Nov. 25, 1958 C. W. STROUP 2,861,546

PORTABLE RESTRAINING DEVICE FOR CATTLE

Filed May 31, 1957 3 Sheets-Sheet 1

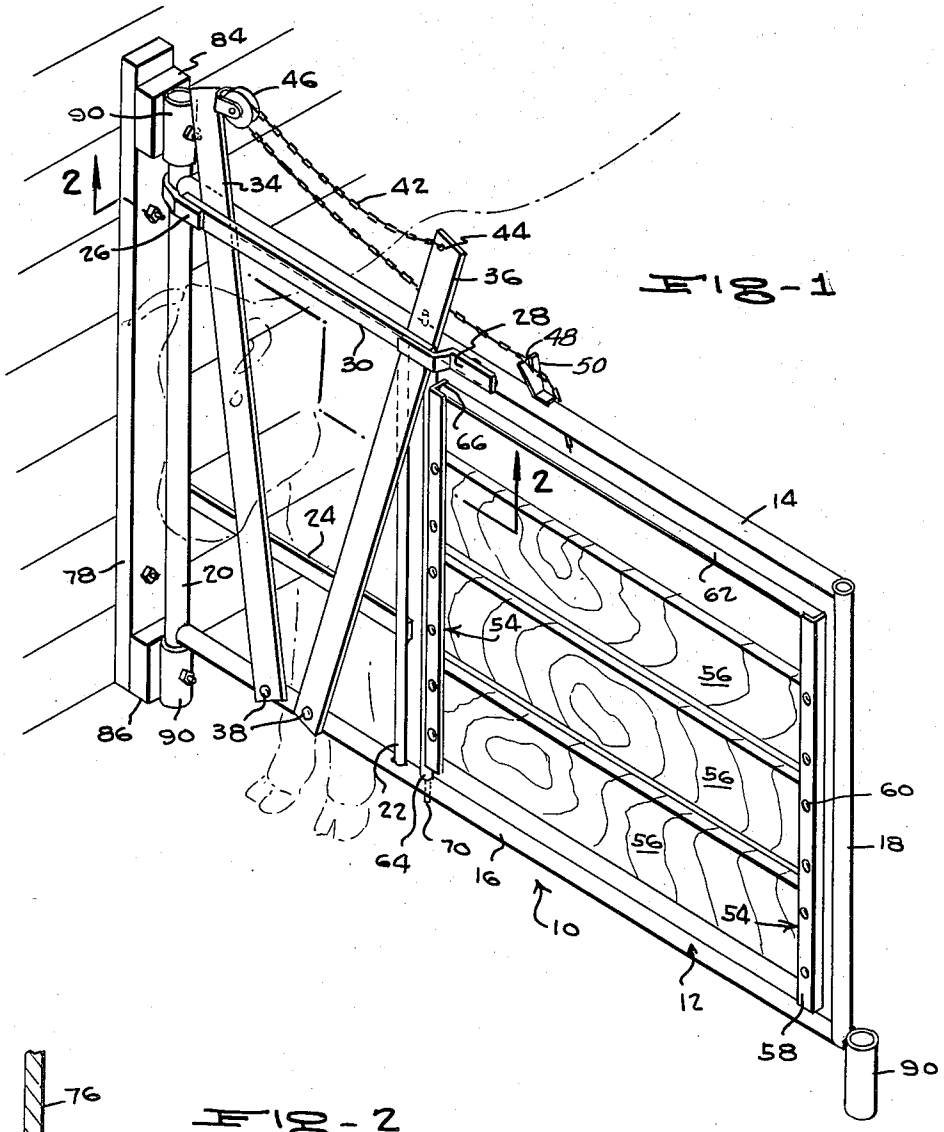


FIG-1

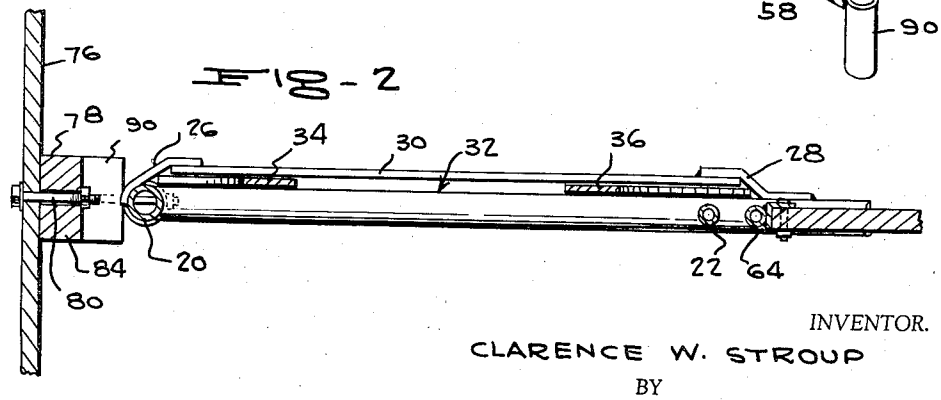


FIG-2

