

Xcite 1300 Laboratory Series

The Xcite 1300 Laboratory Series is used in applications where longer stroke and extremely high forces are required to determine the modal characteristics of flexible structures such as truck suspensions and engine mounts, transit vehicles, locomotives, drag lines, backhoes, cranes and large electrical generating apparatus. The 15 GPM Hydraulic Power Supply of these systems allows frequency responses in the 100 Hz to 500 Hz range while the larger exciters generate forces to 20,000 lbf.

This series is used primarily in heavy industrial applications such as nuclear power generating plants and foundries for foundation and bearing pedestal dynamic testing. The 1300 Series has also been used in shipboard applications for testing of major propulsion equipment foundations, mounts, drive shafts and propellers.



Hydraulic Power Supply
Master Controller
Exciter Head
Static Force
Dynamic Force
Stroke
Rod
Bore
Thread
Load Cell
LVDT
Exciter Design

Xcite 1300-1 System

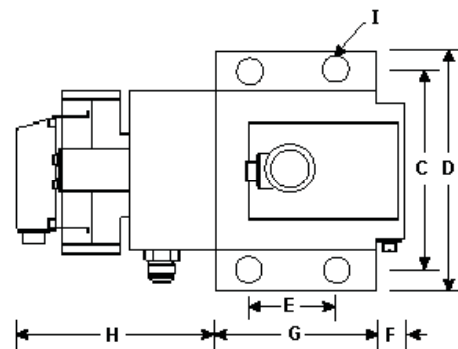
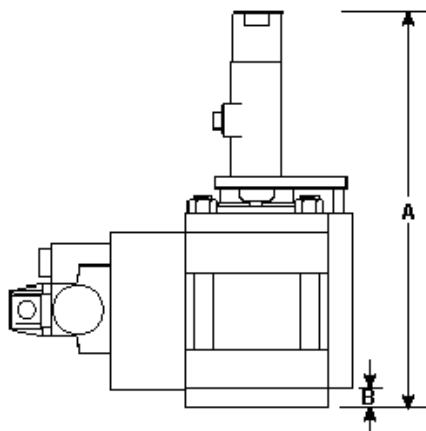
1302C 15 GPM (60 l/m)
1304-Mod4
1306-15-T/C
20,000 lb (89,000 N)
20,000 lb (89,000 N)
1.0 in (25 mm)
3.5 in (87 mm)
5.0 in (125 mm)
1.5 - 12
50,000 lb (222,000 N)
1.0 in (25 mm)
Single Ended

Xcite 1300-2 System

1302C 15 GPM (60 l/m)
1304-Mod4
1352-15-T/C
5,000 lb (22,200 N)
5,000 lb (22,200 N)
3.0 in (75 mm)
1.75 in (44 mm)
2.5 in (62 mm)
1.25 - 12
15,000 lb (66,750 N)
3.0 in (75 mm)
Single Ended

Xcite 1300-3 System

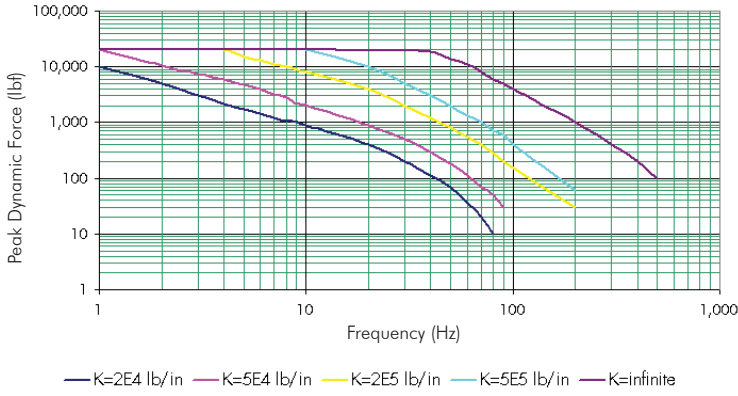
1302C 15 GPM (60 l/m)
1304-Mod4
1310-15-T/C
Total Static & Dynamic
Force = 10,000 lb (44,500 N)
2.0 in (50 mm)
2.0 in (50 mm)
3.0 in (75 mm)
1.25 - 12
10,000 lb (44,500 N)
2.0 in (50 mm)
Double Ended



