

[54] **TAILORED BOW MAKING MACHINE**

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[58] Field of Search 156/474, 470, 290; 223/46, 30; 161/9, 10; 53/170, 182; 83/554, 564; 112/132

[56] **References Cited**

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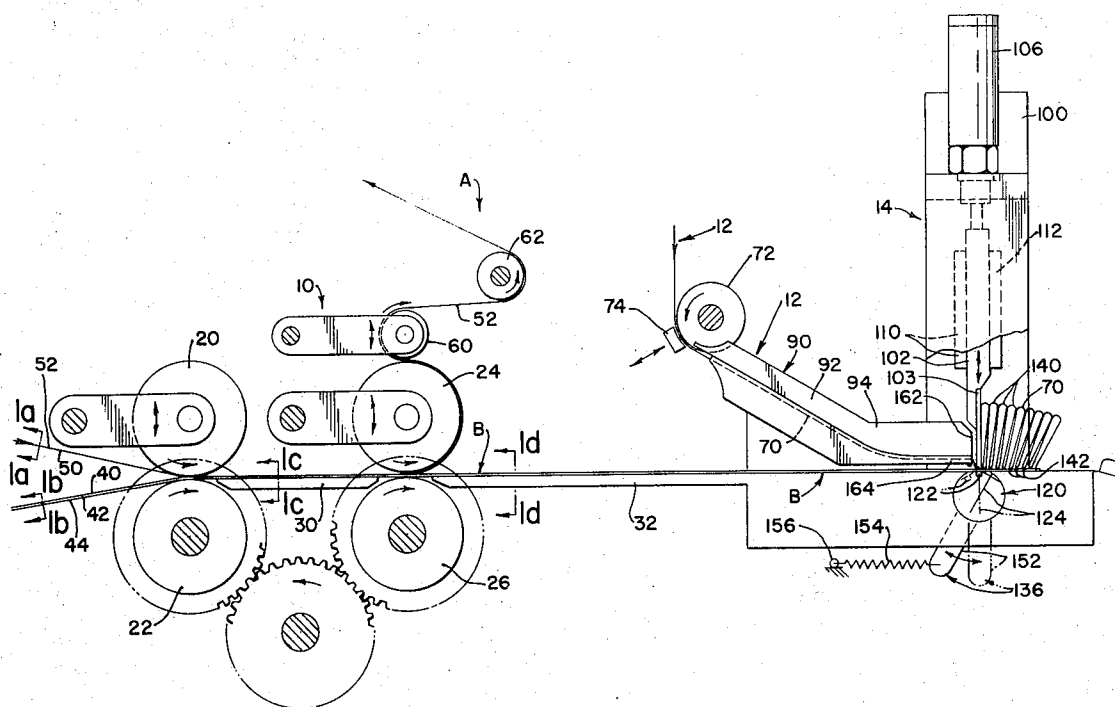
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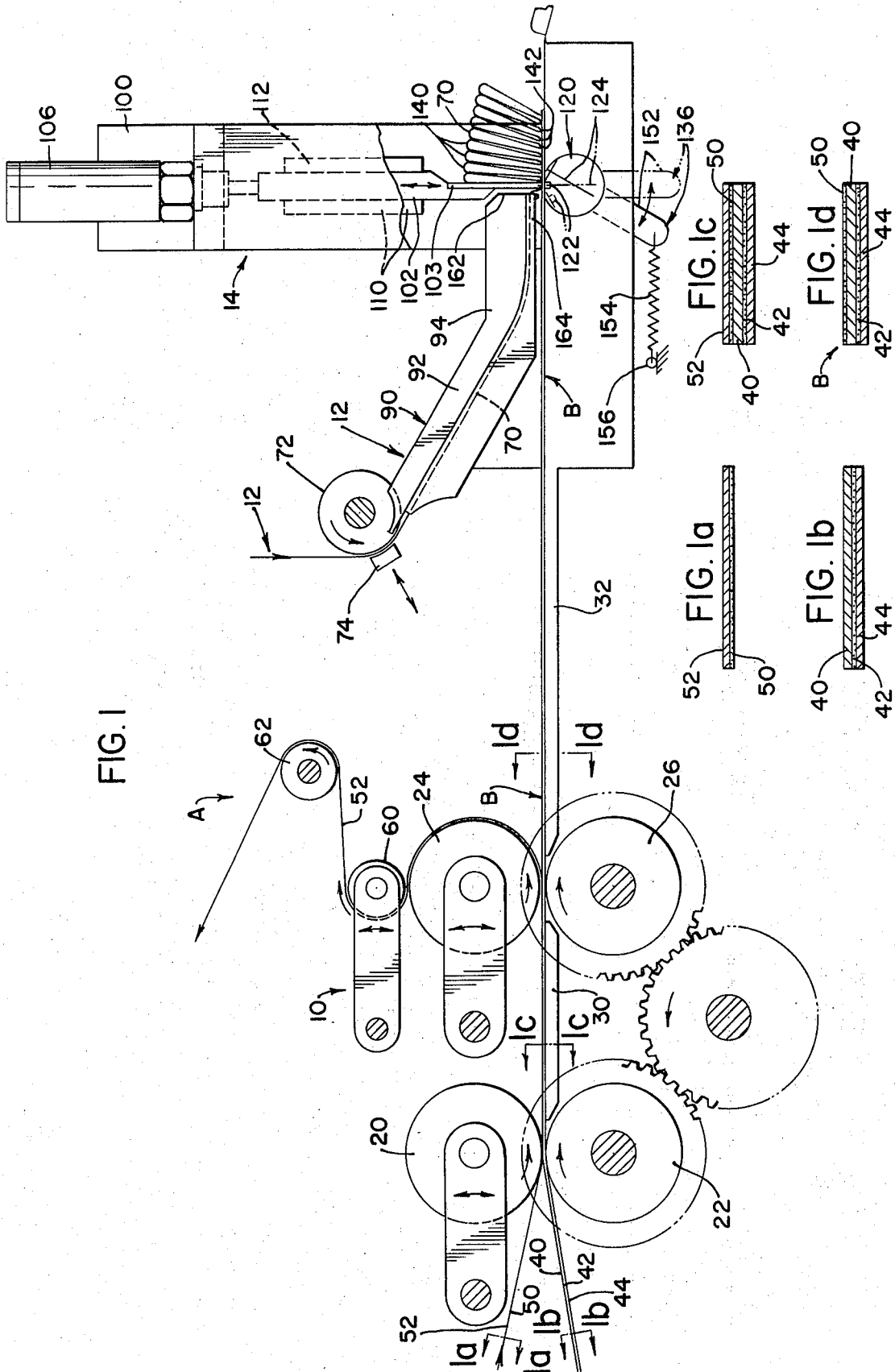
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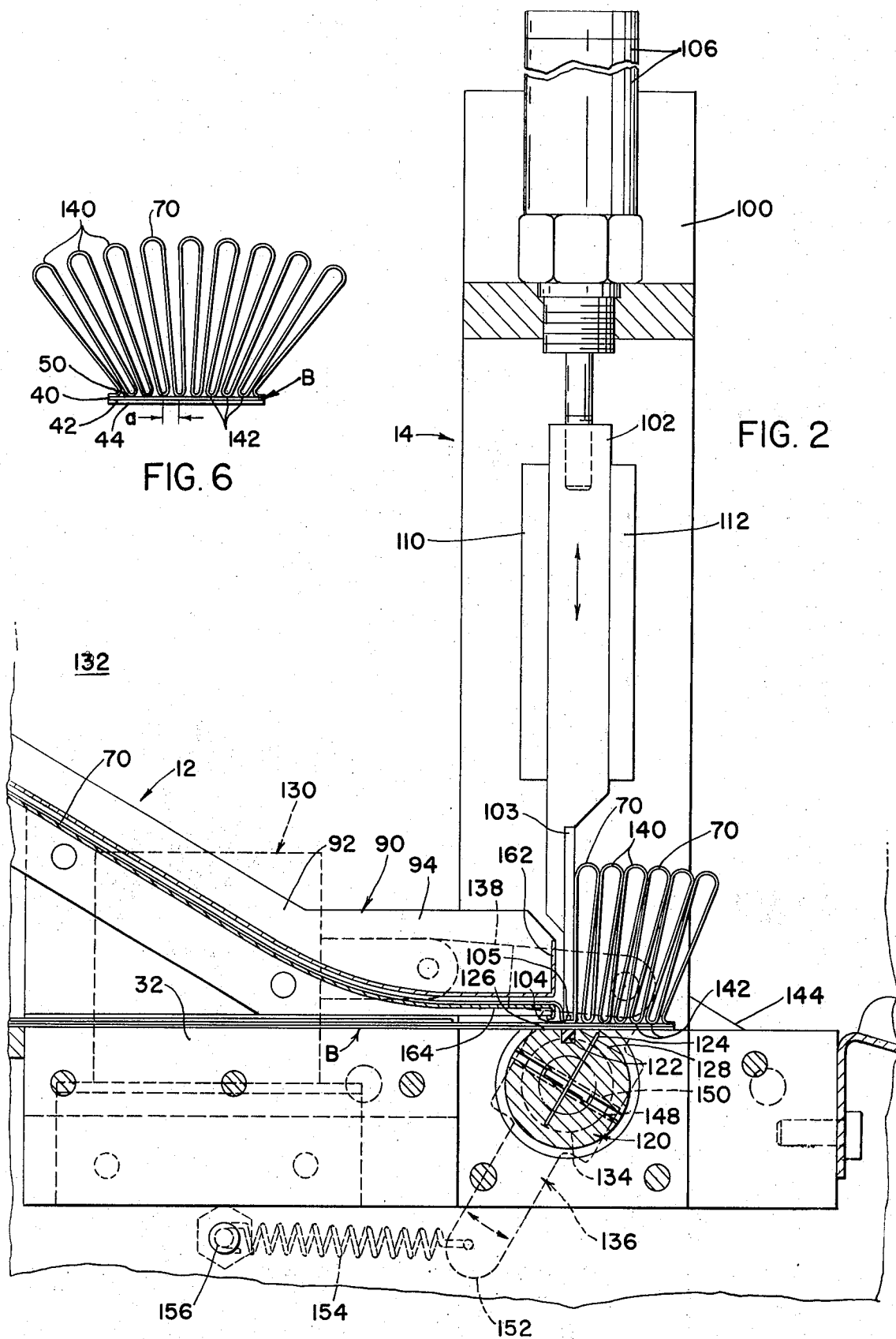
[57] **ABSTRACT**