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Filed May 31, 1957 3 Sheets-Sheet 2

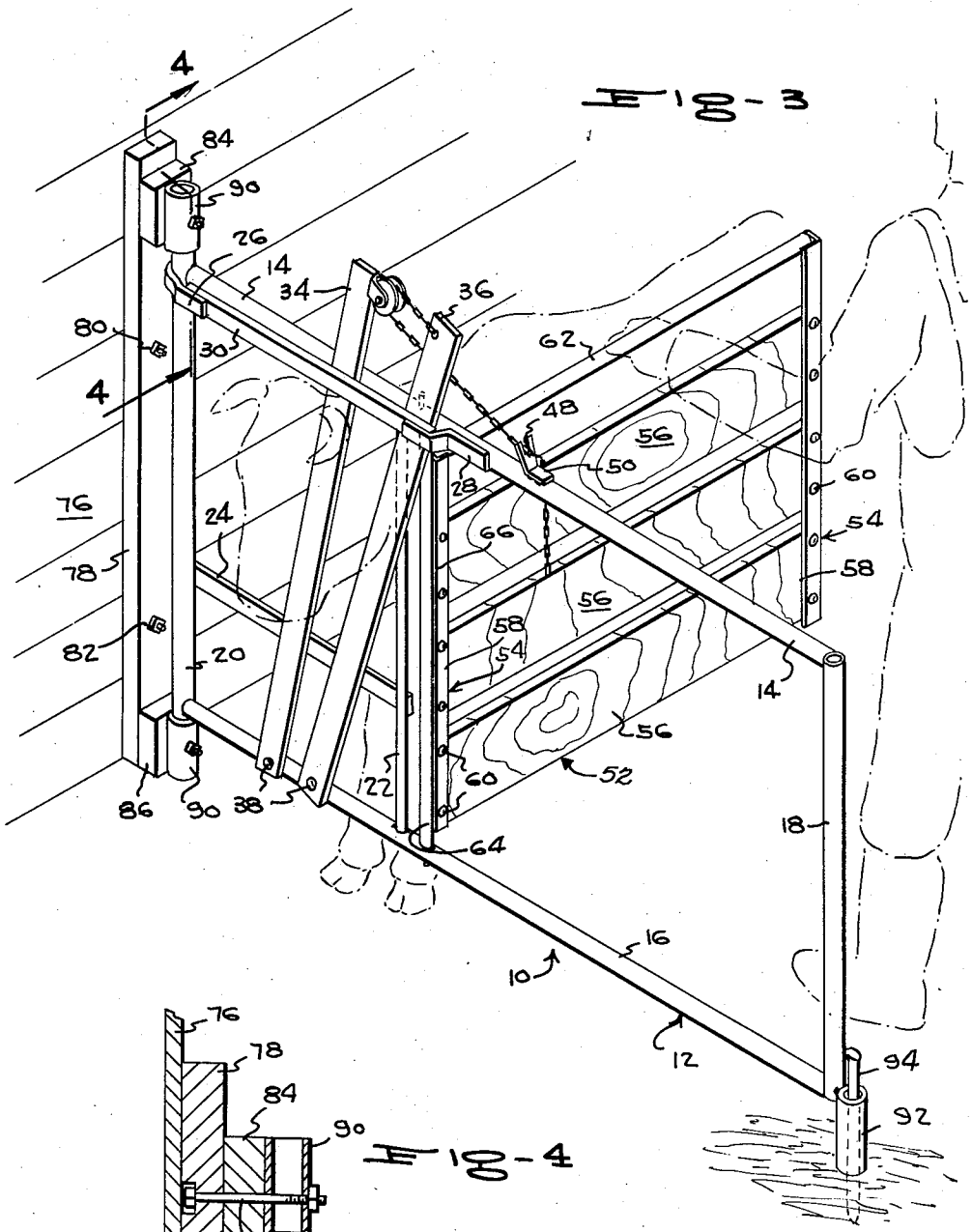


FIG-3

FIG-4

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PORTABLE RESTRAINING DEVICE FOR CATTLE

