## For Translating and Keyed Design Machine Screw Jacks

When boots are included on the Joyce jacks or actuators, Joyce sizes them as part of our service to you.

Adding boots to most jacks increases their retracted (closed) height, "A" or "B". The diagrams and chart below are provided as a reference to help illustrate how the addition of standard boots to jacks increases the closed height of those jacks.

The retracted (closed) height, "A" or "B", is based on the jack capacity and it changes based on the length of travel (rise), and end conditon of the lifting screw. For instance, an upright 2-ton jack with a T3 end conditon and 12 inches of rise will have a greater closed dimension than the same 2-ton jack with just 3 inches of rise.

Standard boot outside diameter, "C", and collar diameter at the base of the jack, "D" are listed in the chart below for reference.

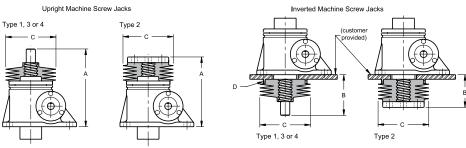
Although Joyce provides the stainless steel clamps needed to secure all boots in place, customers must provide a mounting ring of the standard diameter "D" to mount the boots on inverted jacks.

When you use Joyce 2D/3D online software to specify jacks with boots, the drawings will more accurately depict the added screw length needed to accomodate the boot. However, the actual boot will not be shown on the drawing.

**Common Boot Options:** 

• Zippered boots • Boots for high temperatures

Contact Joyce for more information about these and other custom boot applications or boots for Bevel Gear Jacks.





Jack Capacity	A - Closed Height for Upright Jack				Max. Travel Without	B - Closed Height for Inverted Jack				C	D
	Type 1*	Type 2	Type 3*	Type 4*	Increasing Closed Height - Upright Type 2**	Type 1*	Type 2*	Type 3*	Type 4*	O.D. of Boot	Collar Diameter
250/500 Lb.	4 1/2	4	4 1/2	3 3/4	12	2 3/4	1 5/8	2 3/4	2	3.5	2 5/16
1,000 Lb.	4	4	4	4	12	3	2	3	2 1/4	3.5	2 5/16
1 Ton	5 3/8	4 1/2	5 3/8	5 3/8	9	2 1/2	1 15/16	2 1/2	2 1/2	5	2 3/4
2 Ton	6	5 5/16	6	6 1/4	3	2 7/8	2 1/16	2 7/8	3 3/16	5	3 3/4
3 Ton	5 15/16	5 1/4	5 15/16	6 3/4	0	2 5/8	1 15/16	2 5/8	3 1/2	5	3 3/4
5 Ton	7 3/4	7 1/16	7 3/4	8 1/4	6	3 7/8	2 11/16	3 7/8	4 3/8	5 1/2	4 3/4
10 Ton	8	7 1/4	8	8 11/16	9	4	2 1/2	4	4 11/16	6 1/2	5 3/4
15 Ton	8 3/4	8	8 3/4	9 7/16	9	4	2 1/2	4	4 11/16	6 1/2	5 3/4
20 Ton	9 15/16	9 1/4	9 15/16	10 3/4	9	3 15/16	2 1/2	3 15/16	4 3/4	6 1/2	6
25 Ton	11 3/8	11	12 1/4	12 3/4	9	4 1/16	2 7/8	4 15/16	5 7/16	8	7 1/2
30 Ton	11 15/16	11 1/2	11 3/16	17 1/16	21	4 15/16	4 1/8	4 3/16	9 11/16	8	8 1/4
35 Ton	13 5/8	12	13 5/8	13 5/8	0	6 11/16	5 1/16	6 11/16	6 11/16	10	8 1/2
50 Ton	18	14 3/8	18	18	0	10 5/8	7	8 3/8	9 1/8	13	11 5/8
75 Ton	20 1/2	16 1/2	20 1/2	20 1/2	0	9 7/8	5 13/16	7 3/4	7 7/8	13	13 1/2
100 Ton	20 1/4	19	20 1/4	21 1/4	0	9 7/8	6 7/16	8 3/8	8 7/8	14 1/2	15

150-ton and 250-ton dimensions supplied upon request.

\* Closed height given must be increased by about 0.071" for each 1" of travel.

\*\* Upright Type 2 closed height must be increased by about 0.071" for each 1" over the maximum given.

A and B dimensions generally increase when boots are added to jacks.

Note: Drawings are artist's conception – not for certification; dimensions are subject to change without notice.