Instructions Model U-416 Connecticut Bench Brakes

Level the brake and bench, and shim under the feet to avoid distortion. Fasten firmly in place. The front feet must be well fastened to avoid tipping when bending force is applied to the handles.

The Model U-416 is rated for bending 48” of 16 gage mild steel, one inch flange, with bending angle and bending bar fastened securely in place. The beam (upper clamping member which carries the fingers), may be adjusted to the rear a maximum of 5/8". When adjusting to bend 16 gage material, swing the apron up to 90 degrees and set the beam adjustment to allow a clearance of 1/8" between the apron edge and the finger tips. For lighter material, a clearance of 1-1/2 to 2 times material thickness should be used. Soft aluminum may be formed with clearance equal to material thickness.

Rated capacity for stainless steel is 20 gage. Clearance should be at least twice material thickness.

Removing the bending angle, for narrow or offset bends, reduces capacity to 20 gage mild steel. Removing both bending angle and bending bar reduces capacity to 22 gage. Avoid using the brake without the bending bar as much as possible as the bar is made of a tough material to protect the apron edge from wear.

Clamping pressure is controlled by nuts on the lower end of the toggle bolt. This pressure should be adjusted with a small piece of the material to be bent clamped in each end of the machine. Move the nuts so that the levers No. 26 pull against the stops with an equal effort. Excessive clamping pressure is not required. Use only enough to hold the material firmly in the brake.

These brakes are not intended for bending rod, wires, multiple thicknesses or across lock seams. operations of this type will result in denting the edge of the apron and fingers and springing the machine out of line.

Lubricate the moving parts of the machine with light grease or heavy oil. Lasting accuracy depends on proper lubrication.

** INSTRUCTIONS **

CONNECTICUT BOX & PAN BENCH BRAKE

Set the Brake on a level bench and shim under the feet until it rests evenly and will not rock. Fasten to bench with lag screws.

CONNECTICUT UNIVERSAL BENCH BRAKES are rated according to the catalog capacity for a full length bend in mild steel at least 3/8" from the edge of the sheet. An adjustment of 1/8" is provided in the position of the beam for material thickness and radius of bend. This is controlled by eccentric pins No. 66 and locking set screws at the rear of the machine, each end. There should be clearance of at least one and one-half times the thickness of material between the apron and edge of beam, when the apron is at the 90 degree position. For bending stainless steel, reduce the capacity by 4 gages.

The work is clamped between the Bed and the tips of the Fingers by means of Eccentric Levers No. 26. With all Fingers in place, the Universal Brake operates the same way as the plain Bench Brake. To make a bend, raise the apron handles to the desired angle, forcing the clamped work to bend around the tips of the fingers. In making a box or pan, the sides are bent up first. To bend the ends, group the Fingers to a total width equal to the end of the Box, leaving a space each side of this group by omitting a Finger. Clamp the end of the box under the grouped Fingers. When the Apron is raised to bend up the end, the sides already formed will pass to each side of the Fingers, avoiding interference. The maximum depth of box is 3".