Apparatus is disclosed for making a decorative bow including means for bringing together in converging paths a backing strip having an adhesive surface and a decorative ribbon. The ribbon is moved more rapidly than the backing strip, and by intermittently bonding the ribbon to the adhesive surface of the backing strip a plurality of ribbon loops are formed along the backing strip. Cooperable securing means and a blade component at the looping station of the apparatus provide an improved bonding and cut off arrangement, and intermittent feeding of ribbon and continuous feeding of backing material toward the looping station is provided to improve the loop forming operation.

18 Claims, 18 Drawing Figures







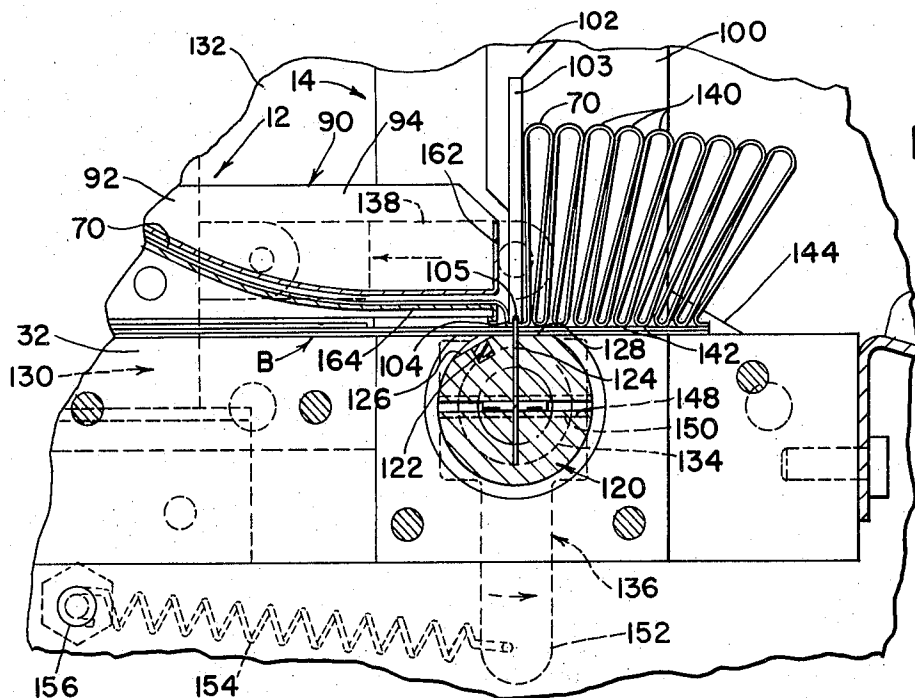


FIG. 3

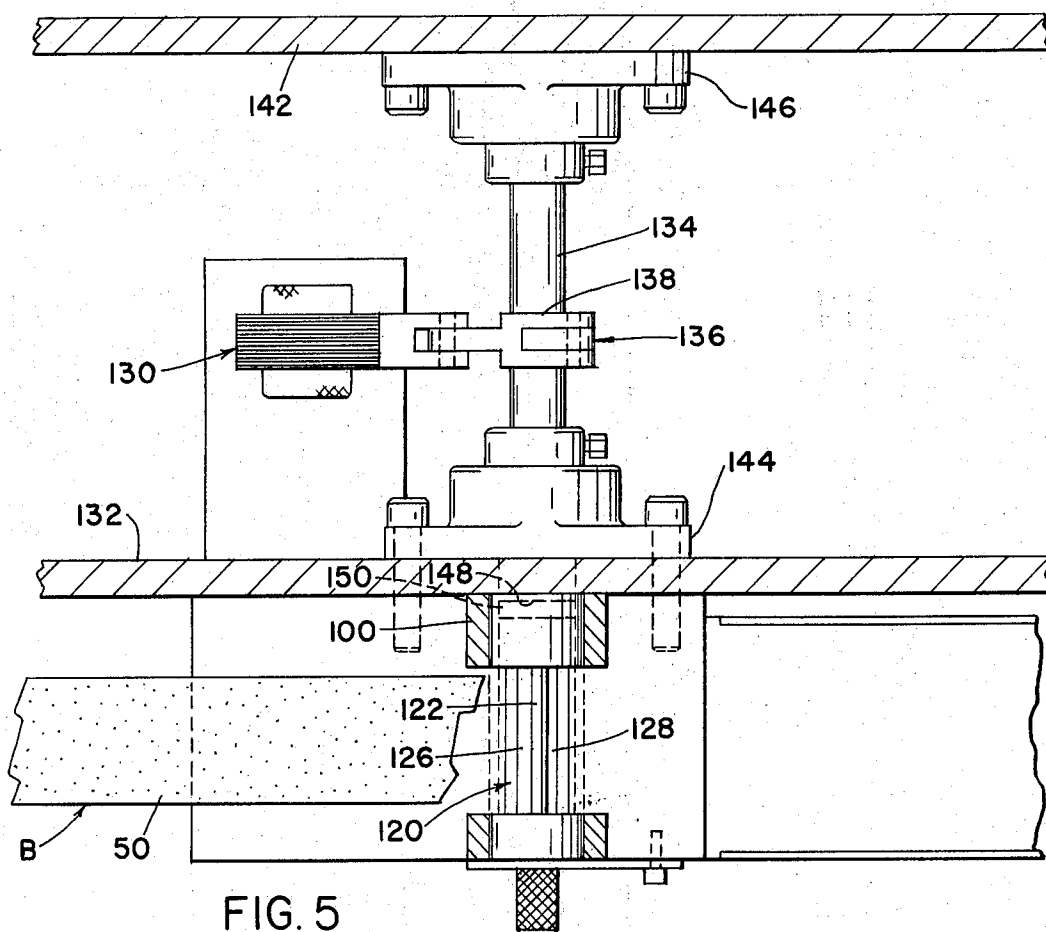
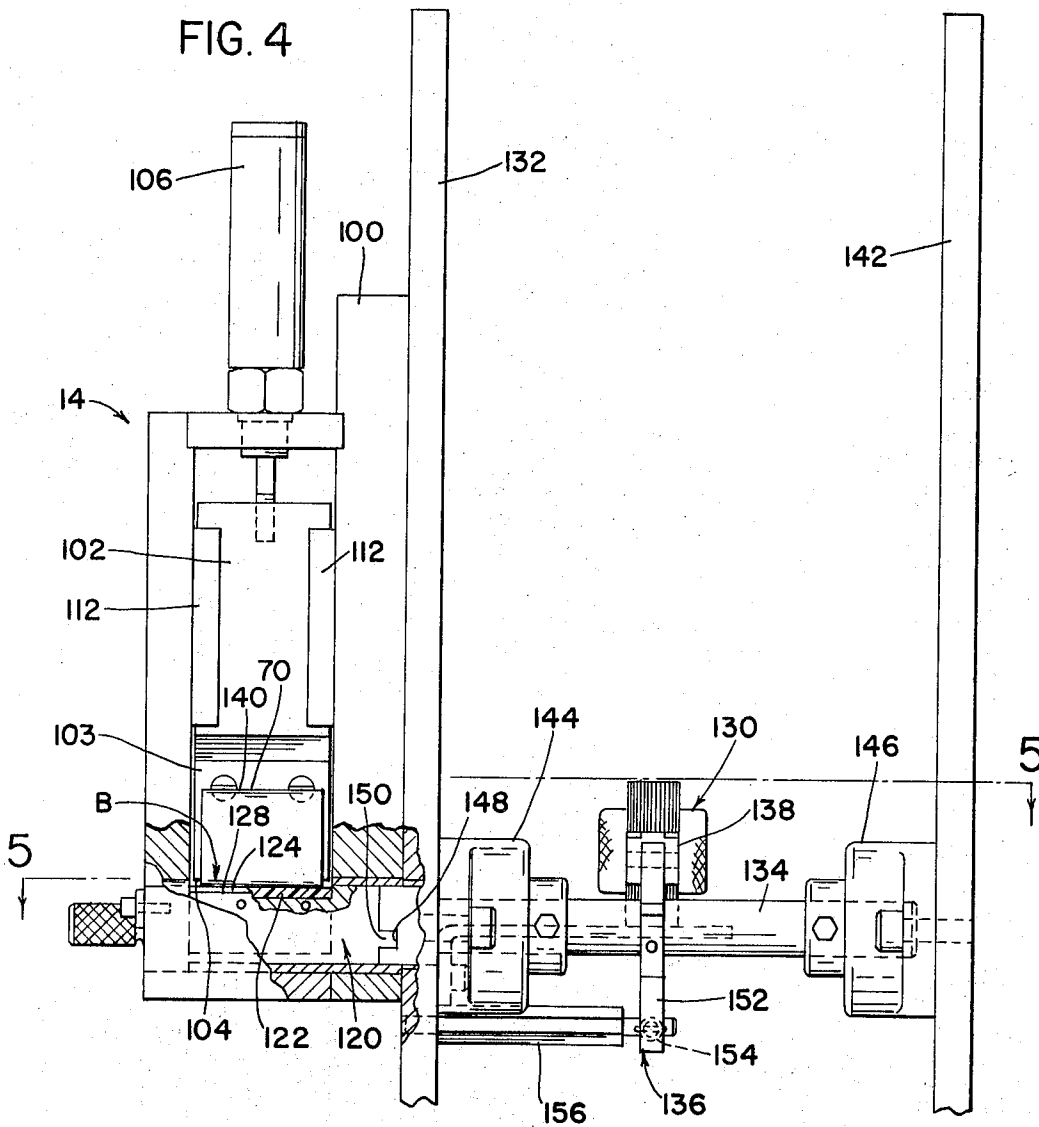
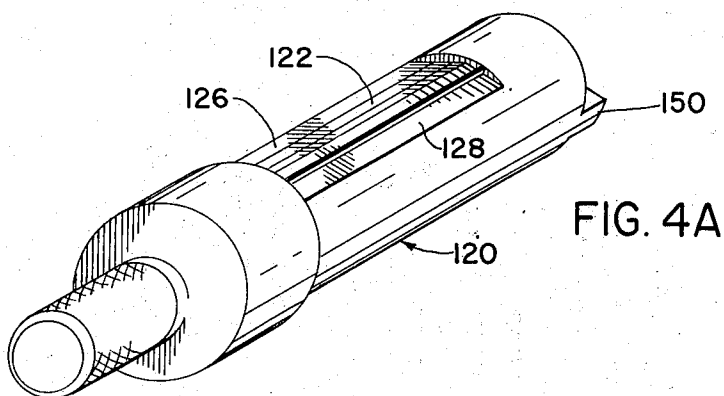
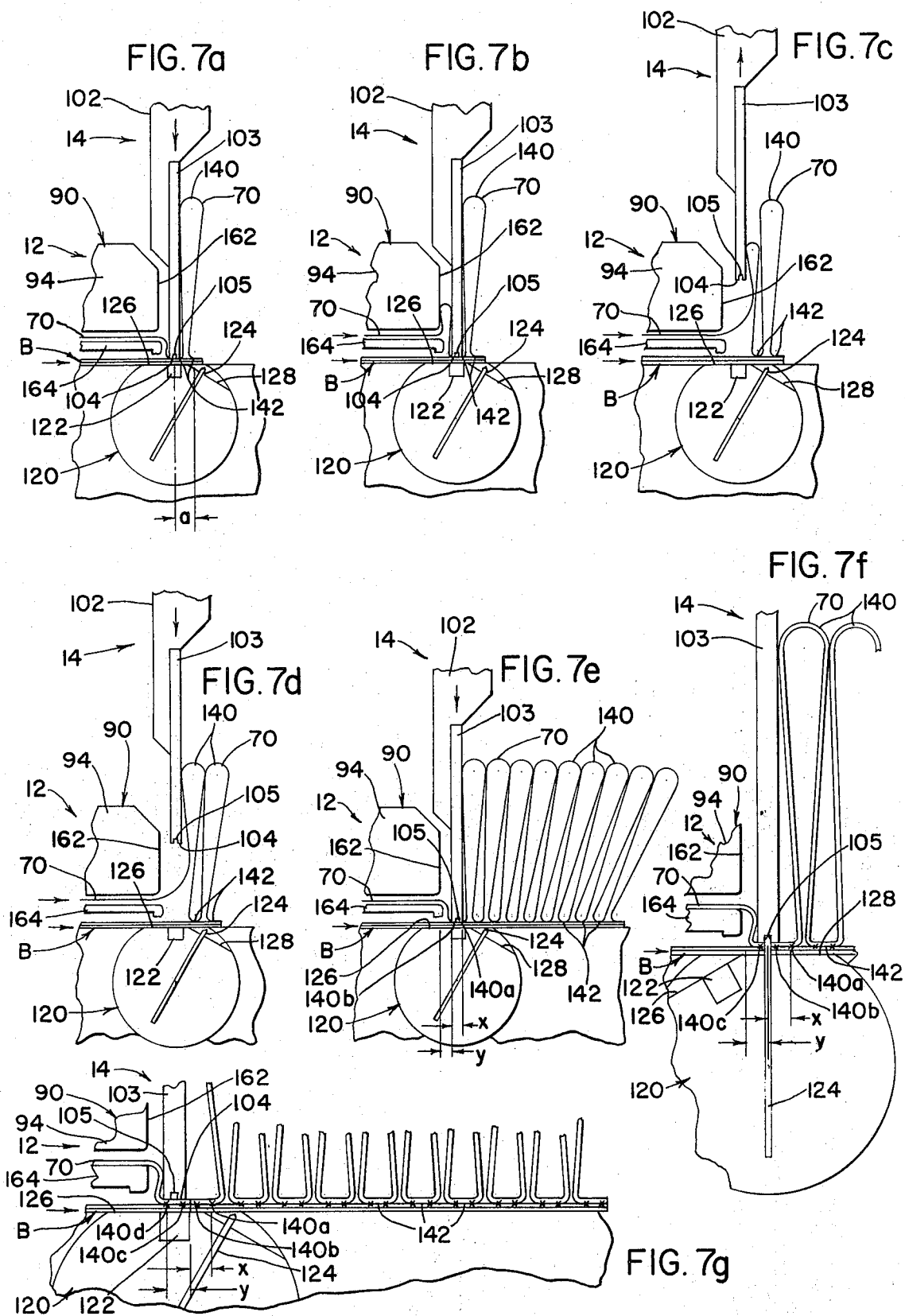


