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VETERINARY SURGICAL TABLE

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2 Sheets-Sheet 2

Fig. 2

Fig. 3

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This invention relates to new and useful improvements in veterinary surgical tables, and of the character shown in my prior pending application, Serial No. 172,728, filed March 4, 1927.

An object of the present invention is to provide a surgical table comprising a bottom having spaced side members adapted for lateral adjustment to vary the space between them, and the means for laterally adjusting said members, comprising a pair of ratchet bars fixed to one of the side members and adapted to be engaged by suitable pawls to lock the side members in adjusted positions.

A further object of the invention is to provide a veterinary surgical table comprising a bottom having spaced side members or walls, one of which is fixed to the bottom and the other one being laterally adjustable with respect to the fixed member, to vary the space between them, and a pair of ratchet bars being secured to the movable side member and slidable in recesses provided in the bottom, the opposite ends of said ratchet bars extending from one side of the table and having hand grips for the convenience of the operator in adjusting the position of the movable side member, and a pair of pawls being mounted upon the stationary side member or wall and normallyyieldably engaging the ratchet bars to lock the in adjusted positions, and an operating lever being mounted between the pawls and connected therewith, whereby the two pawls may be simultaneously moved out of engagement with their respective ratchet bars to permit the movable side member to be moved outwardsly in a direction away from the stationary side member.

A further object is to provide a veterinary surgical table of the class described, comprising a bottom having spaced side walls, each having a beveled or wedge-shaped member secured to the inner sides thereof adjacent to one end of the table and against which the animal’s head is placed, when positioned on the table, and a block being adjustably mounted on each side wall adjacent to said wedge-shaped members adapted to engage the neck of the animal between the head and shoulders to more securely hold the animal therein.

A further object is to provide a table of the class described having a head lock mounted at one end thereof comprising a U-shaped member having one leg mounted in a guide provided in the stationary side member or wall of the table, and having its other leg slidable mounted in a guide provided on the edge of the table bottom, said guide having a recessed portion to permit its complementary leg to be moved out of engagement therewith when the head rest is moved to the limit of its upward movement, thereby permitting the head rest to be swung to an out-of-the-way position at one side of the table, and the head rest also being adapted for vertical adjustment.

A further object is to provide a veterinary surgical table having a leg-locking device mounted at the foot end of the table, comprising a substantially U-shaped member having one end or leg connected to an arm pivotally and slidable mounted on means provided upon the stationary side member or wall of the table which permits the leg-locking device to be adjusted vertically with respect to the table bottom, and which means also permit the leg lock to be adjusted longitudinally with respect to the table so as to position it to properly engage the animal to secure it to the table.

A further object is to provide a veterinary surgical table pivotally mounted upon a suitable standard and adapted for tilting movement, and having a notched bar pivotally connected with one side thereof adapted to engage a pin provided upon the standard, to support the table in an operative position.

The particular object of the invention, therefore, is to provide an improved veterinary surgical table having means for adapting it to animals of different sizes, and further, having means for securing the animal therein.

Other objects of the invention will appear from the following description and will be pointed out in the annexed claims.

In the accompanying drawings forming part of this specification:

Figure 1 is a perspective view of my improved surgical table, showing it in horizontal position;

Figure 2 is a plan view of Figure 1;
Figure 3 is a detail sectional view on the line 3-3 of Figure 2; Figure 4 is a detail sectional view on the line 4-4 of Figure 2; and Figure 5 is a perspective view, showing the head end of the table and the means provided at one side thereof for guidingly supporting one side of the head locking member.

The novel surgical table features in this invention comprises a bottom 2 having side members or walls 8 and 4 mounted thereto. The side wall 3 is secured to the bottom 2 by means of bolts 5, and the side wall 4 is laterally adjustable upon the bottom 2, as indicated in Figure 5. The means provided for laterally adjusting the side wall 4 consists of a pair of ratchet bars 6, each having one end bent upwardly and secured to the side member 4 by suitable bolts 7, shown in Figure 3. The bars 6 are slidable in recesses 8 provided in the top surface of the bottom 2, and pass beneath the stationary wall 3 and extend outwardly therefrom, and each has a handle portion 9 terminal provided thereon for the convenience of the operator in moving the side member inwardly towards the stationary wall member 3. In the drawings, I have shown the bottom 2 composed of a plurality of sections or strips suitably secured together by means of tie bolts 11, as shown in Figure 2. The strips are arranged to provide open spaces or gaps 12 in the intermediate portion of the bottom 2.