Filed May 31, 1957 3 Sheets-Sheet 3

FIG-5

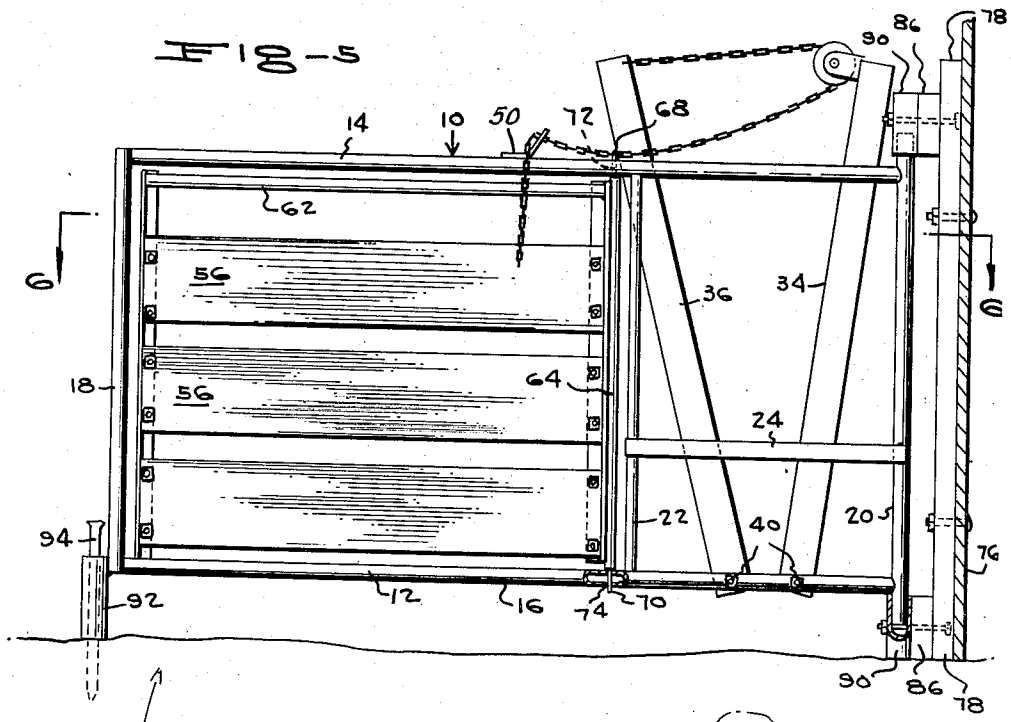
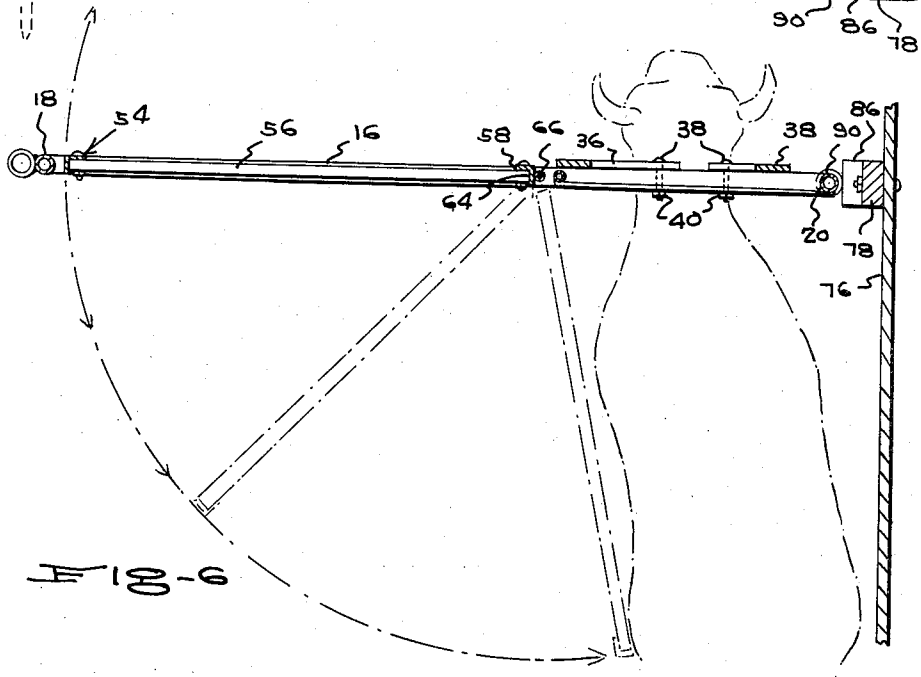


