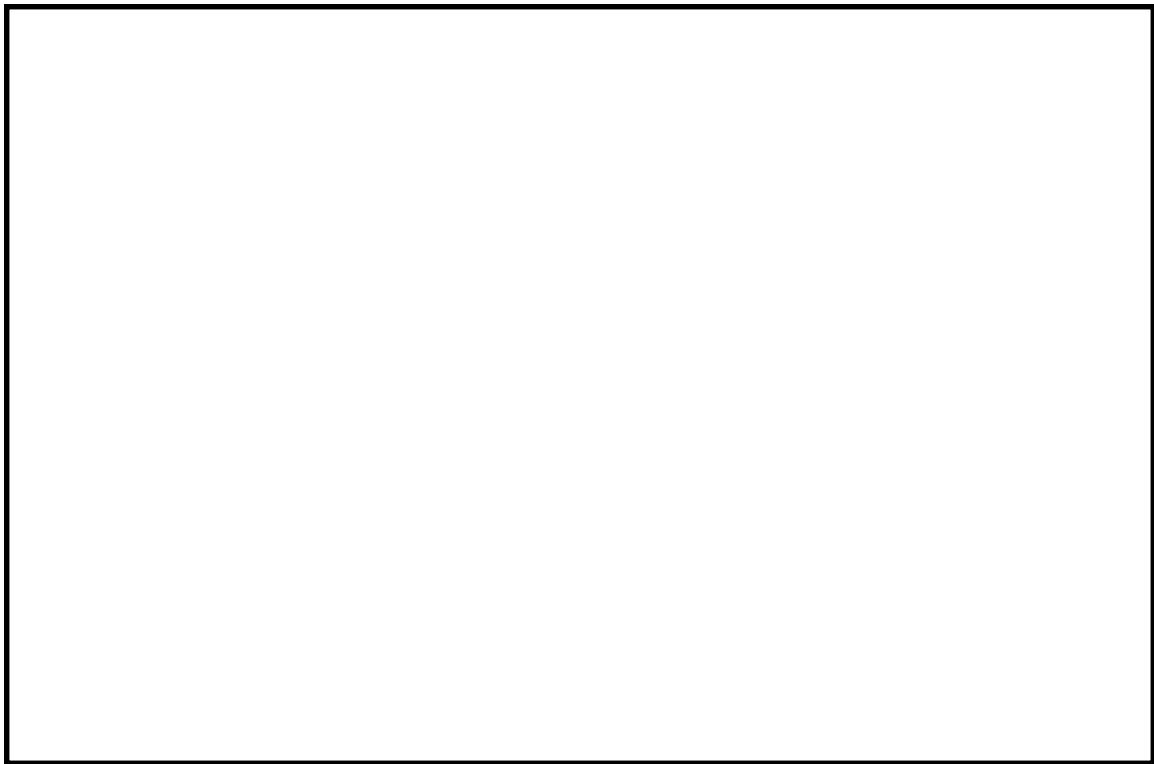
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To Our Customers:

This is the 3M-Matic™/AccuGlide™/Scotch™ brand equipment you ordered. It has been set up and tested in the factory with "Scotch" brand tapes. If any problems occur when operating this equipment, and you desire a service call, or phone consultation, call, write or Fax the appropriate number listed below.

Included with each machine is an Instructions and Parts List manual.

**SERVICE, REPLACEMENT PARTS AND ADDITIONAL MANUALS
AVAILABLE DIRECT FROM:**



Order parts by part number, part description and quantity required. Also, when ordering parts and/or additional manuals, include machine name, number and type.

3M

3M Packaging Systems Division

3M Center, Building 220-8W-01
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Instruction Manual

HST 3-Inch Taping Head (Upper)
HST 3-Inch Taping Head (Lower)
Type 29100

Table of Content	Page
Taping Head Contents	1
Equipment Warranty and Limited Remedy	2
Description	3
Important Safeguards.....	4
Specifications	5
Installation	6 - 7
Special Use Set-Up	
HST Upper Taping Head – Compression Spring	9
Set-Up Procedure	
Tape Loading	10 - 11
Adjustments	
Tape Web Alignment	12
Friction Brake	12
Buffing Roller Spring Tension	13
Tape Application Leg length	14
One-Way Tension Roller Assembly	15
Maintenance	
Cleaning Of The Taping Head	17
Cut-Off Blade	17
Blade Oiler Pad	17
Blade Replacement	18 -19
Lubrication	20
Replacement Parts And Service Information	
Spare Parts	21
Replacement Parts and Service	21
Replacement Parts	Yellow Section
Illustration and Parts List	23 - 35

Taping Head Contents

HST 3-Inch Taping Head (Upper)

Consists Of:

Qty.	Part Name
1	Taping Head Assembly
1	Tape Drum and Bracket Assembly
1	Blade – 3.33 inch [77.5 mm] Lg. (Spare)
1	Compression Spring (Upper taping head for side mounting - see page 9)
4	Mounting Stud, Alternate (For use with optional HST mounting frame – see parts drawing, page 26.)

HST 3-Inch Taping Head (Lower)

Consists Of:

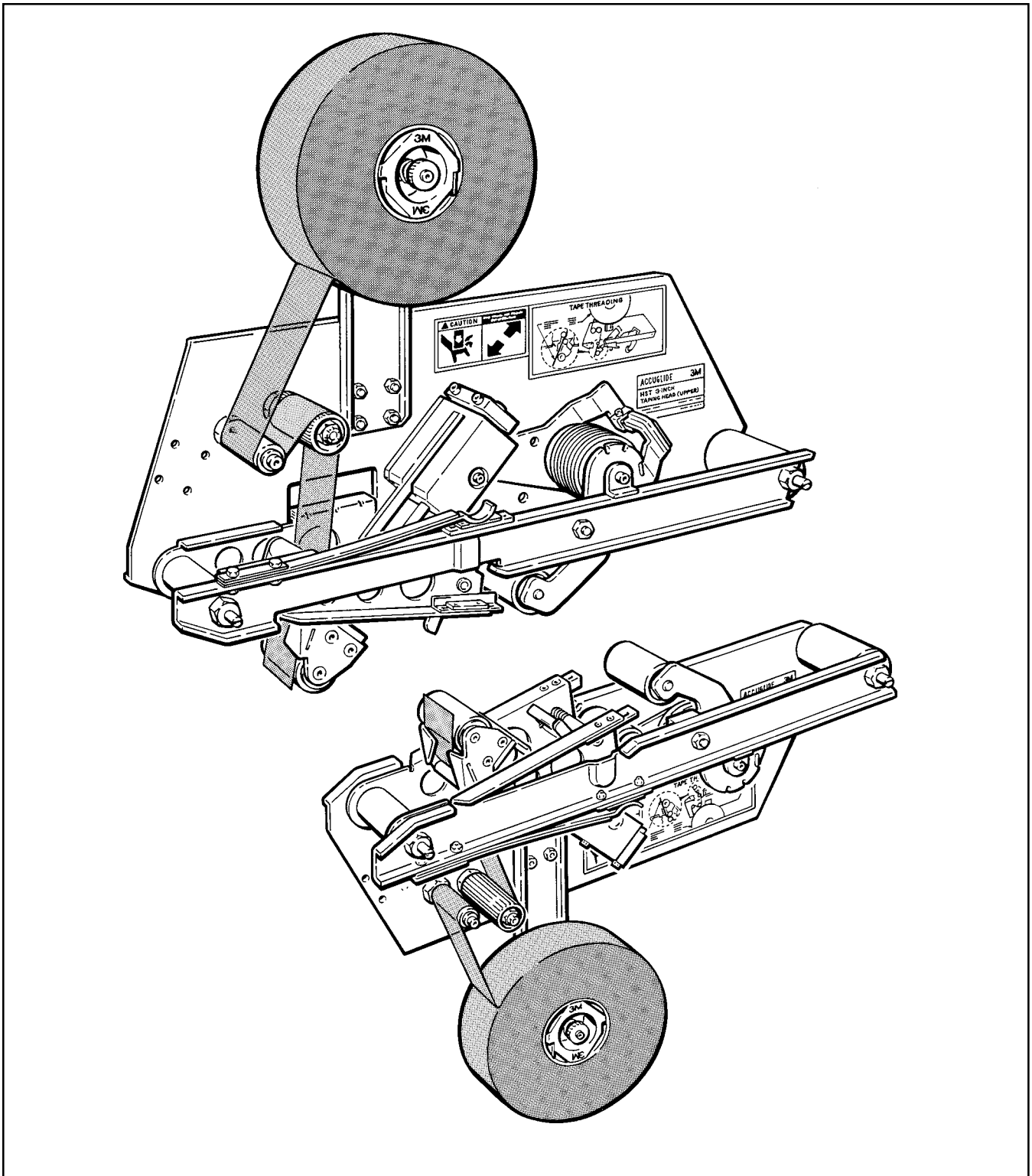
Qty.	Part Name
1	Taping Head Assembly
1	Tape Drum and Bracket Assembly
1	Blade – 3.33 inch [77.5 mm] Lg. (Spare)
4	Mounting Stud, Alternate (For use with optional HST mounting frame – see parts drawing, page 26.)

Equipment Warranty and Limited Remedy: THE FOLLOWING WARRANTY IS MADE IN LIEU OF ALL OTHER WARRANTIES, EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTY OF MERCHANTABILITY, THE IMPLIED WARRANTY OF FITNESS FOR A PARTICULAR PURPOSE AND ANY IMPLIED WARRANTY ARISING OUT OF A COURSE OF DEALING, A CUSTOM OR USAGE OF TRADE:

3M warrants that its **AccuGlide™ HST 3-Inch Taping Heads, (Upper and Lower), Type 29100** will be free from defects for ninety (90) days after delivery. If any part is proved to be defective within the warranty period, then the exclusive remedy and 3M's and seller's sole obligation shall be, at 3M's option, to repair or replace the part, provided the defective parts is returned immediately to 3M's factory or an authorized service station designated by 3M. A part will be presumed to have become defective after the warranty period unless the part is received or 3M is notified of the problem no later than five (5) calendar days after the warranty period. If 3M is unable to repair or replace the part within a reasonable time, then 3M, at its option, will replace the equipment or refund the purchase price. 3M shall have no obligation to provide or pay for the labor required to install the repaired or replacement part. 3M shall have no obligation to repair or replace (1) those parts failing due to operator misuse, carelessness, or due to any accidental cause other than equipment failure, or (2) parts failing due to non-lubrication, inadequate cleaning, improper operating environment, improper utilities or operator error.

Limitation of Liability: 3M and seller shall not be liable for direct, indirect, special, incidental or consequential damages based upon breach of warranty, breach of contract, negligence, strict liability or any other legal theory.

The foregoing Equipment Warranty and Limited Remedy and Limitation of Liability may be changed only by a written agreement signed by authorized officers of 3M and seller.



AccuGlide™ HST 3-Inch Taping Heads (Upper and Lower), Type 29100

Description

The **AccuGlide™** HST 3-Inch Taping Heads (Upper and Lower) were designed to replace taping, gluing, and stapling heads in existing case sealing machines.

These high-speed heavy duty heads apply a “C” clip of **Scotch™** brand pressure-sensitive film box sealing tape to the top and/or bottom center seam of regular slotted containers at speeds up to 150 ft/min [45.7 m/min].

Important Safeguards

Both the upper and lower taping heads have important safeguards listed below, every person who operates and/or maintains the heads should be familiar with these safeguards.

The “**Warning - Sharp Knife**” label is used on each head to warn operators and service personnel of the extremely sharp blades used to cut the tape at the end of the box sealing operation. The label shown in Figure 1-1 is located on the blade guard assembly between the applying roller assembly and the buffing roller assembly. Before working with the tape heads or attempting to load the tape, refer to Figures 4-1 and 4-2 and identify the knife blade location. Keeps hands out of these areas except as necessary to service the taping heads.

The “**Caution - Keep Hands Out of This Area**” labels, shown in Figure 1-2 is attached to the frame and located behind the slide mechanism. The top label is for the upper head, and the bottom label is for the lower head. This warns operators to keep hands and objects out of this area when the taping head mechanism is in operation.

The “**Tape Threading**” labels, shown in Figure 1-3, are attached to the right side of the frame on both the upper and lower taping heads. These labels provide a convenient tape threading diagram. More detailed tape loading and threading information is provided in this manual in the set-up procedure section.

The taping heads are equipped with an orange blade guard that covers the blade. **The taping head should never be operated with the blade guard removed.**

Turn air and electrical supplies off before servicing the taping heads.

The taping heads should not be washed down or subjected to conditions causing moisture condensation on components.