Ratchet teeth 13 are provided on the inner edges of each bar 6 adapted to be engaged by a pair of latch members or pawls 14, pivotally mounted upon the stationary wall member 3, as shown in Figure 1. An operating lever 15 is pivotally mounted on the fixed wall member 3 between the pawls 14, and has rods 16 connecting it with the pawls. A tension spring 17 has one end connected to the upper end of the lever 15 and its opposite end to a clip 18 secured to the fixed wall member 3. This spring constantly tends to urge the pawls 14 into engagement with the ratchet teeth 13, as shown in Figure 1. A handle 19 is provided at one end of the lever 15, whereby the latter may be conveniently oscillated to move the pawls out of locking engagement with the ratchet teeth 13. The connections between the pawls and the lever 15 are so arranged that when the handle 19 of the lever is moved to the left, as shown in Figure 1, the two pawls will simultaneously be moved out of locking engagement with the ratchet teeth against the tension of the spring 17. When the handle 19 is released, the spring will move the pawls into locking engagement with the ratchet teeth, as shown in Figure 1.

A head locking device is provided at the head end of the table and comprises a U-shaped member 21 having legs 29 and 28, the latter being slidable mounted in an aperture or guide provided in the stationary wall member 3, as best shown in Figure 4. A washer 24 and pin 25 are provided at the lower end of the leg 28 to limit upward movement of the locking device. A set screw 26 is provided in threaded engagement with the plate 27 and provides means for locking the head lock in adjusted positions. The leg 22 is slidable received in a guide or clip 28, secured to the opposite edge of the bottom 2. This leg is also slightly shorter than the leg 23 so that when the locking member is in the full line position, shown in Figure 4, the leg 22 may be swung out of engagement with the clip or guide 28, as indicated in dotted lines in Figure 5.

To permit the leg 22 to be moved out of engagement with the clip 28, as above described, the latter is provided with a recessed or cut-away portion 29, as shown in Figure 5, which permits the lower end of the leg 22 to be moved out of engagement therewith when the leg is in its uppermost position, as shown in full lines in Figure 4. By thus mounting the head lock 21 upon the table, it may be vertically adjusted with respect to the bottom 2 and the wall member 4 may also be laterally adjusted without interference therewith, as the wall member is not directly engaged therewith. The leg 22 also provides a stop for limiting outward movement of the wall member 4, as shown in Figure 4. A small clip 31 is provided at the opposite end of the table bottom 2 and co-operates with the leg 22 to limit the outward movement of the wall member 4.

The opposite end of the table is provided with a leg locking device for securing the rear portion of the animal's body in position upon the table. This leg locking device comprises a U-shaped member 22, preferably tubular in cross section, and having one end secured to a slotted arm 33 slidable and pivotally mounted upon a bolt 34, securely mounted in a bracket 35 secured to the stationary wall member 3 by suitable screws 36, (see Figures 1 and 3). An arcuate formed slot 37 is provided in the bracket 35 and has a bolt 38 movably mounted therein, which also passes through a slot 39 provided in the arm 33. A crank 41 is received in threaded engagement with the bolt 38 and provides means for locking the arm 33 to the bracket 35 to secure the leg rest 32 in adjusted positions. The head of the bolt 38 is so engaged with the bracket 35 as to prevent relative rotation thereof when the crank 41 is rotated. By thus mounting the leg rest 32 upon the stationary wall member 3 of the table, it will readily be seen that the leg lock may be vertically adjusted with respect to the table, and also by means of the slots 37 and 39, the locking member 22 may be longitudi...
nally adjusted with respect to the table. The opposite end of the locking member 32 is not engaged with the table top or with the movable wall member 4, thus permitting said wall member to be laterally adjusted without interfering with the locking member.