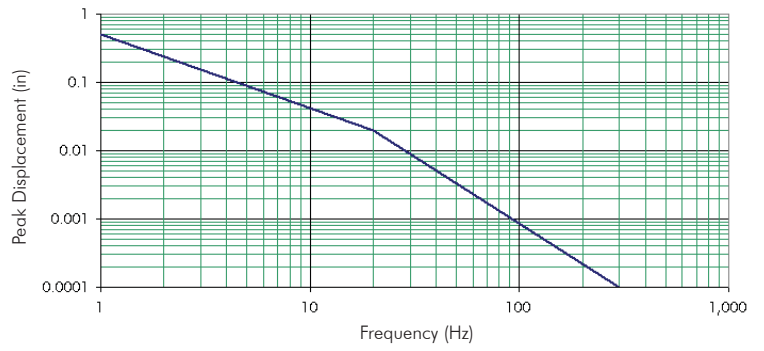
Exciter Head	A		B		C		D		E		F		G		H		I	
	in	mm	in	mm	in	mm	in	mm	in	mm	in	mm	in	mm	in(dia)	mm(dia)	in(dia)	mm(dia)
1306-15-T/C	20.12	503	0.75	19	8.18	205	9.75	244	4.96	124	1.12	28	8.18	205	2.75	69	0.94	24
1352-15-T/C	18.56	464	0.62	16	4.62	116	5.62	141	2.55	64	1.12	28	3.50	88	5.17	129	0.56	14
1310-15-T/C	23.56	589	0.75	19	8.00	200	11.00	275	8.00	200	N/A	N/A	11.00	275	4.31	108	1.00	.25

Xcite 1300-1 Laboratory System

Peak Dynamic Force vs. Frequency

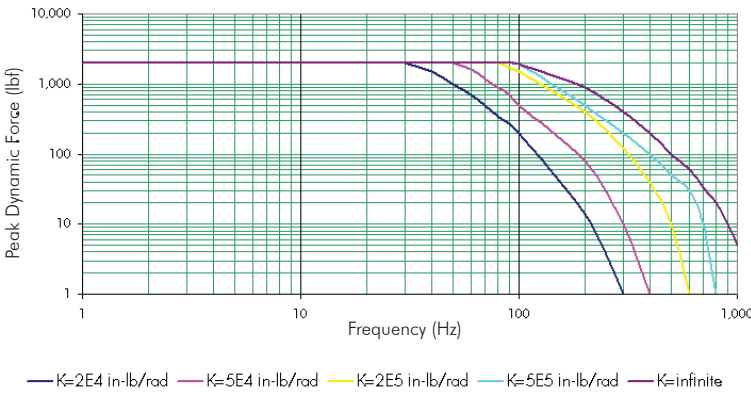


Peak Displacement vs. Frequency

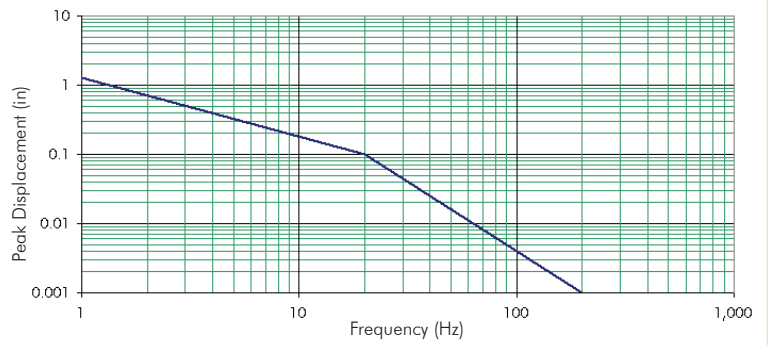


Xcite 1300-2 Laboratory System

Peak Dynamic Force vs. Frequency

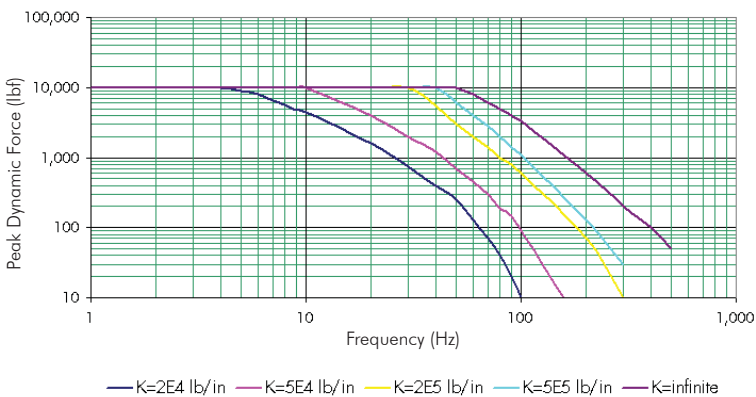


Peak Displacement vs. Frequency



Xcite 1300-3 Laboratory System

Peak Dynamic Force vs. Frequency



Peak Displacement vs. Frequency