Figure 1-1 - Knife Warning Label

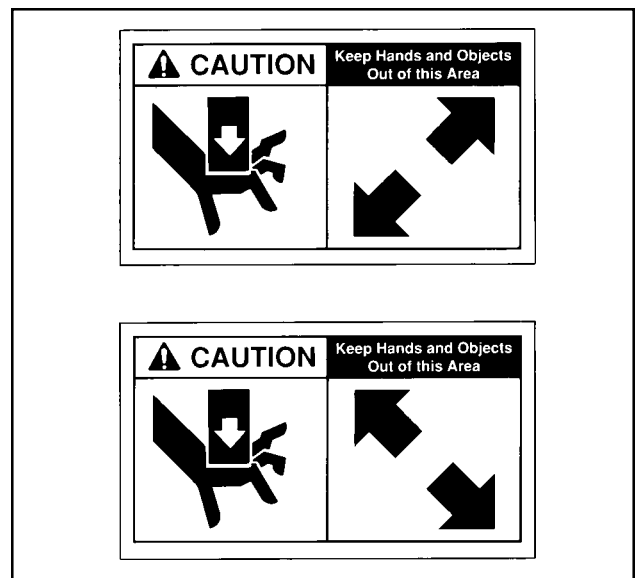


Figure 1-2 - Hand Caution Label

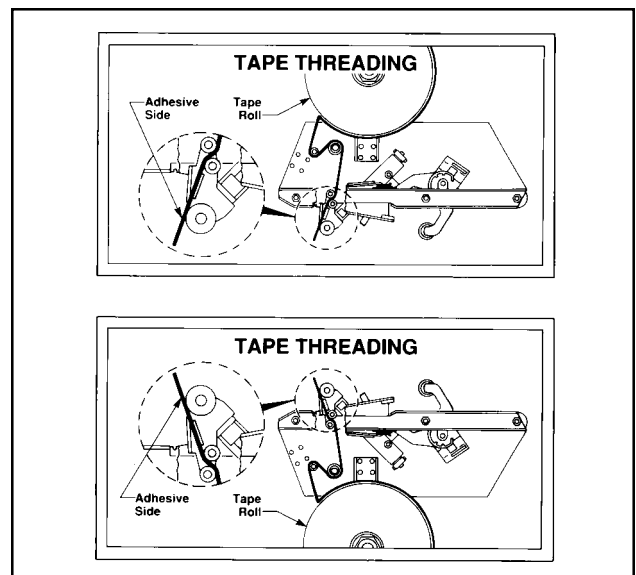


Figure 1-3 - Tape Threading Label

Specifications

These specifications apply to all **HST 3-Inch Upper** and **Lower** taping heads except where noted.

1. **Tape:**

For use with **Scotch™** brand pressure-sensitive film box sealing tapes.

2. **Tape Width:**

2 inches [50 mm] minimum to 3 inches [76.2 mm] maximum.

3. **Tape Roll Diameter:**

Position A (Figure 2-1) – 15 inches [380 mm] maximum on a 3 inch [76.2 mm] diameter core.
Position B (Figure 2-1) – 18 inches [460 mm] maximum on a 3 inch [76.2 mm] diameter core.
(Accommodates all system roll lengths of **Scotch™** brand film tapes.)

NOTE: The tape roll diameter capacity may be less on some equipment installations due to space limitations.

4. **Tape Application Leg Length:**

2 3/4 inches \pm 1/4 inch [70 mm \pm 6 mm]

5. **Box Size Capacities:**

For use with center seam regular slotted containers.

	Minimum	Maximum
Length	– 6 inches [150 mm]	Unlimited
Height	– 4 inches [100 mm]	Unlimited
Width	– 5 inches [130 mm]	Unlimited

6. **Operating Conditions:**

Use in dry, relatively clean environments at 40° to 105° F [5° to 40° C] with clean, dry boxes.

IMPORTANT SAFEGUARD

TAPING HEADS SHOULD NOT BE WASHED DOWN OR SUBJECTED TO CONDITIONS CAUSING MOISTURE CONDENSATION ON COMPONENTS.

7. **Taping Head Dimensions:**

Length	– 25.3 inches [645 mm]
Height	– 20.8 inches [530 mm]
Width	– 6.5 inches [165 mm]
Weight	– Packaged: 35 lbs. [15.9 kg] Unpackaged: 30 lbs. [13.6 kg]

Installation

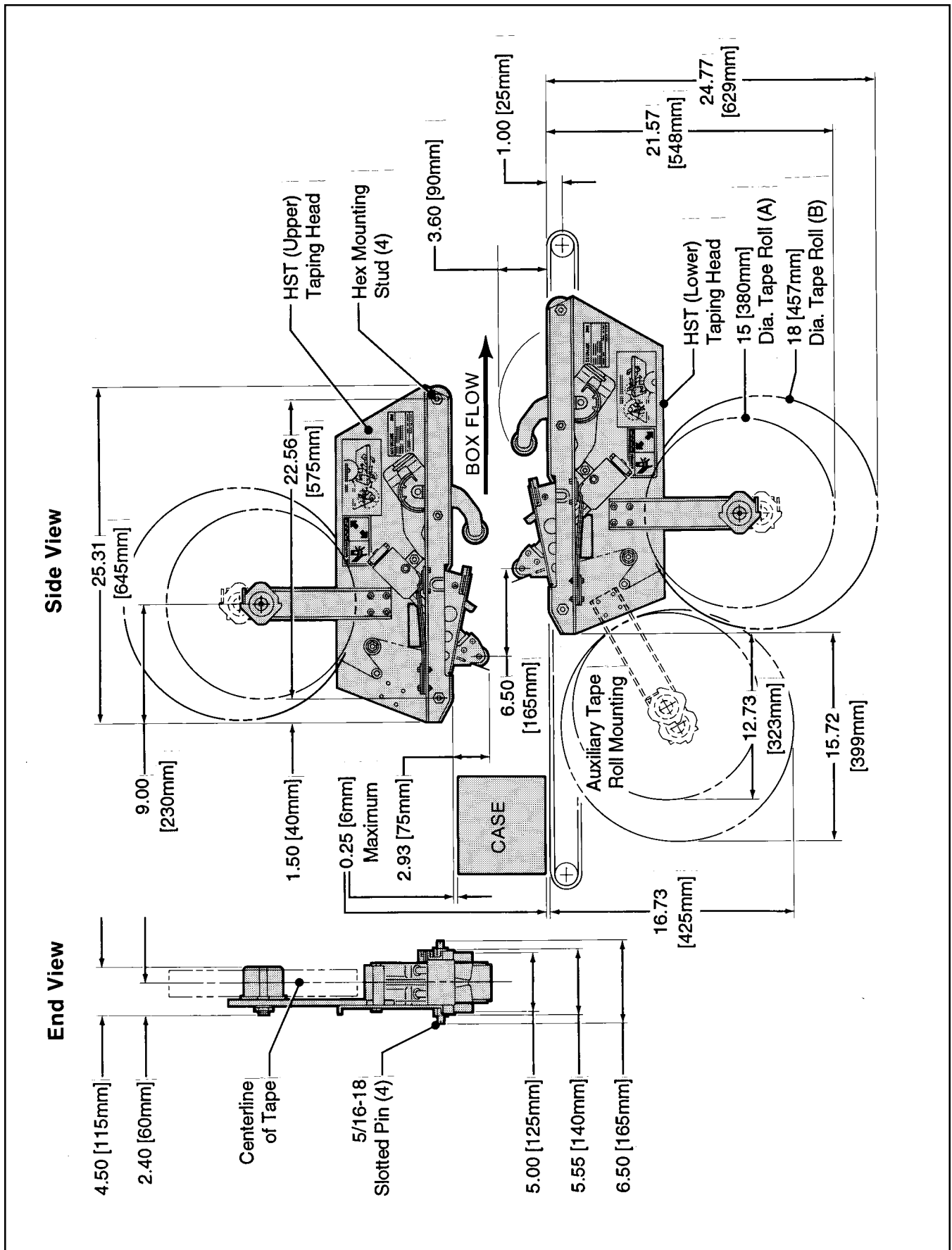


Figure 2-1 – Taping Head Assemblies – Typical Mounting Dimensions

Installation (Continued)

IMPORTANT SAFEGUARDS

BOTH THE UPPER AND LOWER TAPING HEADS UTILIZE EXTREMELY SHARP KNIFE BLADES. THE BLADES ARE LOCATED UNDER THE ORANGE BLADE GUARD WHICH HAS THE “WARNING – SHARP KNIFE” LABEL. BEFORE WORKING WITH THE TAPING HEADS OR ATTEMPTING TO LOAD THE TAPE, REFER TO FIGURES 4-1 AND 4-2 AND IDENTIFY THE BLADE LOCATION. KEEP HANDS OUT OF THESE AREAS EXCEPT AS NECESSARY TO SERVICE THE TAPING HEADS.

After the taping head assembly has been unpackaged, examine the unit for damage that might have occurred during transit. If damage is evident, file a damage claim immediately with the transportation company and also your 3M Representative.

The taping heads can be used to replace existing or custom made machinery. It can be mounted for top taping or bottom taping. Refer to box size specifications on page 5 and Figure 2-1 on page 6, for the following points in making such installations:

1. The case conveying system must positively propel the case in a continuous motion, **not exceeding 150 feet per minute** [45.7 m/min.], past the taping head assembly since the case motion actuates the taping mechanism.
2. If a pusher or cleated conveyor is being used, steps should be taken in the conveyor design to **prevent the pusher from contacting the applying or buffing roller arms which may result in damage to the taping head**. If this is not possible, contact 3M for assistance or suggested modifications that will provide adequate operating clearance to the taping head assembly.
3. Figure 2-1 illustrates the typical mounting relationship for opposing taping head assemblies to allow taping of case heights down to 5.4 inches [135 mm]. **To tape case heights down to 4 inches [100 mm], the taping head assemblies must be completely staggered so only one tape seal is being applied at one time.**
4. Four (4) mounting studs are provided on the taping head side plates but special installations may require alternate means for mounting. Alternate mounting studs are provided for use with optional HST mounting frame P/N 78-8062-4234-9. See parts drawing, page 26.
5. The taping head assembly is provided with mounting holes **for mounting the tape drum bracket in two different locations**. Normal installation is in the center of the frame. For clearance problems, the front mounting can be used.

Upper Taping Head

Refer to Figure 2-1 for mounting dimensions.

1. Remove the (4) 5/16 – 18 slotted pins from the hex mounting studs.
2. Install and secure the taping head using the (4) 5/16 – 18 tapped holes available in the hex mounting studs.

Lower Taping Head

1. Install the taping head by lowering mounting pins into bed frame slots, or remove (4) 5/16 - 18 slotted pins and use 5/16 – 18 tapped holes in the hex mounting studs.

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Special Use Set-Up Instructions

HST 3-Inch Upper Taping Head - Compression Spring

Refer to Figure 3-1

⚠ WARNING – UPPER TAPING HEAD UTILIZES AN EXTREMELY SHARP KNIFE BLADE LOCATED UNDER THE ORANGE BLADE GUARD WHICH HAS THE “WARNING – SHARP KNIFE” LABEL. USE CARE WHEN WORKING NEAR BLADE. IF CARE IS NOT TAKEN, SEVERE INJURY TO PERSONNEL COULD RESULT.

A compression spring is packed in with the HST 3-Inch Upper Taping Head for use if the head is to be side mounted. Remove and retain stop block, bumper and fasteners. Remove applying roller assembly. Place compression spring on shaft and reassemble applying roller assembly and stop block.