FIG-6



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2,861,546

PORTABLE RESTRAINING DEVICE FOR CATTLE

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Application May 31, 1957, Serial No. 662,706

4 Claims. (Cl. 119—98)

This invention relates to a portable restraining device for cattle, and more specifically, the present invention pertains to cattle holding means for restraining cattle while veterinary work is being performed. This invention finds utilization during the neck chaining of cattle, the tattooing of cattle for identification purposes, and in the performance of other operations thereon.

One of the primary objects of this invention is to provide a cattle restraining device which may be easily installed in existing equipment found on the average cattle pen or barn.

Another object of this invention is to provide cattle restraining means with equal effectiveness inside or outside of a cattle barn.

A further object of this invention is to provide a cattle restraining device of the type referred to above which may be folded into a plane whereby the restraining device may be easily strapped to or otherwise secured on the top of an automobile.

A still further object of this invention is to provide a cattle restraining device of a type which provides complete safety to the user during the performance of operations on a single head of cattle.

This invention contemplates, as a still further object thereof, the provision of a cattle restraining device which cattle will enter without undue hesitation or fear.

It is a still further object of this invention to provide a cattle restraining device which is noncomplex in construction and assembly, inexpensive to manufacture, and durable in use.

Other and further objects and advantages of the present invention will become more apparent from a consideration of the following specification when read in conjunction with the annexed drawings, in which:

Figure 1 is a perspective view of a cattle restraining device constructed in accordance with the teachings of the present invention;

Figure 2 is a fragmentary detailed cross sectional view taken substantially on the line 2—2 of Figure 1, looking in the direction of the arrows;

Figure 3 is a perspective view of the cattle restraining device, this view illustrating the component parts thereof disposed in their respective positions while holding or restraining a head of cattle;

Figure 4 is a fragmentary detailed cross sectional view taken substantially on the vertical plane of line 4—4 of Figure 3, looking in the direction of the arrows;

Figure 5 is a side elevational view of the cattle restraining device; and

Figure 6 is a longitudinal detailed cross sectional view taken substantially on the horizontal plane of line 6—6 of Figure 5, looking in the direction of the arrows.

Referring now more specifically to the drawings, reference numeral 10 designates, in general, a cattle restraining or holding device constructed in accordance with the instant invention. The restraining device 10 is seen to comprise an elongated open normally stationary substantially rectangular frame 12 and includes a pair of vertically spaced and substantially parallel hollow tubular top and bottom rails, 14 and 16, respectively. One pair of adjacent ends of the top and bottom rails 14, 16 are rigidly secured to a vertically extending substantially hollow tubular side rail 18, adjacent its opposed ends. The other adjacent pair of ends of the top and bottom rails 14, 16 are fixedly secured to a second side rail 20 at points adjacent to but spaced from the opposed ends thereof. Reference numeral 22 designates a hollow tubular cross brace having its opposed ends rigidly secured to the top and bottom rails, 14 and 16, respectively at points spaced inwardly from the side rail 20. An elongated substantially rectangular metal strap 24 extends between and is secured to the cross brace 22 and side rail 20 at vertically spaced points above the bottom rail 16. The metal strap 24 serves as a leg guard for cattle.