FIG. 5





TAILORED BOW MAKING MACHINE

The present invention relates to decorative bows and, more particularly, to improved apparatus for making decorative bows.

In accordance with the present invention, improved bow making apparatus is provided which includes means for affixing ribbon loops to backing strip material at spaced intervals therealong. The affixing means is defined by a looping station, means for feeding backing strip material to the looping station, separate means for feeding ribbon material to the looping station, and means for securing a portion of the ribbon material to the backing strip at spaced intervals therealong. The backing strip and ribbon are fed to the looping station in a manner whereby the ribbon forms a loop between the spaced intervals along the backing strip. A series of such loops along the backing strip forms a bow.

One form of apparatus for forming a bow in the foregoing manner is disclosed in the patent application of Grant H. Jordan, Ser. No. 37,167, filed May 14, 1970, now U.S. Pat. No. 3,616,974 and assigned to the assignee of the present application. Briefly, the apparatus disclosed therein comprises intermittently operated securing means for securing spaced portions of a continuous ribbon to an adhesive bearing surface of a backing strip at spaced intervals along the backing strip. The apparatus also includes means for advancing the backing strip for an area thereof to be in a selected position relative to the securing means, and means for actuating the securing means to press a portion of the ribbon against the area of the backing strip. Further, the apparatus includes means by which the ribbon is advanced toward the selected position in a manner which provides for a loop of ribbon to be formed behind the area of the backing strip, and means for then advancing the backing strip for the next adjacent area thereof to be in the selected position. Means can also be provided for again actuating the securing means to press a portion of the ribbon rearward of the loop against the backing strip at the next area. The machine is also provided with means for sequentially repeating the operation to form a series of loops and thus provide a tailored bow, and cut-off means spaced forwardly of the securing means for severing the ribbon and backing.

The improvements provided in accordance with the present invention will be described in conjunction with apparatus of the foregoing character; however, it will be appreciated that the improvements are applicable to other forms of apparatus for making bows.

Apparatus provided heretofore for producing tailored bows, including apparatus of the character described in the aforementioned application Ser. No. 37,167 include means positioned forwardly of the securing station for severing the ribbon and backing material to define bow units of a desired length. Such severing means generally is in the form of a reciprocating or pivotal blade which is intermittently actuated to achieve the cutting function. In order to prevent damage or severance of the opposed end loops of adjacent bow units, the adjacent units are positioned along the backing strip in spaced apart relationship so that the cutting blade can extend therebetween without engaging the end-most loops of the adjacent units. It will be appreciated that the loops of a bow unit are bunched together in a manner whereby the endmost loops of a unit are inclined in longitudinally opposite directions relative to the backing strip. Accordingly, in order to

sever the ribbon and backing strip between adjacent units in a manner to prevent damage or severing of the endmost loops, a considerable length of backing material and ribbon must be provided in the area between adjacent units as defined by the space between the points of interconnection of the opposed endmost loops with the backing material.

The length of backing material and ribbon between the point of interconnection of an endmost loop of a bow unit and the cut line defines excess material of considerable length and which is not necessary with respect to subsequent use of the bow unit. While the amount of such excess material relative to a given bow unit may seem quite small, it will be appreciated that the bow units are produced in extremely large quantities, whereby the total amount of excess material is considerable. Thus, the total amount of excess material becomes an item of considerable expense which increases the cost of production and, accordingly, the per unit cost of bows produced. The backing material employed in making such bows has adhesive means on one face thereof to facilitate the attachment of the completed bow unit to a package or the like, and such adhesive is protected prior to use of the bow unit by a peelable paper layer. This backing material is quite expensive. Moreover, if the backing material is provided on its opposite surface with an adhesive material to provide for securing the loops of the ribbon material to the backing strip the cost of the backing material is further increased. It will be appreciated therefore that the increased cost of production resulting from the loss of excess backing strip material between adjacent bow units during the production of a given number of bow units reaches considerable proportions.

In accordance with the present invention, production of bow units is achieved in a manner whereby no excess backing strip material exists between adjacent bow units. More particularly, in accordance with the present invention, intermittently operating securing means and cutting means is provided at the securing station of the apparatus and is operable at the securing station both to secure the loops of ribbon material to the backing strip and to sever the ribbon and backing material between the opposed endmost loops of adjacent bow units. More particularly, the securing means is operable to secure a plurality of loops of ribbon to the backing strip along the length thereof to define a bow unit of a given length or given number of loops. When a given number of loops has been formed the securing means operates to secure the trailing end of the endmost loop of one unit and the leading end of the endmost loop to be formed for the next adjacent units to the backing strip, and the cutting means operates to sever the backing material and ribbon between the secured leading and trailing ends. Accordingly, during continued operation of the apparatus successive bow units are formed free of any excess ribbon or backing strip material therebetween.

In accordance with a narrower aspect of the present invention the securing and cutting means is defined by cooperable vertically spaced components between which the backing strip and ribbon material are advanced. The lower component is movable between two positions relative to the upper component. In one of the two positions of the lower component it is cooperable with the upper component to provide for the loops of ribbon material to be secured to the backing strip. In

the other of the two positions of the lower component blade means thereon is aligned vertically with the upper component and is cooperable with the latter to secure the leading and trailing ends of the endmost loops of adjacent bow units to the backing strip and to sever the backing strip and ribbon along a line between the leading and trailing ends.

In accordance with a further aspect of the present invention, during a loop forming operation the backing strip material and ribbon material are fed towards the looping station and the ribbon material is fed at a faster rate than the feed of the backing strip material whereby an excess of ribbon material is provided at the looping station to form a loop. The feed of the backing strip is continuous throughout the forming and securing of the loop, and the feed of the ribbon material is interrupted following the forming of the loop. During the period when ribbon feed is interrupted, the securing means operates to secure the ribbon to the backing strip. The backing strip and ribbon are thereafter fed forwardly at different feed rates to provide for the forming of the next loop and the movement of the backing strip necessary for the next loop to be secured thereto at a spaced location from the point of securement of the preceding loop. By stopping the feed of the ribbon material during the securing operation, bunching of the ribbon material in the area of the leading end of the next adjacent loop is advantageously avoided. Continuous feed of the ribbon at a faster rate than the backing strip during the securing operation can result in such bunching as opposed to the smooth forming of the leading end of the succeeding loop, and it will be appreciated that bunching of the ribbon not only detracts from the appearance of the bow unit but may also require machine shut-down or rejection of the bow unit as unacceptable, whereby the overall result is an increase in production cost.

An object of the present invention is to provide improved apparatus for making decorative bows more economically than heretofore possible.

Another object of the present invention is to provide decorative bow making apparatus by which successive bow units can be produced without waste material therebetween.

A further object of the present invention is the provision of improved bow making apparatus wherein securement of loops of ribbon to a backing strip and severance of the ribbon and backing strip material to define bow units is achieved at a common work station of the apparatus.

Yet another object of the present invention is the provision of improved apparatus for making decorative bows having loops adhesively adhered to a backing strip and wherein adherence of the loops to the backing strip and severance of the loop material and backing strip material is achieved by improved cooperable pressing and cut off means disposed at a common work station of the apparatus.

Still another object of the present invention is the provision of bow making apparatus having an improved feed arrangement for feeding backing strip material and ribbon relative to a looping station of the apparatus for the forming of loops of ribbon to be secured to the backing strip.

