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Press Brake Bending Tonnage Chart

Approximate Pressure in Tons per Linial Foot Required to make 90 deg. Air Bend on Mild Steel with Various Width Die Openings

Width of V-Die Opening	Metal Thickness (T)																		
	26 G .010"	24 G .024"	22 G .030"	20 G .036"	18 G .048"	16 G .060"	14 G .075"	13 G .090"	12 G .105"	11 G .120"	10 G .135"	9 G .149"	7 G 3/16" .187"	1/4" .250"	5/16" .313"	3/8" .375"	7/16" .437"	1/2" 0.50"	
1/8"	1.2	2.1	3.6																
3/16"	0.8	1.4	2.5	4.1															
1/4"	0.5	1.1	1.8	2.9	5.4														
5/16"		0.7	1.4	2.2	4.0	7.0													
3/8"			1.0	1.7	2.9	5.6	8.8												
1/2"				1.2	2.2	3.6	6.0	10.0											
5/8"					1.6	2.7	4.5	6.8	10.1										
3/4"					1.3	2.2	3.4	5.4	7.4	10.5									
7/8"						1.7	3.0	4.3	6.3	8.8	11.3								
1"						1.4	2.5	3.7	5.4	7.2	9.6	13.1							
1-1/8"							2.1	3.3	4.4	6.2	8.4	11.9	16.4						
1-1/4"							1.7	2.9	4.0	5.4	7.0	9.0	14.0	28.8					
1-1/2"									3.2	4.3	5.6	6.7	11.2	22.0	38.0				
2"										3.2	4.1	5.2	7.6	15.3	26.0	41.0			
2-1/2"											2.4	3.5	5.8	11.5	19.2	29.9	45.2		
3"												2.2	4.5	9.1	16.0	24.0	35.0	47.9	
3-1/2"														7.5	12.5	19.4	28.0	39.0	
4"														6.2	10.6	16.0	24.0	33.1	

Figures that are bold are the pressures required using a punch with a radius equal to the metal thickness and die opening approximately eight times metal thickness.

This combination produces an air bend with an inside radius nearly equal to metal thickness - a good practical minium for 90 deg. bends.

Soft Aluminum
 Aluminum Alloy (Heat treated)
 Stainless Steel

50% of pressure listed
 Same as steel
 50% more than steel