One end of a bracket 26 is rigidly secured to the side rail 20 adjacent the upper end thereof, and the other end of the bracket 26 extends substantially parallel to the top rail 14 in spaced relation relative thereto. A second bracket 28 has one of its ends fixedly secured to the top rail 14 and the other end thereof extends substantially parallel thereto in spaced relation and confronts the bracket 26. An elongated substantially rectangular member 30 has its opposed ends rigidly secured to the brackets 26, 28 to define a guide slot 32, the function of which will be set forth below. A pair of elongated substantially rectangular cattle neck engaging elements 34, 36 extend through the guide slot 32 and the lower ends thereof are pivotally secured to the bottom rail 16 by means of the bolts 38 and nuts 40. One end of a link chain 42 is fixedly secured at 44 to the upper end of the rectangular element 36, and the other end of the chain 42 is trained around a pulley 46 fixedly secured to the upper end of the rectangular element 34. The chain 42 is extended for engagement within the crotch of a V-shaped slot 48 formed in a bracket 50, the latter being rigidly connected to the top rail 14.

Reference numeral 52 designates, in general, a substantially rectangular gate. The gate 52 is seen to include a pair of angle iron end members 54, the end members being adapted to receive the opposite ends of a plurality of elongated substantially rectangular panels 56 formed of wood, the latter being fixedly secured to the flanges 58 by means of a plurality of wood screws 60. An elongated substantially hollow tubular member 62 extends between and has its respective opposite ends fixedly secured to the upper ends of the end members 54. An elongated substantially hollow tubular member 64 extends along the flange 66 of one of the end members 54 and is rigidly secured thereto. The opposite ends of the hollow tubular member 64 are provided with longitudinally projecting pivot pins 68, 70, the pivot pins 68 extending through apertures 72 formed in the top rail 14 and the pivot pins 70 projecting through suitable apertures 74 formed in the bottom rail 16. Thus it is seen that the gate 52 is pivotally mounted on the substantially open rectangular frame 12.

Reference numeral 76 designates a side wall of a cattle barn or the side of a conventional cattle pen. An elongated vertically extending substantially rectangular brace 78 is bolted to the side wall 76 at longitudinally spaced intervals 80, 82. A pair of identically shaped spacer blocks 84, 86 are fixedly secured to the brace 78 by means of bolts 88. The blocks 84, 86 are disposed adjacent the upper and lower ends of the brace member 78 and the bolts 88 also serve to secure a pair of vertically aligned substantially cylindrical sleeves 90 thereto. As is seen in the drawings, the sleeves 90 are telescoped over the projecting ends of the end rail 20. To prevent the rectangular frame 12 from pivoting about the axes of the cylindrical sleeves 90, a third elongated substantially hollow cylindrical sleeve 92 is rigidly secured to the end rail 18 adjacent the bottom rail 16. The sleeve 92 is adapted to receive therethrough a ground engaging spike 94.

To utilize the cattle restraining device **10**, the operator extends the same across a cattle path or transversely across a cattle pen. With the device in position, the operator then moves the upper ends of the cattle neck engaging elements **34**, **36** to the positions illustrated in Figure 1. With the elements **34**, **36** separated their maximum distance an opening is formed therebetween having dimensions wide enough to receive therethrough the head and neck of a cow, calf or bull therethrough. At the appropriate time gate **52** is swung against the side of the animal to induce it to make the final steps to get in position so it can and will put its head and neck through the opening between **34** and **36**. The operator then removes the chain from its bracket **50** and pulls thereon to effect movement of the neck engaging element **34** towards the neck engaging element **36** as is illustrated in Figure 3 of the drawing. The animal to be operated on is now securely fastened to the frame **12**.

Thereafter, the chain **42** is reinserted in the V-shaped slot **48** of the bracket **50** wherein the chain is securely anchored. The operator then swings the gate **52** against the flank of the animal to cause the animal to move toward the cattle barn wall **76** (see Figures 3 and 6). The operator may now perform such services as are required for the penned animal in complete safety. It should be noted at this point that the vertical height of the gate **52** is such as to permit the operator to reach thereover with ease, and further, the spacing between adjacent panels **56** and the tubular member **62** is sufficiently great so as to permit the operator to extend his hand and arm therethrough.

Attention is directed to the fact that the animal to be operated upon may approach the restraining device from either side thereof, the gate **52** being swingable through an arc of at least 270 degrees. Thus either side of the animal may be given attention by the operator.