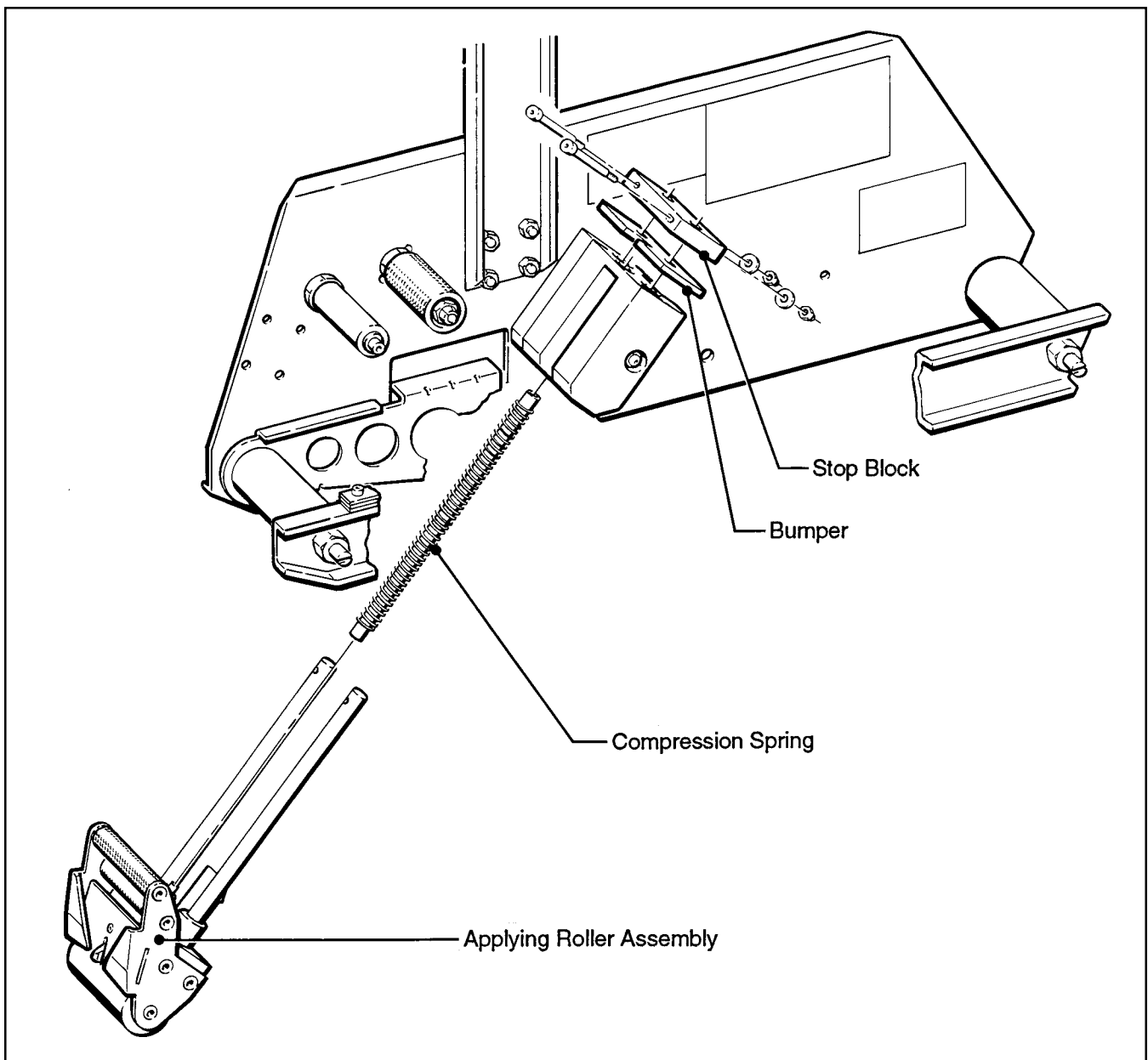


Figure 3-1 – Compression Spring Installation

Set-Up Procedure

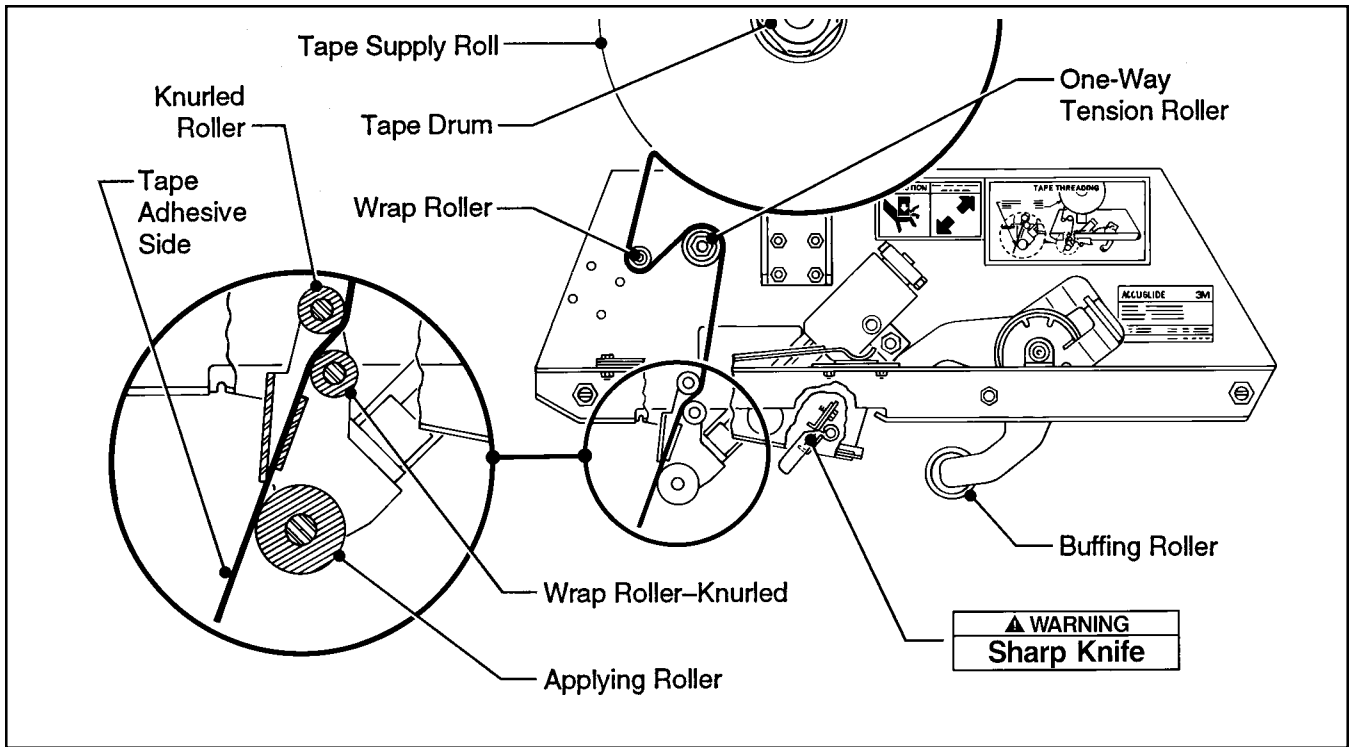


Figure 4-1 – Tape Threading Diagram – Upper Taping Head

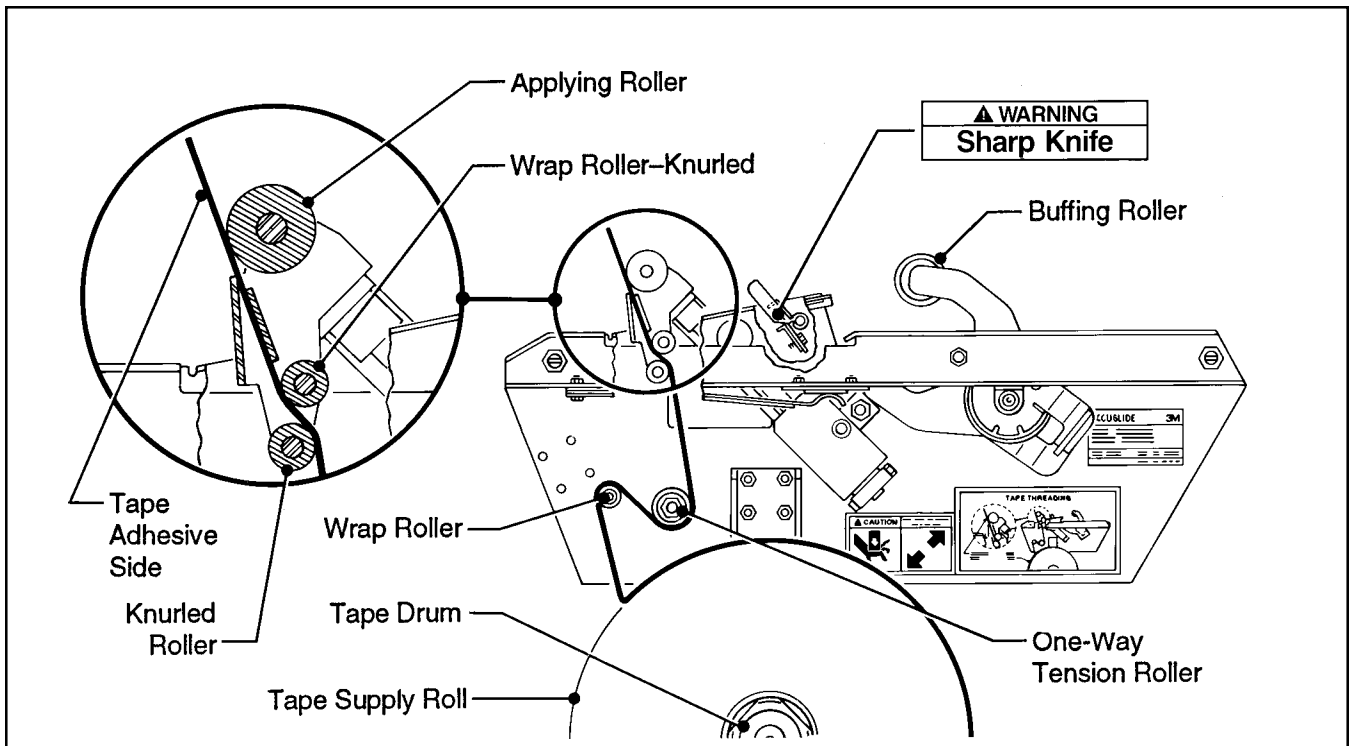


Figure 4-2 – Tape Threading Diagram – Lower Taping Head

Set-Up Procedure (Continued)

Tape Loading

The HST 3-Inch taping head accommodates up to 3 inch [72 mm] wide tape rolls. To apply 1-1/2 inch [36 mm], 1-3/4 inch [42 mm] or 2 inch [50 mm] wide tapes, refer to "Adjustments" section for set-up information.



WARNING

1. BOTH THE UPPER AND LOWER TAPING HEADS UTILIZE EXTREMELY SHARP KNIFE BLADES WHICH ARE LOCATED UNDER THE ORANGE BLADE GUARD WITH THE "WARNING – SHARP KNIFE" LABEL. REFER TO FIGURE 4-1 AND 4-2 AND IDENTIFY THE BLADE LOCATIONS. KEEP HANDS OUT OF THIS AREA EXCEPT AS NECESSARY TO SERVICE THE TAPING HEADS.
2. REFRAIN FROM MANUALLY PUSHING THE APPLYING ROLLER ARM INWARD AS THIS WILL PUT YOUR HAND IN MOTION TOWARDS THE TEETH OF THE SHARP KNIFE BLADE. WHEN NECESSARY TO MANUALLY ACTUATE THE TAPE APPLYING MECHANISM, TAKE CARE TO MAKE SURE THE BLADE GUARD STAYS IN PLACE TO PROVIDE MAXIMUM PROTECTION FOR YOUR HANDS FROM THE KNIFE BLADE TEETH.
3. NEVER ATTEMPT TO WORK ON THE TAPING HEADS OR LOAD TAPE WHEN THE CONVEYING SYSTEM IS RUNNING. PERSONNEL INJURY OR EQUIPMENT DAMAGE CAN POTENTIALLY RESULT.

Upper Taping Head

Refer to Figures 4-1 and 4-3

For tape loading operations, follow the loading procedures to complete the tape threading.

1. Place tape roll on drum to dispense tape from bottom of roll around one-way tension roller with tape adhesive side forward. Seat tape roll fully against back flange of drum.
2. Manually turn tape roll to create slack tape while threading tape through applying mechanism. Pull tape through until it is in alignment with applying roller.



WARNING – USE CARE WHEN WORKING NEAR BLADES AS BLADES ARE EXTREMELY SHARP. IF CARE IS NOT TAKEN, SEVERE INJURY TO PERSONNEL COULD RESULT.

3. Excess tape can be cut with a scissors or knife at applying roller.

Lower Taping Head

Refer to Figures 4-2 and 4-3

The lower taping head is loaded in the same manner as the upper taping head. Follow the upper taping head tape loading procedure to complete the tape threading.

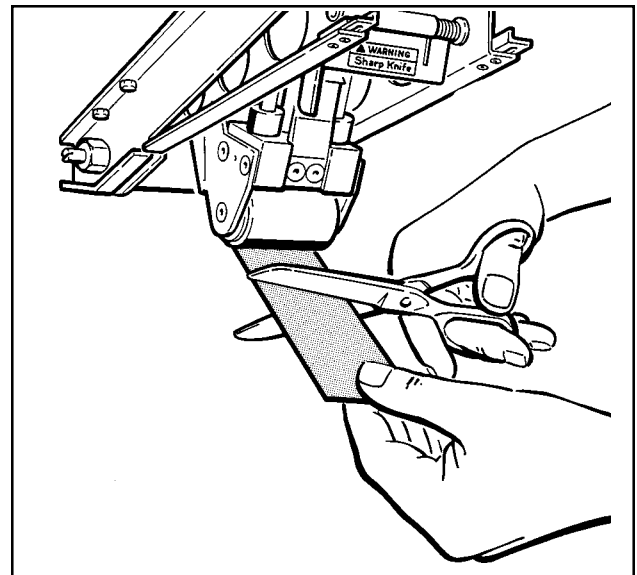


Figure 4-3 – Upper Taping Head – Left Rear View

Adjustments



WARNING – NEVER ATTEMPT TO WORK ON THE TAPING HEADS WHEN THE BOX DRIVE SYSTEM IS RUNNING. INJURY TO PERSONNEL OR EQUIPMENT DAMAGE CAN POTENTIALLY RESULT.