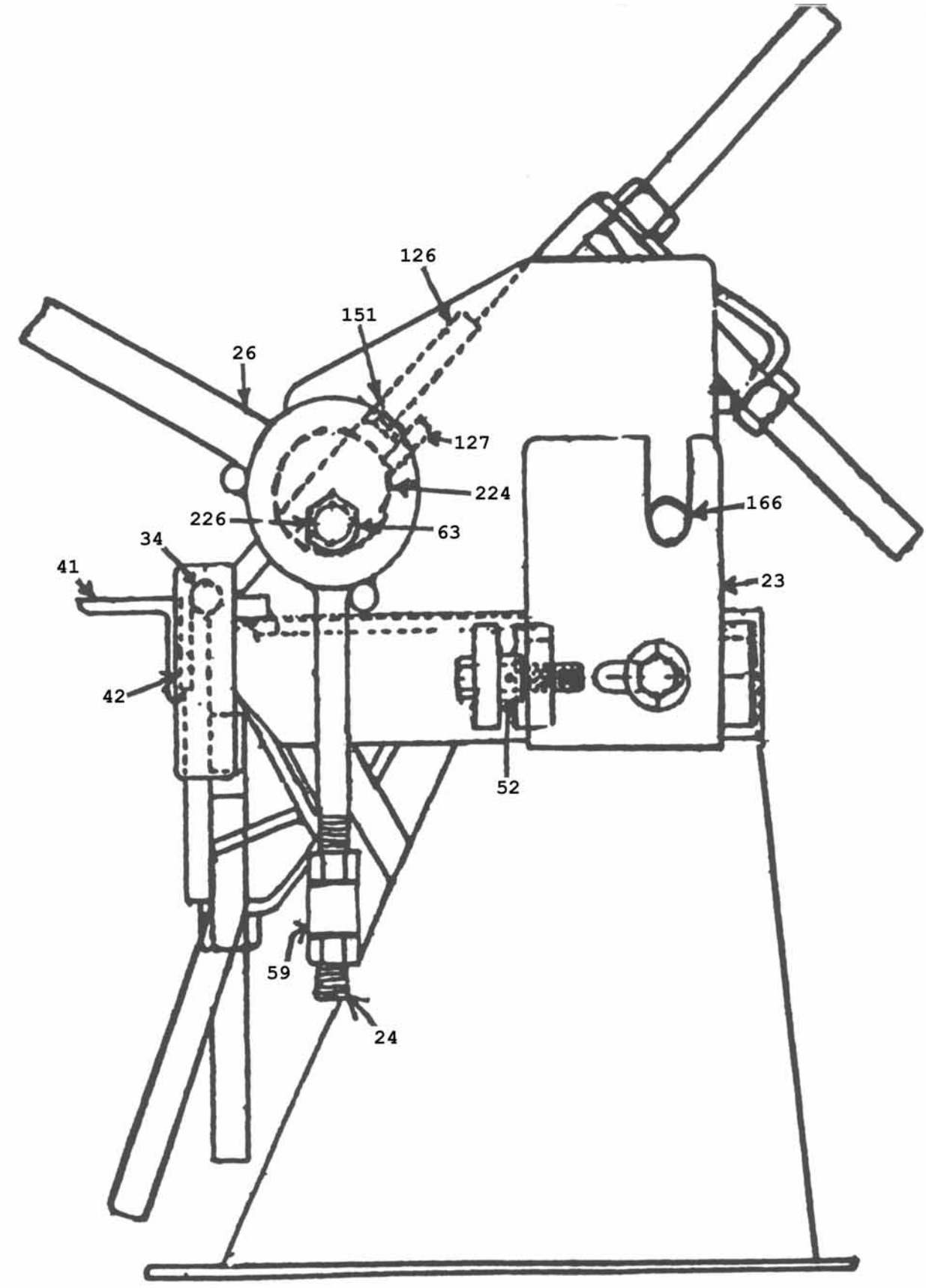
Clamping pressure is controlled by nuts No. 45. This pressure should be adjusted with a small piece of the material to be bent clamped in each end of the machine. Move the nuts so that the levers No. 26 pull against the stops with an equal effort. Excessive clamping pressure is not required. Use only enough to hold the material firmly in the Brake.

These Brakes are not intended for bending rods, wires, multiple thicknesses or across lock seams. Operations of this type will result in denting the edge of the Apron and springing the machine out of line.

Lubricate the moving parts of the machine with light grease or heavy oil. Lasting accuracy depends on proper lubrication.