The foregoing objects and others will in part be obvious and in part more fully pointed out hereinafter in

conjunction with the description of the accompanying drawings in which:

FIG. 1 is an elevational view showing schematically a bow making machine constructed in accordance with the present invention;

FIGS. 1a, 1b, 1c and 1d are enlarged cross-sectional view taken generally along lines 1a—1a, 1b—1b, 1c—1c, and 1d—1d respectively of FIG. 1;

FIG. 2 is an enlarged side elevational view showing the looping station and the positional relationship between the securing blade and anvil during a loop securing step;

FIG. 3 is a side elevational view of the looping station and showing the positional relationship between the securing blade and cutter blade during an end loop securing and strip cutting step;

FIG. 4 is an enlarged front elevational view of the securing blade and the anvil and cutter blade unit;

FIG. 4A is a perspective view of the anvil and cutter blade assembly;

FIG. 5 is a plan view, partially in section of the anvil and cutter blade unit looking along line 5—5 in FIG. 4;

FIG. 6 is a side view showing a bow made in accordance with the present invention; and

FIGS. 7a—7g are schematic views illustrating the operating sequence of the embodiment of the invention shown in FIG. 1.

Referring now to the drawings wherein the showings are for the purpose of illustrating a preferred embodiment of the invention only, and not for the purpose of limiting same, FIG. 1 shows an apparatus A for forming a tailored bow such as the bow illustrated in FIG. 6 and including strip feeding mechanism 10, ribbon feeding mechanism 12 and looping station 14.

A variety of structures could be used to feed a back up strip into the mechanism; however, in accordance with the illustrated embodiment of the invention, the strip feeding mechanism 10 includes pinch rolls 20, 22 and pinch rolls 24, 26 which coact with guides 30, 32 to define a first path along which the backing strip progresses through the apparatus A. Rolls 20, 24 are pivoted so that they apply a controlled pressure upon the backing strip. The rolls are rotated by gear 34 which is driven at a rate of rotation to provide the desired speed of movement of the backing strip through the apparatus. The backing strip is a relatively rigid, free-standing strip 40 which includes a pressure sensitive lower lay 42 over which there is provided a removable protective strip 44. In the feeding mechanism the backing strip is provided with a pressure sensitive tape 50 having an upper removable strip 52 to allow coiling prior to being fed into the feeding mechanism. As the strips 40 and 50, shown in FIGS. 1a and 1b, respectively, are brought together they are adhered to form a composite multi-layer strip as is illustrated in FIG. 1c. After this composite strip is formed, the protective strip 52 is removed around roll 24 by using rolls 60 and 62. Thereafter, the backing strip is identified as strip B, as shown in FIG. 1d. This strip includes as its upper layer the pressure sensitive adhesive tape 50. This strip is then moved along the path defined by guide 32 to the looping station 14.

A decorative ribbon 70 is also fed to the looping station. The feeding mechanism 12 includes a continuously driven feed roll 72 and an intermittently actuated pressure shoe or pad 74. Ribbon 70 passes beneath feed roll 72 from a ribbon source, not illustrated, and

shoe 74 is adapted to press ribbon 70 against the roll for the roll to feed the ribbon toward looping station 14. The pressure of shoe 74 against roll 72 allows roll 72 to drive the ribbon at an average speed greater than the average speed of strip B. This feature causes looping of the ribbon, in a manner to be described later. Shoe 74 is intermittently reciprocated toward and away from roller 72 in coordination with machine operation to start and stop the ribbon feed, for the purpose set forth more fully hereinafter. After passing under the roll 72, the ribbon 70 is guided along a path converging with the path of strip B through a guide chute 90 having a first portion 92 extending generally toward the strip B and a second portion 94 generally parallel to the strip B. This causes the ribbon 70 to converge with the strip B at the looping station.

Referring now to looping station 14, which is best illustrated in FIGS. 2 and 3, this station includes a frame 100 which supports upper securing means which in the present embodiment is in the form of ram or blade means 102 vertically reciprocable in frame 100. Ram means 102 carries a blade component 103 having a lowermost edge 104 provided with a recess 105 for the purpose set forth hereinafter. Cylinder 106 reciprocates ram means 102 in a timed relationship with the rotation of the gear 36 in a manner to be described. Guide plates 110 and 112 on opposite sides of ram means 102 assure reciprocal movement of the ram means in a path generally perpendicular to the paths of the ribbon 70 and strip B. Strip B is guided under the lower edge of blade 103, and side guide means, not illustrated, may be provided for maintaining the strip in the proper lateral position as it passes through the looping station 14. Below the blade 103 there is provided a pivotal cylindrical component 120 to be described in more detail hereinafter and which includes lower securing means preferably in the form of a resilient pad 122, and cutter means defined by a blade 124. Pad 122 and blade 124 are circumferentially spaced apart about cylindrical component 120 and are selectively positionable in vertical alignment with blade 103. When pad 122 is aligned vertically with blade 103 as illustrated in FIG. 2, the pad allows the lower edge 104 of blade 103 to force ribbon 70 against the pressure sensitive adhesive layer 50 of the backing strip to secure loops 140 at spaced areas 142 which may be spaced in a longitudinal direction of the backing strip any desired distance, represented as a in FIG. 6. This distance may be changed by varying the timing of ram means 102 and the rotation of the feed rolls between the down strokes of the ram means. When blade 124 is vertically aligned with blade 103 as illustrated in FIG. 3, lower edge 104 of blade 103 forces ribbon 70 and the backing strip against blade 124 which then cuts the ribbon and backing. Recess 105 receives blade 124 to assure complete cutting of the materials and to permit pressing of the ribbon on opposite sides of the cut line against adhesive 50.

The structure and operation of the lower securing means and cutter assembly is illustrated in FIGS. 4, 4a and 5 of the drawing. In this respect, cylindrical component 120 of the assembly is supported beneath ram means 102 for pivotal movement about an axis generally perpendicular to the line of movement of the ribbon and backing strip relative to looping station 14. The outer surface of component 120 is provided with a pair of circumferentially adjacent flat surfaces 126

and 128. Surface 126 is provided with a longitudinal recess in which pad 122 is disposed to define anvil means. It will be appreciated, however, that surface 126 alone could define anvil means and thus lower securing means cooperable with the upper securing means. Pad 122 may be defined by any suitable resilient material and, preferably, is formed of silicone rubber. Surface 128 is provided with a longitudinal slot adapted to receive cutter blade 124. Any suitable means may be provided for retaining blade 124 in the slot and, preferably, the blade is releasably retained in the slot to facilitate removal thereof for sharpening or replacement purposes.