Tape Web Alignment

Refer to Figure 5-1

The HST 3-Inch tape drum assembly is pre-set to accommodate 3 inch [72 mm] wide tape. The tape drum assembly is adjustable to provide alignment of narrower tapes. If adjustment is necessary to center the tape width on the centerline of the taping head, (and therefore box center seam), make adjustment as follows:

1. **Loosen** the locking hex nut behind tape drum bracket. Use an adjustable wrench or 25 mm open end wrench.
2. **Turn tape drum shaft** in or out to center the tape web (use 5 mm hex wrench).
3. **Tighten** locking hex nut to secure the adjustment.

No other components require adjustment for tape web alignment.

Friction Brake

Refer to Figure 5-2

The tape drum friction brake on each taping head is **pre-set** for normal operation to prevent tape roll over travel. Should tension adjustment be required, **turn the knurled nut on the shaft to vary compression of the spring**. Turn the nut **clockwise to increase** the braking force, and **counterclockwise to decrease** the braking force. Adjust to minimum tension that prevents excessive tape roll over travel.

NOTICE

Excess braking force will cause poor tape applications and lead to tape tabbing on the trailing tape leg.

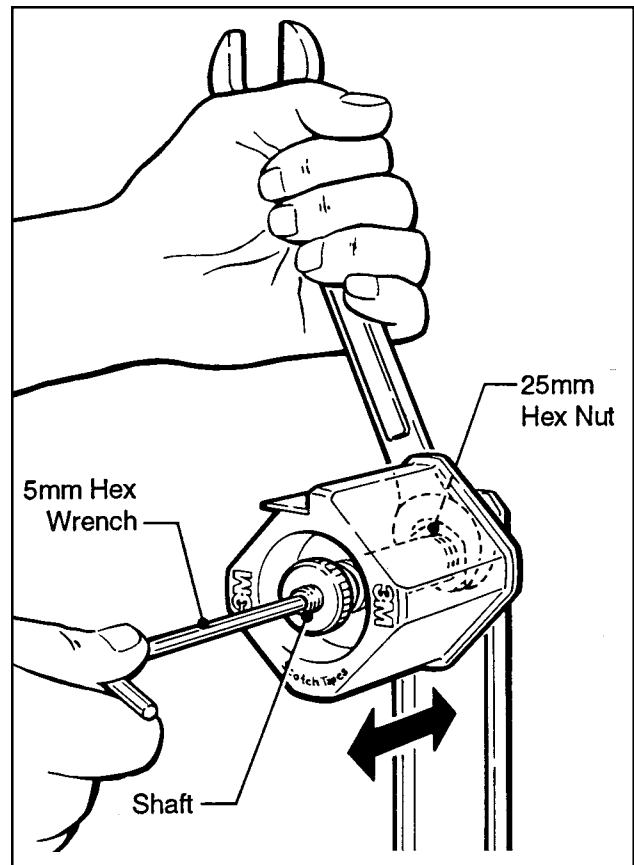


Figure 5-1 – Tape Drum Alignment

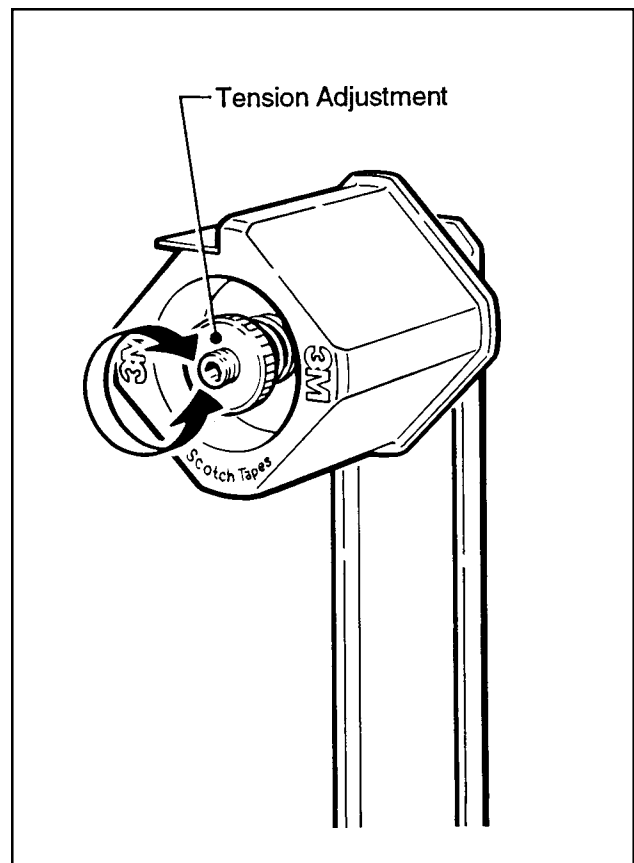


Figure 5-2 – Friction Brake

Adjustments (Continued)

Buffing Roller Spring Tension

Refer to Figures 5-3 and 5-4

WARNING – USE CARE WHEN WORKING ON BUFFING ROLLER ASSEMBLY AS SPRING IS UNDER TENSION. IF CARE IS NOT TAKEN PERSONNEL INJURY COULD RESULT.

The buffing roller spring controls the buffing roller pressure on the box and returns the assembly to the reset position. The spring tension is pre-set with the spring end loop in slot “C” for normal operation but is adjustable.

Should a tape loop appear on the trailing tape leg application, buffing roller pressure can be increased. With the buffing roller assembly in reset position, remove the spring end loop from slot “C” and place the loop in slot “B” or “A” to increase the spring tension. (Slot “A” will provide the greatest buffing roller pressure.)

Should lower buffing forces be required, remove the spring end loop from slot “C” and place in hole “D”, “E” or “F” to lower the spring tension. (Hole “F” will provide the least buffing roller pressure.)

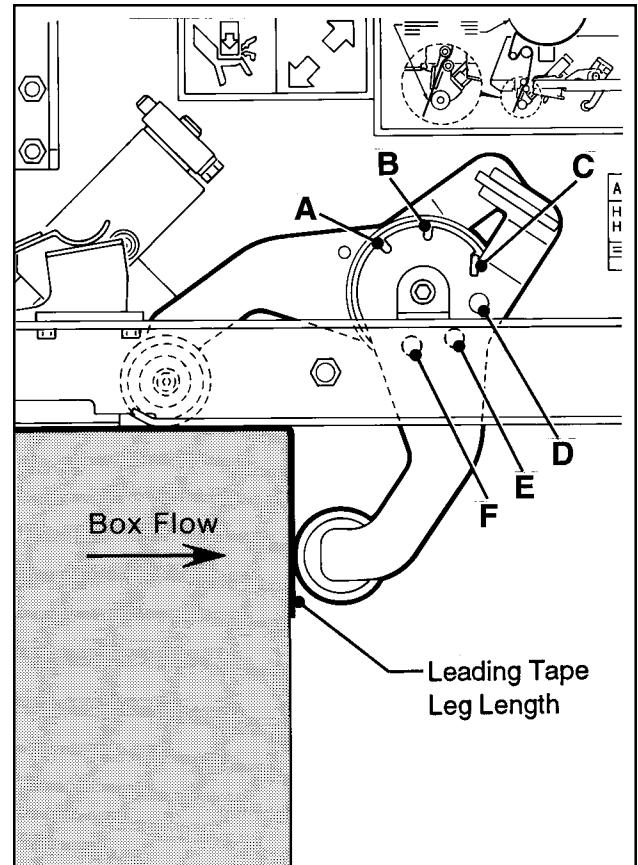


Figure 5-3 – Leading Buffing Roller

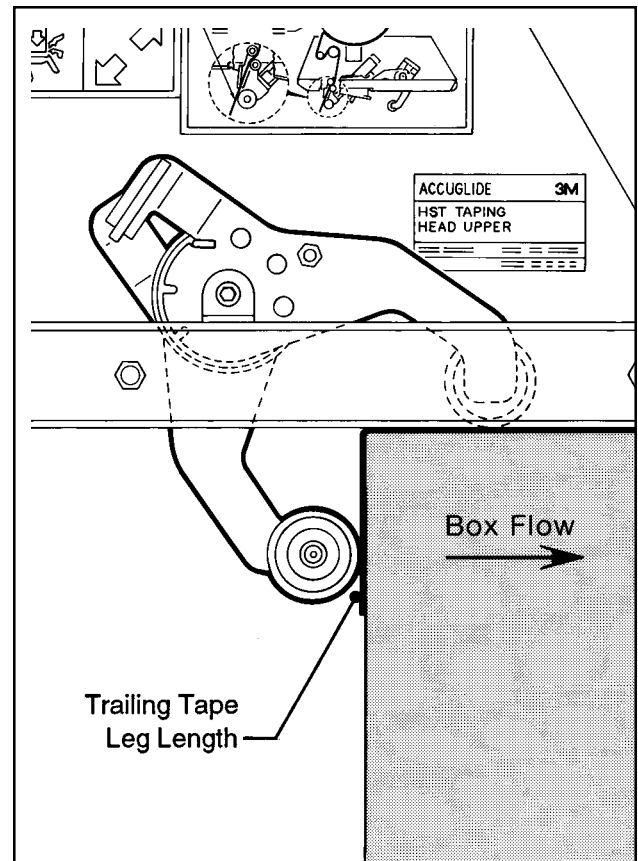


Figure 5-4 – Trailing Buffing Roller

Adjustments (Continued)

Tape Application Leg Length

Refer to Figure 5-5

The **conveyor speed**, at which the product moves through the taping heads, **affect** the leading and trailing **tape application leg length**.

For **best tape application performance**, the taping heads should maintain tape leg lengths of 2 3/4 inch \pm 1/4 inch [70 mm \pm 6 mm].

The **one-way tension roller** position (Figure 4-1 and 4-2) is adjustable to control the **leading tape leg** length and the “**L**” **brackets** adjustment **control** the **trailing tape leg** length.



WARNING – USE CARE WHEN WORKING ON BUFFING ROLLER ASSEMBLY AS SPRING IS UNDER TENSION. IF CARE IS NOT TAKEN PERSONNEL INJURY COULD RESULT.

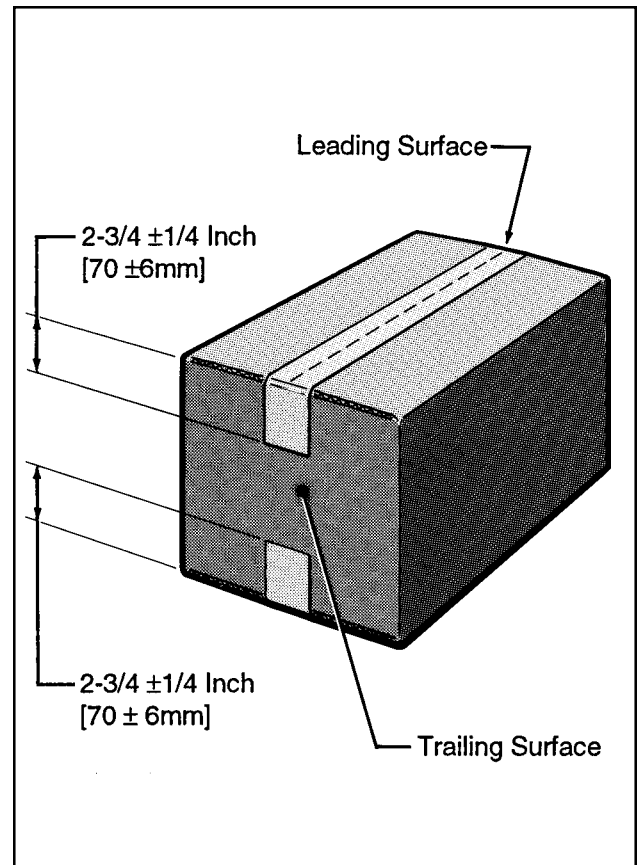


Figure 5-5 – Tape Application Leg Length

Leading Tape Leg Length

Refer to Figure 5-6

Adjust the **one-way tension roller** as needed to obtain the proper leading tape leg length.

Trailing Tape Leg Length

Refer to Figure 5-6

Adjust the “**L**” **brackets** as needed to obtain the proper trailing tape leg length.