Model U-416
REPLACEABLE PARTS

NO.	DESCRIPTION	PART NUMBER
23	Slide Assy. RH	757730045
23	Slide Assy. LH	757730046
24	Toggle Assy. RH	757860047
25	Toggle Assy. LH	757860048
26	Eccentric & Handle Assy. RH	757030054
26	Eccentric & Handle Assy. LH	757030055
26G	Handle Grip	633356335
34	Hinge Pin	757160083
41	Bending Angle	757180069
42	Bending Bar	757030070
47	Extension Handle	757460061
52	Adjusting Screw	657012642
52	Adjusting Screw Collar	657000282
52	Roll Pin	600063446
59	Lower Toggle Pin	757160071
59	Cotter Pin	600073540
63	Nylock Nut	666023010
63A	Spring Washer	657033154
63B	Flat Washer	678033110
64	Toggle Adj. Nuts	643023009
67	Apron Stop Rod	757130068
68	Apron Stop Collar	757260072
68	Set Screw for Above	621012125
69	Apron Stop Stud	757160073
69	Nylock Nut for Above	666023007
126	211 Finger Assy.	255940014
126	211 Finger	757360062
126	311 Finger Assy.	255940015
126	311 Finger	757360063
126	411 Finger Assy.	255940016
126	411 Finger	757360064
127	211 Finger Clamp	757010065
127	311 Finger Clamp	757010066
127	411 Finger Clamp	757010067
132	Counterweight	757280057
151	Finger Screw	613012135
166	Slide Pin Bushing	757080058
166	Snap Ring	600164304
224	Toggle Bushing	757080049
226	Eccentric Bushing	757210159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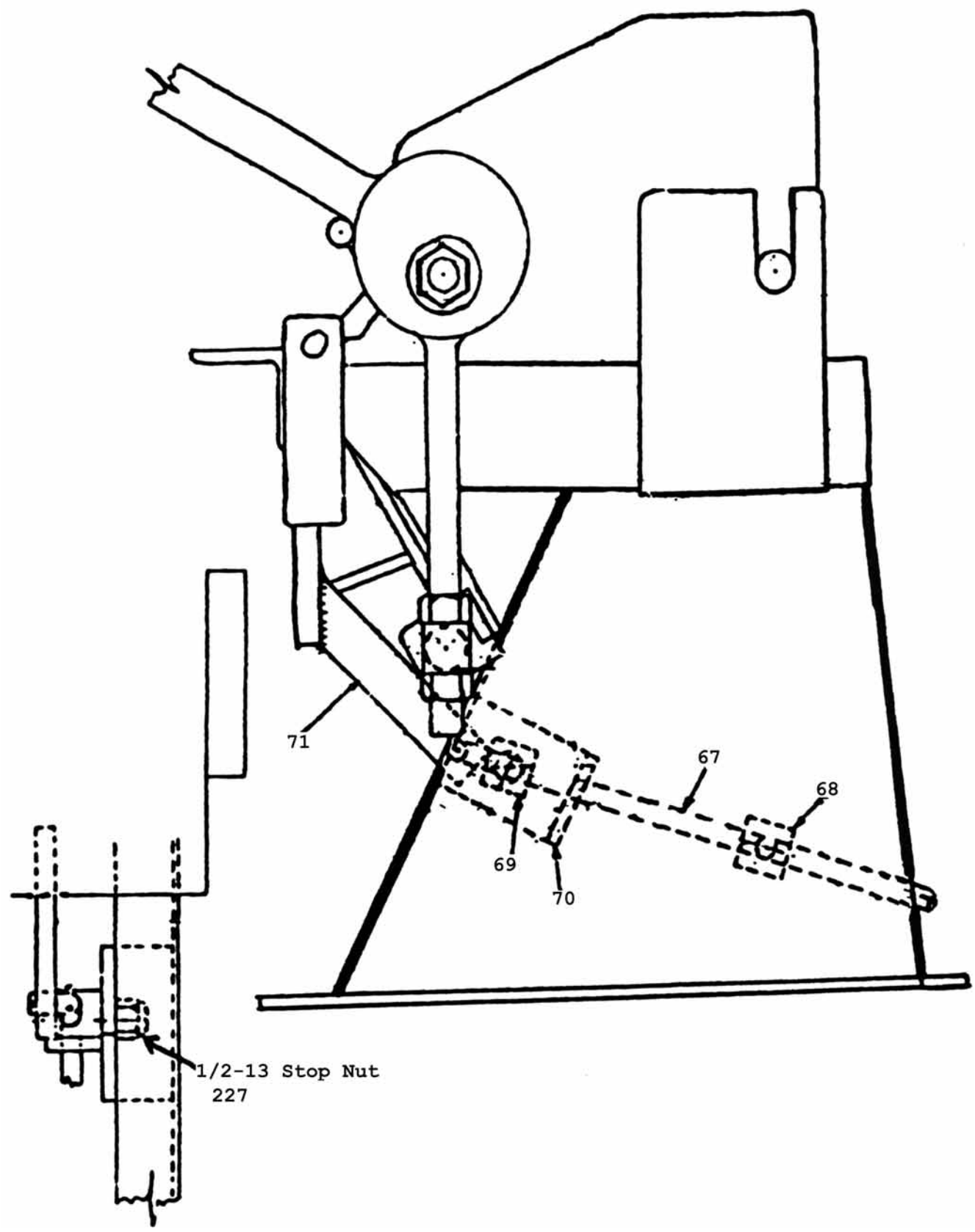
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1/2-13 Stop Nut
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