A wedge-shaped member 42 is preferably secured to the head end of each wall member, as shown in Figures 1 and 2, to shape the inner forward end portions of the wall members to more closely conform to the shape of the animal’s head. A vertically disposed block 43 is adjustably secured to each wall member adjacent the wedge-shaped members 42. These blocks are adjustable longitudinally with respect to the table, and are held in adjusted positions by means of wing nuts 44 and bolts 45, the latter passing through slots 46, provided in the side walls 3 and 4, as indicated in dotted lines in Figure 2 and also shown in Figure 5. The blocks 43 are adapted to engage the neck of the animal between the head and shoulders to more firmly secure the animal in position upon the table.

The supporting means for the table comprises a suitable standard, including legs 47, preferably having their lower ends secured to members 48, and having their upper ends engaged with studs 49, preferably terminally provided upon a bar 51, secured to the bottom of the table by suitable bolts 52 (see Figures 1 and 2). The inclined members 47 of the standard are connected together by suitable cross members 50, shown in Figure 1. Nuts 53 secure the upper ends of the legs to the studs 49.

A bar 54 is pivoted at 55 to one edge of the bottom 2, and has notches 56 therein adapted to selectively engage a pin 57 secured to one of the legs 47. When the bar 54 is engaged with the pin 57, as shown in Figure 1, the table will be supported in substantially a horizontal position. The notches 56 in the bar 54 permit the table to be adjusted to various angular positions with respect to the legs 47.

The novel veterinary surgical table shown and described in this invention may be used for holding various sizes of animals, for such purposes as vaccinating, drenching, ringing, ear-marking, worming, and other surgical operations. The head and leg locking members are so arranged that they may be quickly moved out of the way of the top of the table to permit the animal to be placed thereon, after which they may be quickly moved into locking engagement with the animal’s body to firmly hold the animal on the table. The means provided for adjusting the locking and movable side member 4 in its adjusted positions, permits the latter to be moved into engagement with the body of the animal, after the latter has been placed upon the table; the pawls 14 automatically moving into locking engagement with the ratchet teeth 13, as the bars 6 are moved in the direction indicated by the arrow in Figure 3. Because of the head 70 and leg locking members 21 and 32, respectively, not engaging the movable wall member 4, the latter may be adjusted without operating these locking members, as will readily be seen by reference to Figures 1 and 3. The notched bar 54 also provides means for quickly tilting the table to any desired position. The leg-locking member 32 is so arranged that it may be used for holding the animal’s legs either in an extended position or folded forwardly against its body. When the operation has been completed, the animal may be quickly released from the table by simply releasing the leg-locking member 32 by rotation of the crank 41; releasing the head rest by rotation of the wing nut 28, and by releasing the grip on the animal’s body by operating the lever handle 19 to permit the movable side member 4 to be moved out of engagement with the body of the hog, after which the bar 54 may be moved out of engagement with the pin 57, and the table tilted to a position to permit the animal to be slid from the table.

I claim as my invention:

1. A veterinary surgical table including a bottom having a fixed side member and a movable side member, a bar secured to said movable side member adjacent each end thereof and extending transversely of said bottom and beneath said fixed side member, and means on said fixed side member adapted to engage said bars to lock said movable side member in adjusted positions.

2. A veterinary surgical table including a bottom having spaced side members, means for varying the distance between said members including a ratchet bar having one end connected with one of said side members, and means mounted upon the other side member and engageable with said ratchet bar to lock the movable member in adjusted positions.

3. A veterinary surgical table including a bottom having a fixed side member and a movable side member, a ratchet bar secured to one of said side members, a recess in said bottom for said ratchet bar, and a member pivotally mounted upon the fixed side member and adapted to engage said ratchet bar to lock the movable member in adjusted positions.

4. A veterinary surgical table including a bottom having a fixed side member and a movable side member, a ratchet bar secured to said movable side member adjacent each end thereof, transverse recesses in the upper surface of said bottom in which said bars are slidable, pawls pivotally mounted upon the fixed side member and each engageable with the
one of said ratchet bars, and means for simultaneously operating said pawls to move them out of engagement with their respective ratchet bars, to permit said movable side member to be relatively adjusted.