The **lower** taping head adjustments are the **same** as the **upper** taping head adjustments.

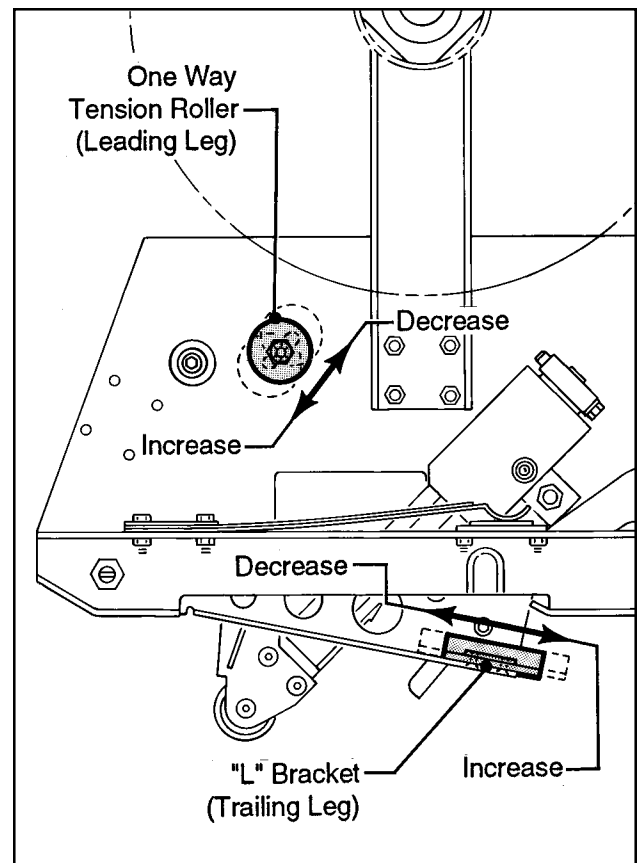


Figure 5-6 – Adjusting Tape Leg Length

Adjustments (Continued)

One-Way Tension Roller Assembly

Refer to Figure 5-7

The one-way tension roller is factory set. When replacing this assembly, the roller must have 1 lb. [0.5 kg] tangential force when turning.

To Set Tension

1. Wrap a cord or small strap (non-adhesive) 4-6 turns around the tension roller.
2. Attach a spring scale to the end of the cord or strap.
3. Turn the adjusting nut until a force of approximately 1 lb. [0.5 kg] is required to turn the roller by pulling on the spring scale.

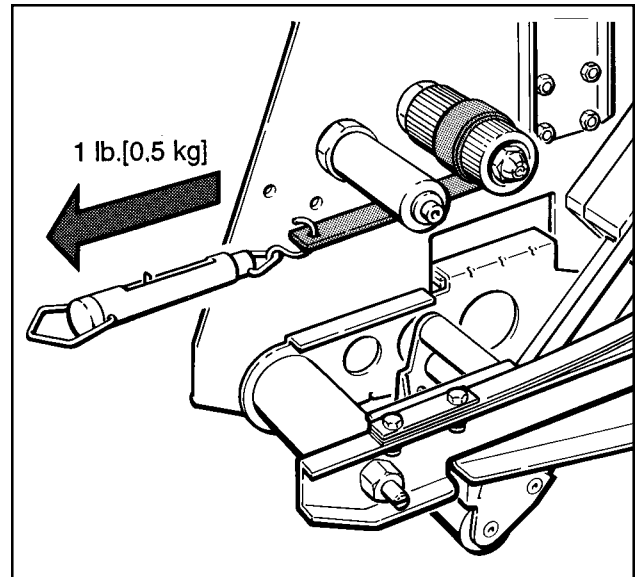


Figure 5-7 – One-Way Tension Roller

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Maintenance

The taping heads have been designed for long, trouble free service. The taping head will perform best when it receives **routine maintenance and cleaning**. Taping head components that fail or wear excessively should be **promptly** repaired or replaced to prevent damage to other portions of the head or to the product.



WARNING – TURN OFF CONVEYING SYSTEM ELECTRICAL POWER SUPPLY BEFORE BEGINNING MAINTENANCE. IF ELECTRICAL POWER IS NOT TURNED OFF, SEVERE INJURY TO PERSONNEL COULD RESULT. USE CARE WHEN REPLACING BLADES AS BLADES ARE EXTREMELY SHARP. IF CARE IS NOT TAKEN, SEVERE INJURY TO PERSONNEL COULD RESULT.

Cleaning Of The Taping Heads



CAUTION – NEVER ATTEMPT TO REMOVE DIRT FROM TAPING HEADS BY BLOWING IT OUT WITH COMPRESSED AIR. THIS CAN CAUSE THE DIRT TO BE BLOWN INSIDE THE COMPONENTS, AND ONTO SLIDING SURFACES. DIRT IN THESE AREAS CAN CAUSE SERIOUS EQUIPMENT DAMAGE. NEVER WASH DOWN OR SUBJECT TAPING HEADS TO CONDITIONS CAUSING MOISTURE CONDENSATION ON COMPONENTS. SERIOUS EQUIPMENT DAMAGE COULD RESULT.

Regular slotted containers produce a great deal of dust and paper chips when conveyed through the taping heads. If this dust is allowed to build-up on the heads, it can cause wear on the moving components. Excessive dirt build-up should be wiped off with a damp cloth. Cleaning should be done once per month, depending on the number and type of boxes used. If the boxes used are dirty, or if the environment in which the heads operate is dusty, cleaning on a more frequent basis may be necessary.

Cut-Off Blade

Should tape **adhesive build-up** occur, carefully wipe clean with oily cloth.

Blade Oiler Pad

The taping heads are equipped with a blade oiler pad to provide a film of oil on the cut-off blade to reduce adhesive build-up. **Saturate oiler pad** with **SAE #30 non-detergent oil**. The blade oiler pad will become worn during normal operation. Replace the blade oiler pad when the felt is worn.

Maintenance (Continued)

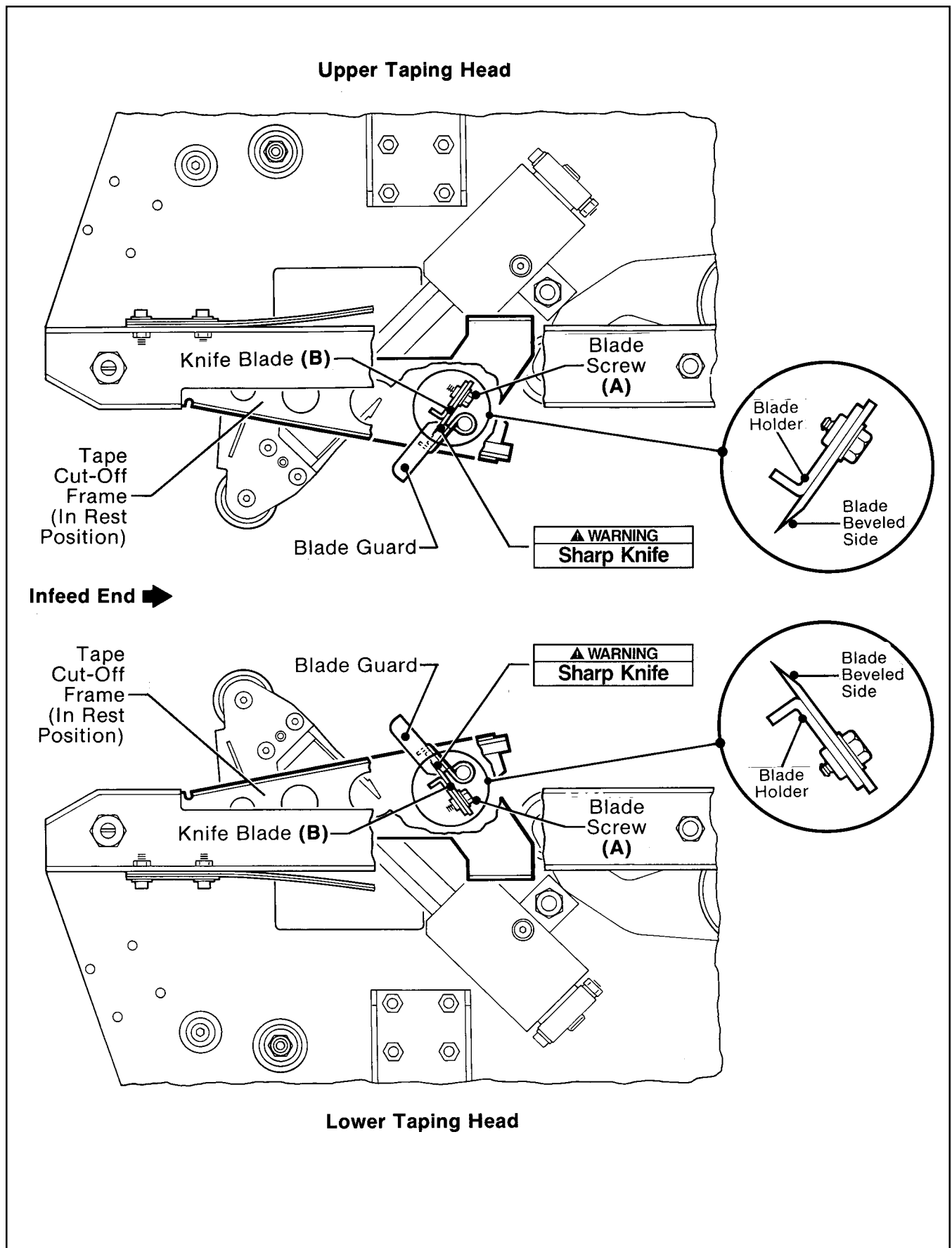


Figure 6-1 – Blade Replacement

Maintenance (Continued)



WARNING – TURN OFF ELECTRICAL POWER SUPPLY AND DISCONNECT POWER CORD FROM ELECTRICAL SUPPLY BEFORE BEGINNING MAINTENANCE. IF POWER CORD IS NOT DISCONNECTED, SEVERE INJURY TO PERSONNEL COULD RESULT. USE CARE WHEN REPLACING BLADES AS BLADES ARE EXTREMELY SHARP. IF CARE IS NOT TAKEN, SEVERE INJURY TO PERSONNEL COULD RESULT.

Blade Replacement

Refer to Figure 6-1

1. **Loosen, but do not remove** the blade screws (A). Remove and discard the old blade.
2. Mount the new blade (B) with the **bevel side away** from the blade holder.
3. Bottom the new blade slots against the screws. This will position the blade at the correct angle and depth. **Tighten** to secure the blade screws.

NOTICE

1. **Check the blade position to insure proper clearance by slowly pivoting the blade guard back.**
2. **If tape does not cut or has ragged cut re-adjust blade position away from blade holder.**

The same steps are followed on the upper and lower taping heads. Connect the main power supply.

Maintenance (Continued)

Lubrication

Refer to Figure 6-2

Like most other equipment, the taping head must be properly lubricated to insure long, trouble free service.

Figure 6-2 illustrates points which **should be lubricated every 250 hours of operation**. Lubricate the rotating and pivoting points noted by the arrows (➔) with **SAE #30 non-detergent oil**. At the same time, a small amount of multipurpose grease should be applied to the guides and to the end of each spring where the loop is secured at an eyelet, post, or hole noted by arrows (⇨).

⚠ CAUTION – WIPE OFF EXCESS OIL AND GREASE: IT WILL ATTRACT DUST AND DIRT WHICH CAN CAUSE PREMATURE EQUIPMENT WEAR AND JAMMING. TAKE CARE THAT OIL AND GREASE ARE NOT LEFT ON THE SURFACE OF ROLLERS AROUND WHICH TAPE IS THREADED, AS IT CAN CONTAMINATE THE TAPE'S ADHESIVE.