After the operator has performed the required services, the gate **52** is swung back to its position as is illustrated in Figure 1 of the drawings, the chain **42** is then released from the V-shaped slot **48** and the neck engaging elements **34**, **36** are separated to permit the animal to withdraw his head and neck from therebetween.

Having described and illustrated one embodiment of this invention in detail, it will be understood that the same is offered merely by way of example, and that this invention is to be limited only by the scope of the appended claims.

What is claimed is:

1. A cattle restraining device comprising an elongated substantially open rectangular frame having a pair of oppositely disposed vertically spaced and substantially parallel top and bottom rails, an end rail extending across and having its opposed ends fixedly secured to a pair of adjacent ends of said top and bottom rails, a second end rail extending across and fixedly secured to the other adjacent pair of ends of said top and bottom rails, an upright member, means fixedly securing said last named end rail to said upright member, ground engaging means fixedly secured to said first one of said end rails, a pair of animal neck engaging elements said elements having an elongated substantially rectangular configuration and having one of their respective ends pivotally connected to said bottom rail adjacent said last named end rail, means connected with said top rail in spaced relation relative thereto to form a guide slot therebetween, said neck engaging elements having their respective other ends extending through said guide slot and to a point thereabove, a bracket fixedly secured to said top rail, said bracket having a V-shaped slot formed therein, a link chain having one of its ends fixedly secured to one of said neck engaging elements, a pulley fixedly secured to the upper end of the other of said neck engaging elements, said link chain being trained around said pulley with the other end thereof adapted to be releasably secured within said V-shaped slot, and an elongated substantially rectangular gate pivotally mounted on said top and bottom rails adjacent said one neck engaging member, and a cross brace extending between said top and bottom rails and having its opposed ends rigidly secured thereto.

2. A cattle restraining device as defined in claim 1, wherein said top, bottom, and side rails comprise elongated substantially hollow tubular members, and said gate comprises a plurality of vertically spaced panels.

3. A cattle restraining device comprising an elongated substantially open normally stationary rectangular frame having a pair of oppositely disposed vertically spaced and substantially parallel top and bottom rails, an end rail extending across and having its opposed ends fixedly secured to a pair of adjacent ends of said top and bottom rails, a second end rail extending across and fixedly secured to the other adjacent pair of ends of said top and bottom rails, an upright member, means fixedly securing and supporting said last named end rail on said upright member, ground engaging means fixedly secured to said first one of said end rails, a pair of animal neck engaging elements, said elements having an elongated substantially rectangular configuration and having one of their respective ends pivotally connected to said bottom rail adjacent said last named end rail, means connected with said top rail in spaced relation relative thereto to form a guide slot therebetween, said neck engaging elements having their respective other ends extending through said guide slot and to a point thereabove, a bracket fixedly secured to said top rail, a chain having one of its ends fixedly secured to one of said neck engaging elements, a pulley fixedly secured to the upper end of the other of said neck engaging elements, said chain being trained around said pulley with the other end thereof adapted to be releasably secured to said bracket, and an elongated substantially rectangular gate pivotally mounted on said top and bottom rails adjacent said one neck engaging member.

4. A cattle restraining device adapted for connection with a building wall and comprising an elongated substantially open normally stationary rectangular frame having a pair of oppositely disposed vertically spaced and substantially parallel top and bottom rails, an end rail extending across and having its opposed ends fixedly secured to a pair of adjacent ends of said top and bottom rails, a second end rail extending across and fixedly secured to the other adjacent pair of ends of said top and bottom rails, an upright member fixedly secured to said wall, means fixedly securing and supporting said last named end rail on said upright member, ground engaging means fixedly secured to said first one of said end rails, a pair of animal neck engaging elements, said elements having an elongated substantially rectangular configuration and having one of their respective ends pivotally connected to said bottom rail, means connected with said top rail in spaced relation relative thereto to form a guide slot therebetween, said neck engaging elements having their respective other ends extending through and above said guide slot, a bracket fixedly secured to said top rail, a chain having one of its ends fixedly secured to one of said neck engaging elements, a pulley fixedly secured to the upper end of the other of said neck engaging elements, said chain being trained around said pulley with the other end thereof adapted to be releasably secured to said bracket, and an elongated substantially rectangular gate mounted on said top and bottom rails intermediate the ends thereof, said gate extending substantially perpendicular to said frame.

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