In the embodiment illustrated, the opposite ends of cylindrical component 120 extend through openings provided in frame means 100 to pivotally support the cylindrical component beneath ram means 102. Pivotal movement of component 120 to move either pad 122 or blade 124 into vertical alignment with blade 103 is achieved through the use of solenoid means 130 suitably supported in fixed relationship with respect to frame means 132 of the apparatus. Solenoid means 130 will, of course, be connected to a suitable source of electrical power through switch means operable in response to machine operation to energize and de-energize the solenoid means to achieve the desired positioning of the anvil and blade 124 relative to ram means 102. Solenoid means 130 and component 120 are operatively interconnected through shaft means 134, a lever component 136 mounted on the shaft means and link means 138 having opposite ends pivotally interconnected one with lever 136 and the other with the output shaft of the solenoid. Shaft means 134 extends between frame components 132 and 142 of the apparatus and is supported for rotation by bearing means 144 and 146 mounted respectively on frame means 132 and 142. Shaft means 134 extends through frame means 132 and has a notch 148 in the end thereof adapted to receive a correspondingly contoured tongue 150 provided on the adjacent end of component 120. Notch 148 and tongue 150 operatively interengage shaft means 134 and component 120 in a manner whereby pivotal movement of shaft means 134 imparts a corresponding pivotal movement to component 120. Lever 136 includes a lower portion 152 to which one end of a biasing spring 154 is attached. The other end of biasing spring 154 is fixed relative to frame means 132 such as by a spring mounting stud 156 mounted on the frame. Component 120 is normally positioned with pad 122 thereof vertically aligned beneath blade means 103 and is biased into this disposition by spring 154. When solenoid 130 is energized shaft means 134 is pivoted to pivot component 120 in the direction to move blade 124 into vertical alignment beneath ram means 102. Upon de-energization of solenoid 130 spring 154 returns shaft means 134 and component 120 to the original positions thereof. It will be appreciated, however, that pivotal movement could be imparted to shaft means 134 in any suitable manner and by means other than solenoid means. Moreover, while a cylindrical anvil and blade component is preferred it will be appreciated that other anvil and blade means and means for imparting movement thereto could readily be provided. For example, the anvil and blade means could be longitudinally reciprocable relative to the looping station as opposed to being pivotal with respect thereto.

Turning now to the operating sequence of apparatus A, reference is made to FIGS. 7a-7g. In FIG. 7a, the backing strip B is advancing at its continuous speed, ribbon 70 is stopped and ram or blade means 102 is forced downwardly for surface 104 of blade 103 to press ribbon 70 onto the upper adhesive surface of strip B at position 142. This forms a loop 140. Anvil pad 122 is positioned vertically beneath blade 103 during the pressing operation and, as mentioned hereinabove feeding of the ribbon material is stopped by moving shoe 74 away from roll 72. Operation of shoe 74 for this purpose will, of course, be coordinated with the downward movement of ram means 102. Thereafter, ram means 102 is raised and backing strip B and ribbon 70 are simultaneously advanced whereby strip B is moved to advance the next securing position thereon toward the securing means. Ribbon 70 is advanced at a greater speed than strip B, whereby ribbon material gathers behind ram means 102 progressively forming a loop as shown in FIGS. 7b and 7c. When the advance of strip B approaches the distance *a* the strip and ribbon are in the positions shown in FIG. 7d. It will be noted that the ribbon 70 contacts the previously formed loop 140. The strip B continues to advance and when distance *a* has been traveled the feed of ribbon 70 is stopped and ram 102 again moves downwardly and the lower surface of blade 103 engages and presses the ribbon 70 against strip B. This forms another loop 140. This process is continued until the desired number of loops are formed.

During the forming of the last loop of a bow unit and the first loop of a succeeding bow unit upper blade 103 and component 120 undergo a sequence of movements which provide for securing the trailing and leading ends of the successive loops and cutting the ribbon and backing strip therebetween. This sequence of operation is illustrated in FIGS. 7e-7g. As mentioned hereinabove backing strip B moves continuously and accordingly is advancing relative to the securing station during the end forming operation. When the last loop has been formed, ribbon feed is stopped and the end loop is secured to strip B at location 140a by engagement of blade surface 104 with the ribbon in the manner described above. At this time blade 103 and anvil pad 122 are positioned as illustrated in FIG. 7e. Ram 102 then rises and component 120 is pivoted to position cutter blade 124 beneath blade 103. Since strip B is advancing ribbon 70 is pulled therewith and when the strip and ribbon have advanced a short distance designated *x* ram 102 descends, whereby the lower surface 104 of blade 103 presses downwardly against the ribbon and the ribbon and strip B are severed as illustrated in FIG. 7f. As further illustrated in FIG. 7f, the latter pressing and cutting operation causes blade 124 to enter recess 105 in upper blade 103 and the portions of lower surface 104 of blade 103 on opposite sides of recesses 105 to press the underlying portions of ribbon 70 against the adhesive on strip B. Thus, the trailing end of the endmost loop on the formed bow unit is secured at two adjacent locations 140a and 140b to strip B and at this time the leading end of the next bow unit is secured to strip B at location 140c. Ram 102 is immediately raised again and when strip B has further advanced a distance designated *y* the ram descends. During the latter raising and descending movement of the ram component 120 is pivoted to again position anvil pad 122 beneath blade 103, whereby descent of the ram causes blade surface

104 to engage ribbon 70 and further secure the leading end of the next loop to strip B at location 140d. Following this securing step the ribbon feed is started to form loops for the next bow unit in the manner hereinabove described.

The end securing and cut-off sequence described above is preferred in that it provides for a larger area of securement of the ribbon ends with the corresponding portion of backing strip B to assure against unintended separation thereof. Nonetheless, it will be appreciated that a single securing and cut-off step could be employed as described above with reference to FIG. 7f. It will be appreciated that in the preferred end securing and cut-off sequence described, the strokes of the ram will be rapid in order to achieve the first securing, cut-off and second securing steps with a minimum of displacement of strip B in the advancing direction. Thus, the reciprocating movements of the ram will be coordinated with the speed of movement of strip B so that the desired securement of the loop ends is achieved using a minimum of backing strip and ribbon. The distances *x* and *y* will be generally equal and might, for example, correspond to the thickness of blade 103. This would place the locations of securement between the ribbon and backing longitudinally adjacent one another. Clearly, however, these distances could be greater or less than the blade thickness and the actual distances used can be varied to provide the area of bond and length of end material desired for a given bow unit.

While considerable emphasis has been placed on the fact that the cutting blade is positioned below ram blade 103 and the latter notched to receive the cutter, it will be appreciated that other structural arrangements for the cutter blade can readily be provided. For example, the cutter blade could be associated with the upper securing means and component 120 could be provided with a cooperable recess or cut-off blade. Further, while the upper and lower securing means have been disclosed as blade and anvil means cooperable to press the ribbon against an adhesive surface on the backing to secure the ribbon to the backing, it will be appreciated that the securing means can readily be defined by other cooperable securing components such as, for example, cooperable stapling components. Still further, while the pivotal anvil and blade assembly preferably is cylindrical, other pivotal anvil and blade structures are possible as well as anvil and blade movements other than pivotal. Moreover, it will be appreciated that the lower securing means and cutter blade could be separate from one another as opposed to being provided with common support means. It will be appreciated too that the upper securing means could be fixed during the ribbon securing operation and the lower securing means and cutter blade reciprocable relative thereto, or that the upper and lower components could both be reciprocable or otherwise relatively movable.