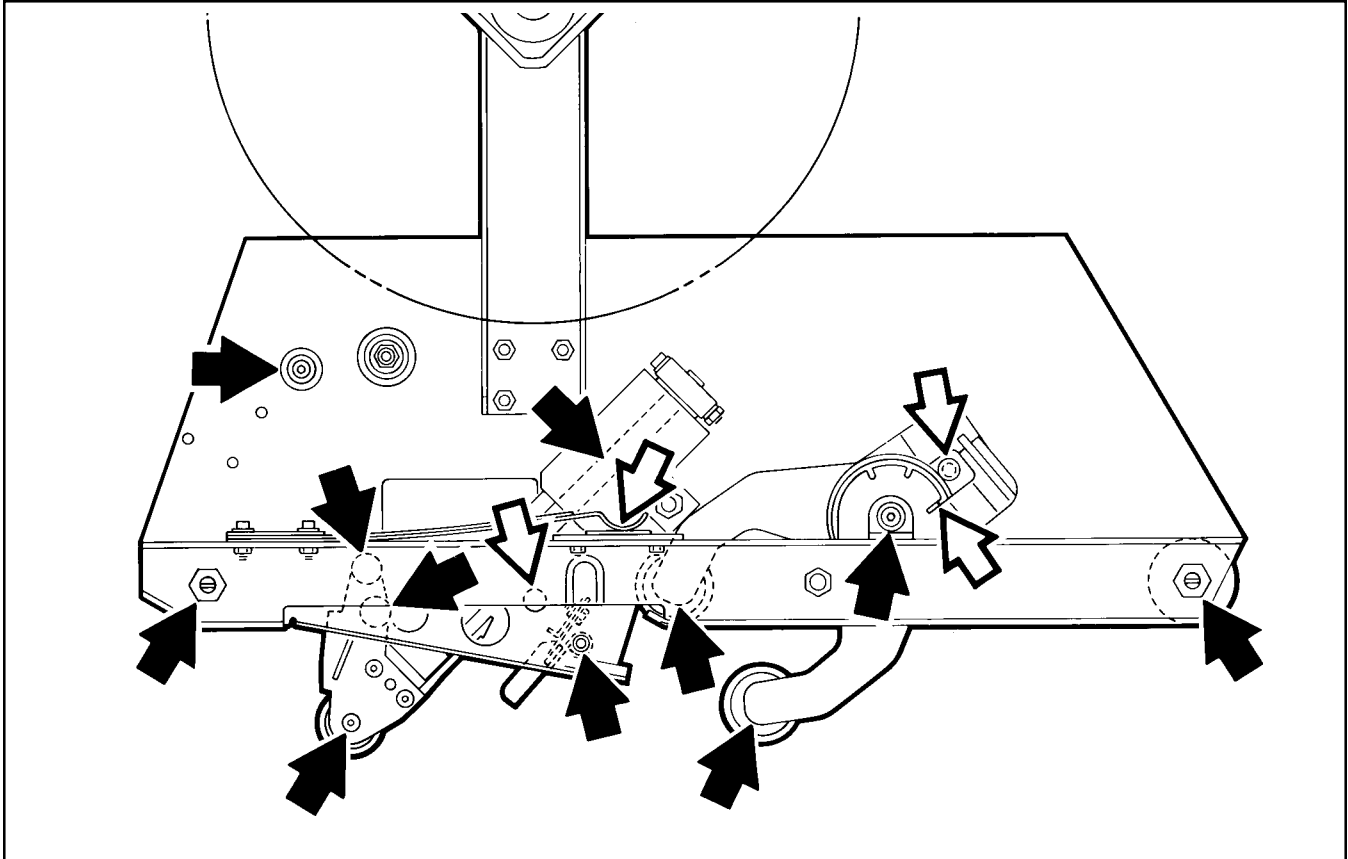


Figure 6-2 – Lubrication

Replacement Parts And Service Information

Spare Parts

A set of spare parts that will periodically require replacement due to normal wear is supplied with the taping heads. The set includes the following which should be reordered as consumed to keep the taping heads in production:

HST 3-Inch Taping Head (Upper and Lower)

Qty.	Ref. No.	Part Number	Description
1	9-6	78-8079-5006-4	Blade – 3.33 Inch [77.5 mm]

In addition to the above minimum spare parts, it is suggested that the following spare parts be maintained which will require replacement under normal wear of the taping head.

HST Taping Head (Upper and Lower)

Qty.	Ref. No.	Part Number	Description
1	8-9	78-8057-5703-2	Spring – Latch
1	10-15	78-8015-7213-8	Spring – Torsion, Inner (Lower Head)
1	10-15	78-8068-3940-9	Spring – Torsion, Inner (Upper Head)
1	10-16	78-8015-7214-6	Spring - Torsion, Outer (Lower Head)
1	10-16	78-8068-3941-7	Spring - Torsion, Outer (Upper Head)
1	8-28	78-8062-3802-4	Finger - Tape Support
1	9-19	78-8015-7029-8	Spring - Tape Cut-off
1	8-34	78-8062-4157-2	Roller - Applying
2	10-22	78-8062-4193-7	Roller - Buffing
1	9-11	78-8079-5000-7	Felt Pad

Replacement Parts and Service

Refer to the first page of this instruction manual "**Replacement Parts and Service Information**".

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Replacement Parts – Illustrations and Parts Lists

HST 3-Inch Taping Head Assemblies, Type 29100

1. Refer to **Taping Head Assemblies** figure to find all the parts illustrations identified by **figure numbers**.
2. Refer to the figure or figures to determine the **individual parts** required and the **parts reference number**.
3. The **replacement parts list**, that follows each illustration, includes the **part number** and **part description** for the parts in that illustration.

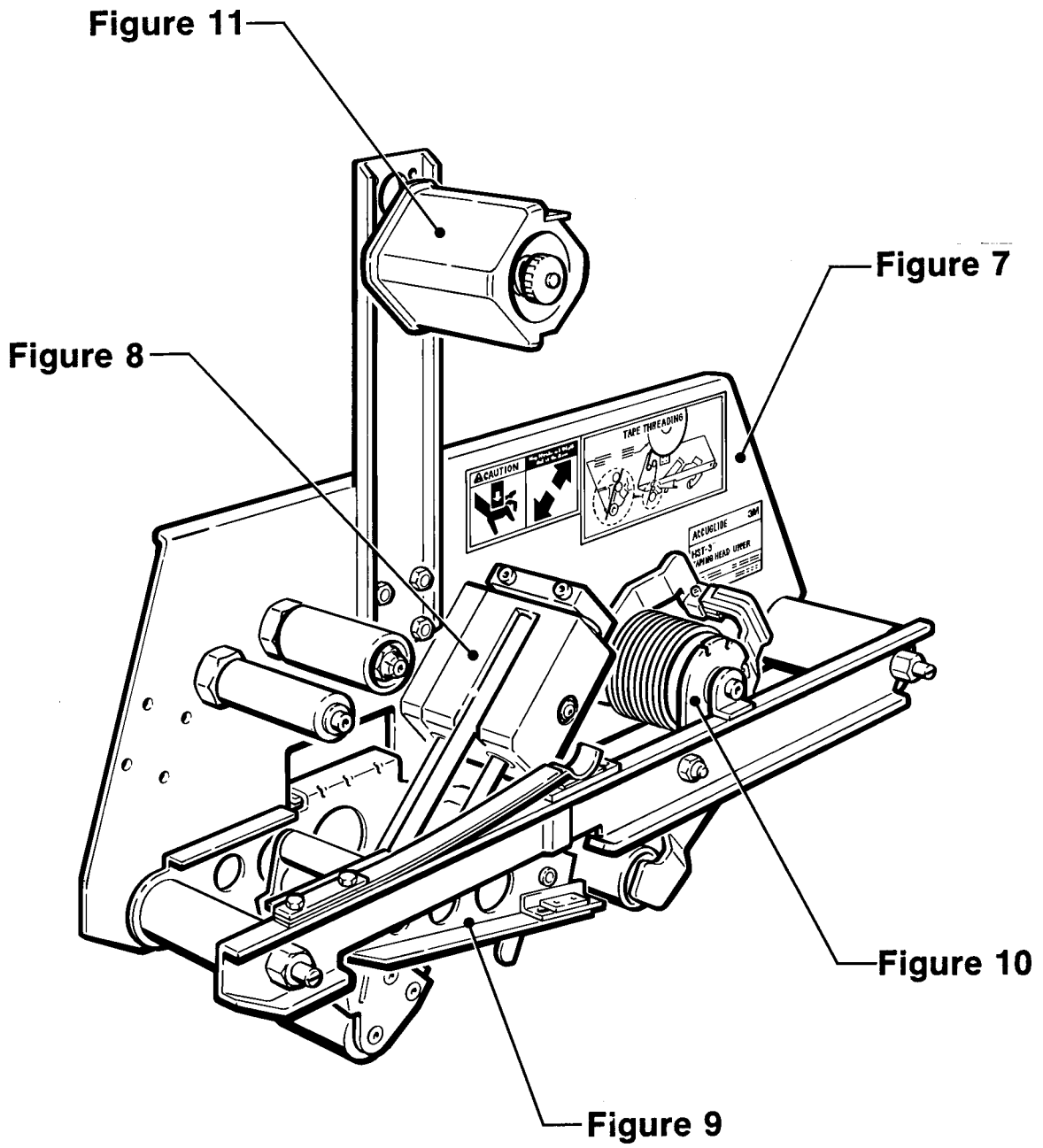
Note – The complete description has been included for **standard fasteners** and **some commercially available components**. This has been done to allow obtaining these standard parts locally, should the customer elect to do so.

4. Refer to first page of this instruction manual for parts ordering address and/or phone/fax number.

IMPORTANT – Not all the parts listed are normally stocked items. Some parts or assemblies shown are available only on a special order basis. Contact 3M/Tape Dispenser Parts to confirm item availability.

