



(800) 248-8498

Diesel Hammer Energy Output and Pile Bearing Chart

APE Model D50-32

The energy output is based on the identical Piston/Travel calculations utilized in the *Pile Driving Analyzer* and the *Saximeter*.

The pile bearing chart is based on the Engineering News formula for pile bearing and is provided for the user's convenience only.

$$\text{Pile Bearing (tons)} = 2E/(S+1)/2000, \text{ where } E = \text{Hammer energy (ft-lbs)} \text{ and } S = \text{Pile set (inches per blow)}$$

Ram Weight(lbs): 11,000

APE has no preference for these particular formulas and calculations over any other.

Blows per Minute	Stroke (feet)	Energy (ft-lbs)	Pile Set (Blows per inch)																		
			2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
60	4.00	44,000	73	102	126	147	165	181	196	208	220	230	240	249	257	264	271	277	283	288	293
59	4.17	45,870	76	106	131	153	172	189	204	217	229	240	250	259	268	275	282	289	295	301	306
58	4.33	47,630	79	110	136	159	179	196	212	226	238	249	260	269	278	286	293	300	306	312	318
57	4.50	49,500	83	114	141	165	186	204	220	234	248	259	270	280	289	297	305	312	318	324	330
56	4.67	51,370	86	119	147	171	193	212	228	243	257	269	280	290	300	308	316	323	330	337	342
55	4.83	53,130	89	123	152	177	199	219	236	252	266	278	290	300	310	319	327	335	342	348	354
54	5.00	55,000	92	127	157	183	206	226	244	261	275	288	300	311	321	330	338	346	354	360	367
53	5.17	56,870	95	131	162	190	213	234	253	269	284	298	310	321	332	341	350	358	366	373	379
52	5.33	58,630	98	135	168	195	220	241	261	278	293	307	320	331	342	352	361	369	377	384	391
51	5.50	60,500	101	140	173	202	227	249	269	287	303	317	330	342	353	363	372	381	389	396	403
50	5.75	63,250	105	146	181	211	237	260	281	300	316	331	345	358	369	380	389	398	407	414	422
49	6.00	66,000	110	152	189	220	248	272	293	313	330	346	360	373	385	396	406	416	424	432	440
48	6.25	68,750	115	159	196	229	258	283	306	326	344	360	375	389	401	413	423	433	442	450	458
47	6.50	71,500	119	165	204	238	268	294	318	339	358	375	390	404	417	429	440	450	460	468	477
46	6.83	75,130	125	173	215	250	282	309	334	356	376	394	410	425	438	451	462	473	483	492	501
45	7.17	78,870	131	182	225	263	296	325	351	374	394	413	430	446	460	473	485	497	507	517	526
44	7.50	82,500	138	190	236	275	309	340	367	391	413	432	450	466	481	495	508	519	530	541	550
43	7.83	86,130	144	199	246	287	323	355	383	408	431	451	470	487	502	517	530	542	554	564	574
42	8.17	89,870	150	207	257	300	337	370	399	426	449	471	490	508	524	539	553	566	578	589	599
41	8.58	94,380	157	218	270	315	354	389	419	447	472	494	515	533	551	566	581	594	607	618	629
40	9.00	99,000	165	228	283	330	371	408	440	469	495	519	540	560	578	594	609	623	636	649	660
39	9.50	104,500	174	241	299	348	392	430	464	495	523	547	570	591	610	627	643	658	672	685	697
38	10.00	110,000	183	254	314	367	413	453	489	521	550	576	600	622	642	660	677	693	707	721	733
37	10.50	115,500	193	267	330	385	433	476	513	547	578	605	630	653	674	693	711	727	743	757	770
36	11.17	122,870	205	284	351	410	461	506	546	582	614	644	670	694	717	737	756	774	790	805	819

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