As many possible embodiments of the present invention may be made and as many possible changes may be made in the embodiment herein set forth, it is to be distinctly understood that the foregoing descriptive matter is to be interpreted merely as illustrative of the present invention and not as a limitation.

I claim:

1. In a machine for making a decorative bow including a plurality of upstanding loops of ribbon on a backing strip and comprising feeding and forming means op-

erable to feed backing strips and ribbon material along a feed path and relative to a looping station of the machine and to form loops of ribbon, cooperable securing means on opposite sides of said feed path for securing the loops to one surface of the backing strip at spaced locations therealong, said securing means being disposed at a fixed location along said feed path, and means for intermittently driving at least one of said cooperable securing means toward the other for the securing means to cooperate to secure said ribbon to said one surface of said backing strip, and cut-off means to cut the backing strip and ribbon, the improvement which comprises: said cut-off means including cooperable cutting means on said opposite sides of said feed path at said fixed location.

2. The improvement according to claim 1, wherein said cooperable cutting means includes blade means on one of said opposite sides of said feed path cooperable with the securing means on the other side of said path.

3. The improvement according to claim 2, wherein said securing means on the other side of said feed path is a blade component reciprocable generally perpendicular to said feed path and said blade means is movable into and out of cooperating cutting alignment with said blade component.

4. The improvement according to claim 2, wherein said blade means and said securing means on the other side of said feed path are relatively reciprocable in cooperating cutting alignment and said blade means is movable into and out of cutting alignment with said securing means on said other side of said feed path.

5. The improvement according to claim 2, wherein the securing means on the one side of said feed path is anvil means, said securing means on the other side of said feed path is reciprocable along a second path generally perpendicular to said feed path, and said blade means and anvil means are selectively movable respectively into alignment with said second path.

6. The improvement according to claim 5, wherein said reciprocable securing means includes a blade component having surface means cooperable with said anvil means and a slot cooperable with said blade means.

7. The improvement according to claim 5, wherein said anvil means and blade means are supported for alternate movement into alignment with said second path.

8. In a machine for making a decorative bow including a plurality of upstanding loops of ribbon on a backing strip and comprising feeding and forming means operable to feed backing strips and ribbon material along a feed path and relative to a looping station of the machine and to form loops of ribbon, cooperable securing means on opposite sides of said feed path for securing the loops to one surface of the backing strip at spaced locations therealong, said securing means being disposed at a fixed location along said feed path, and means for intermittently driving at least one of said cooperable securing means toward the other for the securing means to cooperate to secure said ribbon to said one surface of said backing strip at said fixed location, and cutoff means to cut the backing strip and ribbon, the improvement which comprises: said cut-off means including cooperable cutting means on said opposite sides of said feed path at said fixed location, said cooperable cutting means including blade means on one of said opposite sides of said feed path cooperable with

the securing means on the other side of said path, said securing means on the one side of said feed path being anvil means, said securing means on the other side of said feed path being reciprocable along a second path generally perpendicular to said feed path, said blade means and anvil means being selectively movable respectively into alignment with said second path, and said anvil means and blade means being supported for pivotal movement into and out of alignment with said second path.

9. The improvement according to claim 8, wherein said pivotal movement is about a common pivot axis.

10. The improvement according to claim 9, wherein said anvil means and blade means are pivotal together and in opposite directions about said axis for alternate movement thereof into and out of alignment with said second path.

11. The improvement according to claim 9, wherein said reciprocable securing means includes a blade component having surface means cooperable with said anvil means and a slot co-operable with said blade means.

12. The improvement according to claim 1, and the further improvement comprising said feeding and forming means including means to continuously feed the backing strip toward said looping station at a first average speed and means to feed the ribbon toward said looping station at a greater average speed than said first average speed whereby loops of said ribbon are formed between said spaced locations along said strip, said ribbon feed means including means for interrupting ribbon feed during operation of said cooperable securing means to attach said loops to the backing strip.

13. The improvement according to claim 5, and the further improvement comprising said feeding and forming means including means to continuously feed the backing strip toward said looping station at a first average speed and means to feed the ribbon toward said looping station at a greater average speed than said first average speed whereby loops of said ribbon are formed between said spaced locations along said strip, said ribbon feed means including means for interrupting ribbon feed during operation of said cooperable securing means to attach said loops to the backing strip.

14. In a machine for making a decorative bow including a plurality of upstanding loops of ribbon on a backing strip and comprising feeding and forming means operable to feed backing strips and ribbon material along a feed path and relative to a looping station of the machine and to form loops of ribbon, cooperable securing means on opposite sides of said feed path for securing the loops to one surface of the backing strip at spaced locations therealong, and means for intermittently driving at least one of said cooperable securing means toward the other for the securing means to cooperate to secure said ribbon to said one surface of said backing strip, and means to cut the backing strip and ribbon, the improvement which comprises: said feeding and forming means including means to continuously feed the backing strip toward said looping station at a first average speed and means to feed the ribbon toward said looping station at a greater average speed than said first average speed whereby loops of said ribbon are formed between said spaced locations along said strip, said ribbon feed means including means for interrupting ribbon feed during operation of said cooperable securing means to secure said loops to the backing strip.

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15. A method of forming a decorative bow comprising: establishing a looping station, said station including a reciprocating blade, continuously feeding a strip of backing material having an adhesive surface to said looping station at a first speed, feeding a strip of ribbon to the looping station at a second speed greater than said first speed whereby a loop of ribbon is formed at said looping station, interrupting said ribbon feed when said loop is formed and actuating said blade to secure the base of the loop to said adhesive surface, repeating the steps until a desired number of loops are formed, and then cutting the ribbon and backing to provide a bow.

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16. The method according to claim 15, wherein said looping station includes cutting means cooperable with said blade, and cutting the ribbon and backing at said looping station to provide said bow.

17. The method according to claim 16, and actuating said blade prior to cutting the ribbon and backing to secure an area of the ribbon adjacent the cut to the backing strip of the bow.

18. The method according to claim 17, and actuating said blade following cutting of the ribbon and backing to secure an area of the ribbon adjacent the cut to the end of the backing strip from which the bow is cut.

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