5. A veterinary surgical table including a bottom having a fixed side member and a movable side member, a ratchet bar secured to each movable side member adjacent each end thereof, transverse recesses in the upper surface of said bottom adapted to receive said ratchet bars, and permitting them to pass beneath said fixed side member, a pawl engaged with each ratchet bar and adapted to lock the movable side member in adjusted position, a lever mounted between said pawls and having connections therewith to cause said pawls to be moved out of engagement with their respective ratchet bars when said lever is operated, and means constantly urging said pawls into locking engagement with said ratchet bars.

6. A veterinary surgical table including a bottom having a fixed side member and a movable side member, a ratchet bar secured to said movable side member adjacent each end thereof, transverse recesses in the upper surface of said bottom adapted to receive said ratchet bars, and permitting them to pass beneath said fixed side member, a spring-actuated pawl engaged with each ratchet bar and adapted to lock the movable side member in adjusted position, a lever mounted between said pawls and having connections therewith to cause said pawls to be moved out of engagement with their respective ratchet bars when said lever is operated, and means for tilting the table.

7. A veterinary surgical table comprising a bottom having spaced side members adapted for lateral adjustment, a head locking device comprising a U-shaped member having one leg slidably mounted in one of said side members to permit vertical adjustment of the locking device with respect to said bottom, means for securing the locking member in adjusted positions, a guide for the other leg of said locking member secured to said bottom and having means permitting said leg to be moved out of engagement therewith when the locking member is moved to its uppermost position, whereby the head locking member may be swung to an out-of-the-way position at one side of the table.

8. A veterinary surgical table comprising a bottom having a fixed side member and a movable side member, a head locking device comprising a U-shaped member having one leg slidably mounted in a guide provided in said fixed side member to permit vertical adjustment of the locking device with respect to said bottom, means for securing the locking member in adjusted positions, a guide for the other leg of said locking member secured to said bottom and having means permitting said leg to be moved out of engagement therewith when the locking member is moved to its uppermost position, whereby the head locking member may be swung to an out-of-the-way position at one side of the table.

9. A veterinary surgical table comprising a bottom having spaced side members, one of which is adapted for lateral adjustment, a head-locking device adaptably mounted at the head end of the table, and a block adjustably secured to each side member adjacent to said head locking member adapted to engage the body of the animal between the head and shoulders.

10. A veterinary surgical table having a vertically adjustable head-locking device at one end thereof and a leg-locking device at the opposite end thereof, said leg-locking device comprising a U-shaped member overhanging said table, a slotted arm engageable with one end of said U-shaped member to provide a support therefor, and means on said table for supporting said slotted arm, said supporting means permitting vertical and longitudinal adjustment of said U-shaped member with respect to the table.

11. A veterinary surgical table having a vertically adjustable head-locking device at one end thereof and a leg-locking device at the opposite end thereof, said leg-locking device comprising a U-shaped member overhanging said table, a slotted arm engageable with one end of said U-shaped member to provide a support therefor, a slotted bracket secured to said table to provide a support for said slotted arm, a slot in said bracket cooperating with the slot in said arm to permit vertical and longitudinal adjustment of said U-shaped member with respect to the table.

12. A veterinary surgical table comprising a bottom having a fixed side member and a movable side member, means for laterally adjusting said movable side member, a vertically adjustable head-locking member at one end of the table, a U-shaped leg-locking device at the opposite end of the table, a slotted arm secured to one end of said leg-locking member, a bracket secured to said fixed side member and having a pivot adapted to receive said slotted arm, an arcuate slot in said bracket, a bolt traversing said arcuate slot and the slot in said arm, and a crank engaged with said bolt adapted to lock said arm and leg-locking member in adjusted position, the slots in said bracket and said arm permitting vertical and longitudinal adjustment of said leg-locking member with respect to the table bottom.

13. A veterinary surgical table comprising a bottom having spaced side members,
one of which is mounted for lateral adjustment, a head locking device at one end of the table slidably engaged with one of said side members and adapted for vertical adjustment with respect to said bottom, a leg-locking device at the opposite end of the table, and vertically disposed elements adjustably secured to said spaced side members adjacent to said head-lock adapted to engage the animal’s body between the head and shoulders.

In witness whereof, I have hereunto set my hand this 4th day of August, 1928.

LEONARD E. TREES.