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HST 3-Inch, Type 29100



HST 3-Inch, Type 29100

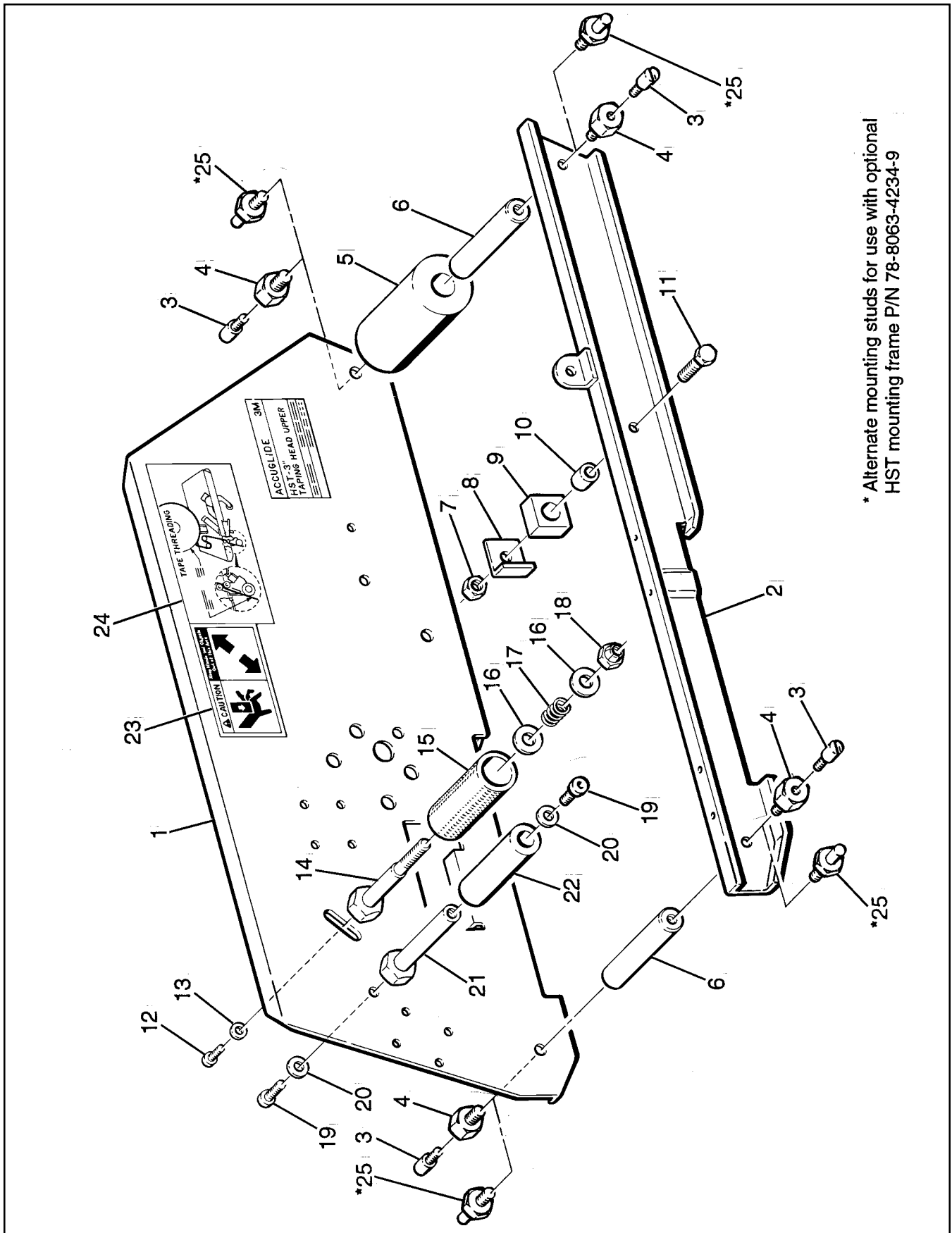


Figure 7

Figure 7 – HST, Type 29100

Ref. No.	3M Part No.	Description
1	* 78-8079-5167-4	Frame – Taping Head (Upper Head)
	* 78-8079-5166-6	Frame – Taping Head (Lower Frame)
2	* 78-8079-5170-8	Rail (Upper Head)
	* 78-8079-5169-0	Rail (Lower Head)
3	78-8057-5702-4	Pin – Mounting
4	78-8057-5701-6	Stud – Mounting
5	78-8062-4186-1	Spacer – Taping Head
7	* 26-1000-9788-5	Nut
8	78-8062-3815-6	Clip – Bumper
9	78-8062-4191-1	Block – Bumper
10	78-8062-4192-9	Hub – Bumper
11	* 26-1001-7317-3	Screw – Cap, Hex Hd, 3/8-16 x 1-3/4 Lg
12	* 70-8000-2641-4	Screw – Cap, Soc Hd, 1/4-20 x 5/8 Lg
13	26-1009-4814-5	Washer – Plain, Type A, 1/4
14	78-8062-4189-5	Shaft – Tension Roller
15	78-8068-3740-3	Tension Roller Assembly (Upper Head)
	78-8062-4190-3	Tension Roller Assembly (Lower Head)
16	* 78-8005-6119-9	Washer – Plain, Type A, 3/8
17	78-8062-3811-5	Spring – Compression
18	26-1009-4995-2	Nut – Hex, Self-Locking, 3/8-24
19	* 70-8000-0885-9	Screw – Cap, Soc Hd, 5/16-18 x 3/4 Lg
20	* 70-8000-5390-5	Washer – Plain, Type A, 5/16
21	78-8062-4197-8	Shaft – Wrap Pulley
22	78-8062-4198-6	Roller – Wrap
23	78-8079-5019-7	Label – Caution (Upper Head)
	78-8079-5018-9	Label – Caution (Lower Head)
24	78-8079-5020-5	Label – Tape Threading (Upper Head)
	78-8079-5021-3	Label – Tape Threading (Lower Head)
25	78-8070-1288-1	Stud – Mounting, Alternate (For use with optional HST mounting frame P/N 78-8062-4234-9)

* Not Stocked – Factory Order Only

HST 3-Inch, Type 29100

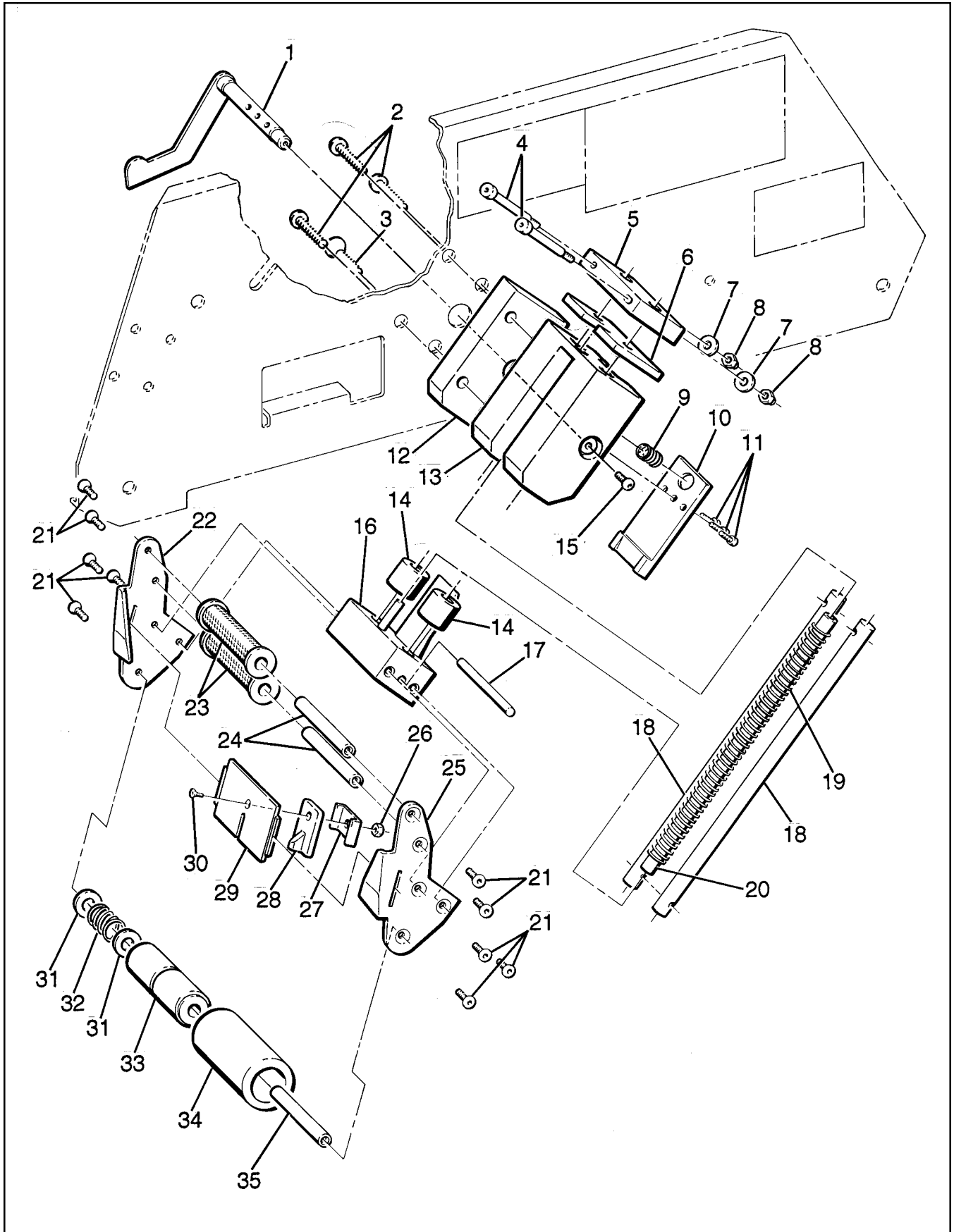


Figure 8

Figure 8 – HST 3-Inch, Type 29100

Ref. No.	3M Part No.	Description
1	78-8062-4209-1	Lever Latch Assembly (Upper Head)
	78-8062-4178-8	Lever Latch Assembly (Lower Head)
2	* 26-1009-8993-3	Screw – Cap, Button Hd, Hex Soc, Self Locking, 3/8-16 x 1-1/4 Lg
4	* 70-8000-0247-2	Screw – Shoulder, Soc Hd, 1/4 Dia x 1-1/2 Lg
5	78-8015-7219-5	Block – Stop
6	78-8062-4035-0	Bumper – Applying Assembly
7	* 26-1000-4442-4	Washer – Plain, Type A, #10
8	* 26-1005-8126-8	Nut – Hex, Plastic Insert, #10-24
9	78-8057-5703-2	Spring – Latch
10	78-8055-0976-3	Catch – Lever
11	70-7023-8470-5	Screw – Bearing Block
12	* 78-8068-3745-2	Spacer – Bearing Block
13	78-8062-4156-4	Bearing Block Assembly (Upper Head)
	78-8062-4155-6	Bearing Block Assembly (Lower Head)
14	78-8057-5700-8	Bumper – Casting
15	* 18-3104-5815-5	Screw – Cap, Button Soc Hd, 1/4-20 x 3/8 Lg
16	78-8062-4164-8	Applying Arm Block Assembly
17	78-8062-4202-6	Pin – Linear Bearing Shaft
18	78-8015-7085-0	Shaft – Linear Bearing
19	78-8015-7244-3	Spring – Compression (Lower Head Only)
20	78-8057-5706-5	Guide – Spring
21	70-7023-8780-7	Screw – Cap, Flt Hd, #10-32 x 1/2 Lg
22	78-8062-4179-6	Bracket – Applying Roller, L.H.
23	78-8070-1403-6	Knurled Roller Assembly
24	78-8062-4175-4	Shaft – Knurled Roller
25	78-8062-4180-4	Bracket – Applying Roller, R.H.
26	26-1006-4508-9	Nut – Hex, S-Lock, Nylon Insert, #4-40
27	78-8062-3812-3	Clip – Tape Support
28	78-8062-3802-4	Finger – Tape Support
29	78-8062-4182-0	Support – Tape
30	26-1002-7052-4	Screw – Cap, Flt Hd, #4-40 x 1/2 Lg
31	78-8005-6119-9	Washer – Plain, Type A, 3/8
32	78-8062-4166-3	Spring – Compression
33	78-8062-4158-0	Bushing – Applying Roller
34	78-8062-4157-2	Roller – Applying

* Not Stocked – Factory Order Only

HST 3-Inch, Type 29100

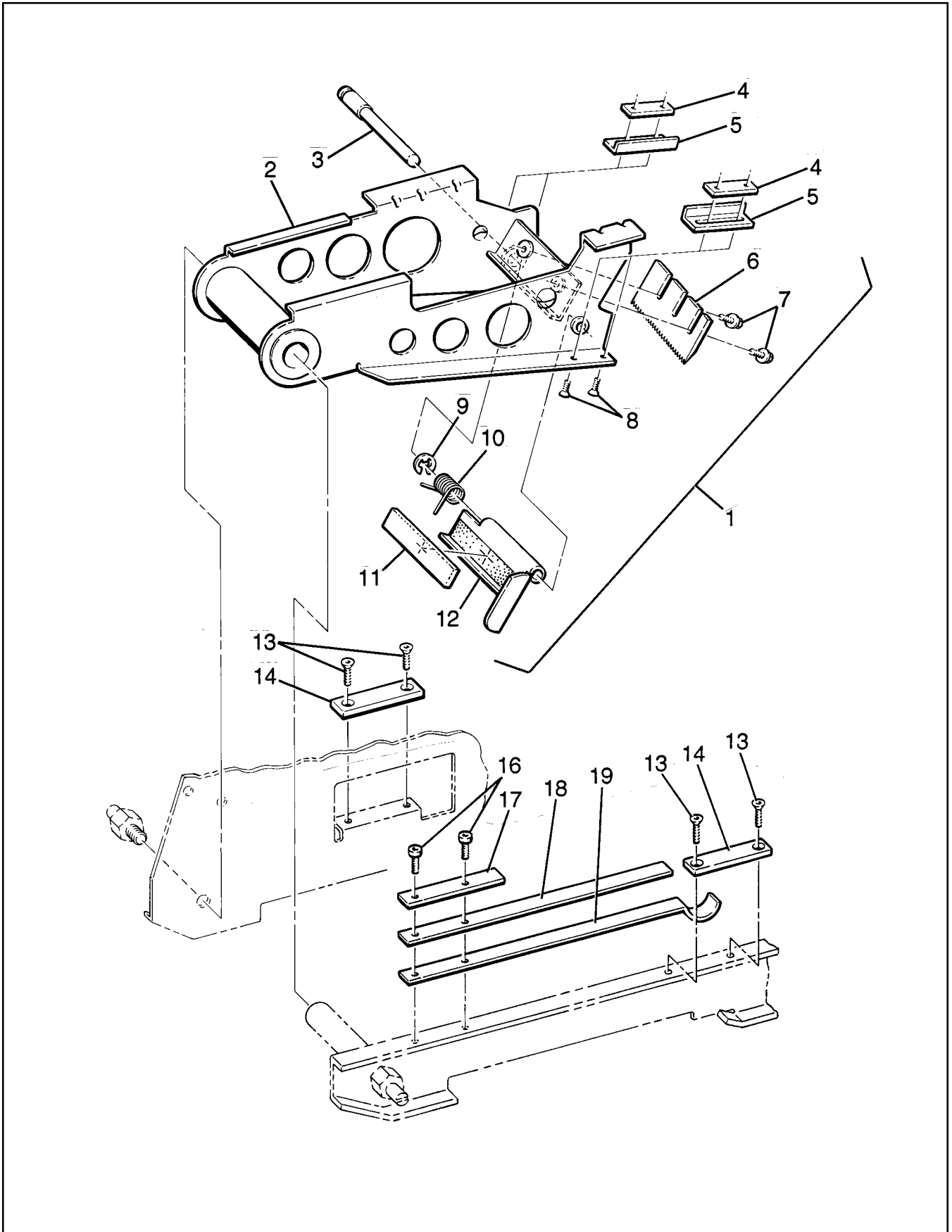


Figure 9

Figure 9 – HST 3-Inch, Type 29100

Ref. No.	3M Part No.	Description
1	78-8079-5001-5	Cut-Off Bracket Assembly (Upper Head) (Includes items 2-12)
	78-8070-1695-7	Cut-Off Bracket Assembly (Lower Head) (Includes items 2-12)
2	78-8079-5002-3	Frame - Cut-Off Bracket (Upper Head)
	78-8070-1696-5	Frame – Cut-Off Bracket (Lower Head)
3	78-8079-5008-0	Shaft – Blade Guard
4	78-8068-3788-2	Plate – Adjustment
5	78-8062-4187-9	Bracket – Leg Length
6	78-8079-5006-4	Blade
7	* 26-1009-4564-6	Screw – Cap, Soc Hd, #10-32 x 1/4 Lg
8	70-7023-8770-8	Screw – Cap, Flt Hd, #6-32 x 3/8 Lg
9	26-1008-9275-6	Retaining Ring – E-Ring, Waldes #5133-31
10	78-8079-5381-1	Spring – Torsion (Upper Head)
	78-8070-1430-9	Spring – Torsion (Lower Head)
11	78-8079-5000-7	Felt – Pad Assembly
12	78-8079-5003-1	Blade Guard Assembly (Upper Head)
	78-8070-1697-3	Blade Guard Assembly (Lower Head)
13	26-1009-8992-5	Screw – Cap, Flt Hd, Hex Soc, Self Locking, #6-32 x 3/8 Lg
14	78-8057-5704-0	Bumper – Cut-Off No. 2
16	70-7023-8470-5	Screw – Cap, Soc Hd, #10-32 x 3/8 Lg
17	78-8015-7030-6	Plate – Spring Retaining
18	78-8015-7212-0	Spring
19	78-8015-7029-8	Spring – Tape Cut-Off

* Not Stocked – Factory Order Only

HST 3-Inch, Type 29100

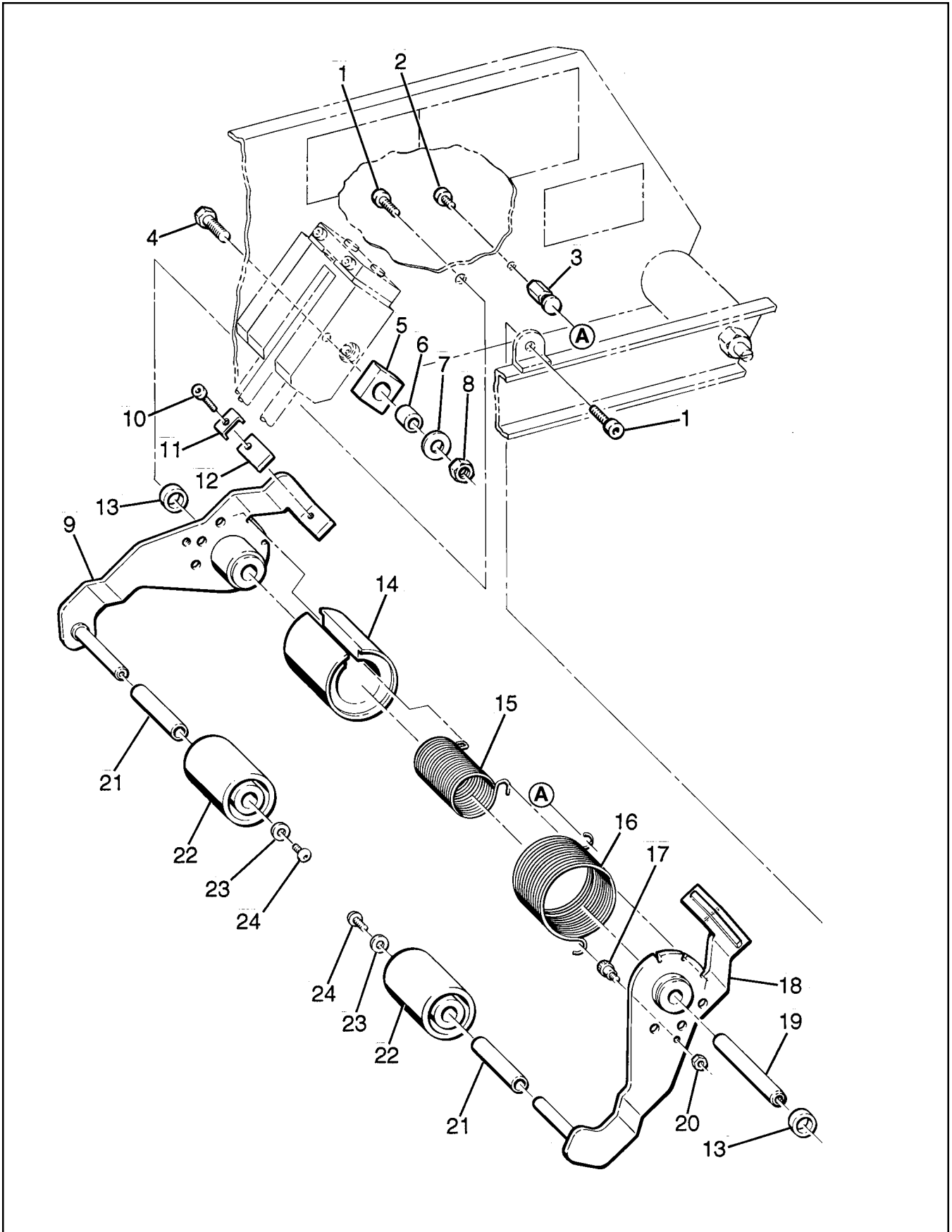


Figure 10

Figure 10 – HST 3-Inch, Type 29100

Ref. No.	3M Part No.	Description
1	* 70-8000-0885-9	Screw – Cap, Soc Hd, 5/16-18 x 3/8 Lg
2	70-8656-5938-0	Screw – Cap, Soc Hd, 1/4-20 x 1/2 Lg
3	78-8062-4204-2	Pin – Buffing
4	* 70-8000-5400-2	Screw – Cap, Hex Hd, 3/8-16 x 1-1/4 Lg
5	78-8070-1499-4	Bumper – Buffing
6	78-8062-3813-1	Hub – Bumper
7	* 78-8005-6119-9	Washer – Plain, Type A, 3/8
8	* 26-1000-9788-5	Nut – Hex, S-Lock, Nylon Insert, 3/8-16
9	78-8062-4212-5	Buffing Arm Assembly – W/Clip (Upper Head) (Includes items 10-12)
	78-8062-4171-3	Buffing Arm Assembly – W/Clip (Lower Head) (Includes items 10-12)
10	70-8656-5901-8	Screw – Cap, Soc Hd, #6-32 x 3/8 Lg
11	78-8062-3989-9	Clip – Arm
12	78-8062-3988-1	Bumper – Arm
13	78-8062-4200-0	Spacer – Buffing Shaft
14	78-8055-0965-6	Sleeve – Torsion Spring
15	78-8068-3940-9	Spring – Torsion, Inner (Upper Head)
	78-8015-7213-8	Spring – Torsion, Inner (Lower Head)
16	78-8068-3941-7	Spring – Torsion, Outer (Upper Head)
	78-8015-7214-6	Spring – Torsion, Outer (Lower Head)
17	* 26-1005-8127-6	Screw – Shoulder, Soc Hd, 5/16 Dia x 3/8 Lg
18	78-8062-4213-3	Buffing Arm Assembly (Upper Head)
	78-8062-4172-1	Buffing Arm Assembly (Lower Head)
19	78-8062-4199-4	Shaft – Buffing Arm
20	* 70-8000-5372-3	Nut – Hex, Jam, 1/4-20
21	78-8062-4194-5	Bushing – Buffing Roller
22	78-8062-4193-7	Roller – Buffing
23	* 26-1000-4442-4	Washer – Plain, Type A, #10
24	* 70-7023-4370-1	Screw – Cap, Button Soc Hd, #10-32 x 1/2 Lg

* Not Stocked – Factory Order Only

HST 3-Inch, Type 29100

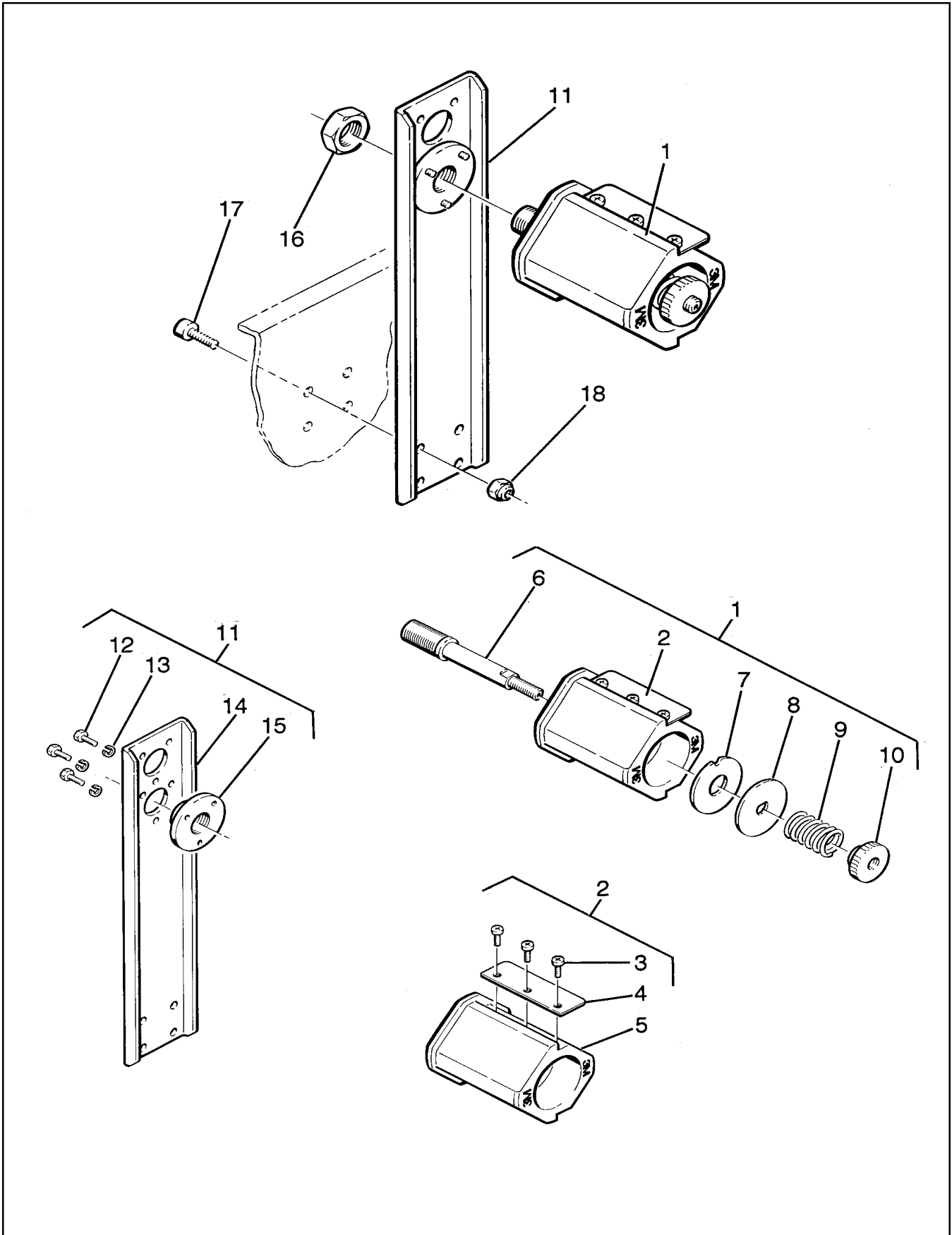


Figure 11

Figure 11 – HST 3-Inch, Type 29100

Ref. No.	3M Part No.	Description
1	78-8076-4732-2	Tape Drum/Shaft Assembly – 3 Inch (Includes items 2, 6-10)
2	78-8076-4731-4	Tape Drum Assembly – 3 Inch (Includes items 3-5)
3	26-1002-5753-9	Screw – Self Tapping
4	78-8054-8816-6	Spring – Leaf
5	78-8054-8815-8	Tape Drum
6	78-8060-8462-6	Shaft – Tape Drum, 3 Inch
7	78-8060-8172-1	Washer – Friction
8	78-8052-6271-0	Washer – Tape Drum
9	78-8054-8826-5	Spring
10	78-8060-7851-1	Ring Nut – Adjusting
11	78-8070-1618-9	Tape Drum Bracket Assembly (Includes items 12-15)
12	* 26-1003-5811-3	Screw – Hex Hd, M4 x 10
13	* 26-1010-0320-5	Lockwasher – Split, M4
14	78-8070-1472-1	Bracket – Tape Drum
15	78-8017-9090-4	Flange – Tape Holder Shaft Support
16	78-8017-9169-6	Nut – Hex, M18 x 1
17	* 70-7023-4290-1	Screw – Cap Soc Hd, 1/4-20 x 5/8 Lg
18	* 26-1000-9786-9	Nut – Hex, S-Lock, Plastic Insert 1/4-20

* Not Stocked – Factory Order only