



The VU series linear motion exciters manufactured by Italtvibras have been designed for medium and large size vibrating machines operating in many industrial processes.

The state of the art design and components selected, offer best performance, low operating noise, resulting in a longer lifetime for bearings and gears.

Model VU exciters can be mounted in line (connected through cardan shafts), in order to achieve higher centrifugal forces.

## Technical features

### Functioning

Vu linear motion exciters are composed by a casing (central body) that, by means of 4 bearings supports two shafts, synchronized by two helicoidal ground gears. The eccentric weights are mounted at the end of both shafts, rotating synchronized in opposite sense, determining a resulting unidirectional centrifugal force perpendicular to the mounting surface of the exciter.

### Conformity to European Directives

In the application field of the Machinery Directive 2006/42/EC, the VU linear motion exciters can be considered as "partly completed machinery".

### Static moment

From 3140 to 119525 kgmm. The static moment of eccentric weights can be adjusted by means of the additional weights.

### Centrifugal Force

Up to 453kN.

### Ambient temperature

From -40°C to +70°C.

### Exciter mounting position

VU exciters can be mounted in all positions, always with the shafts in horizontal position.

### Lubrication

Gears and bearings are oil splash / spray lubricated.

### Driving system

The movement is transmitted by an external driving system coupled with the driving shaft by means of a joint, generally a Cardan joint (recommended). The external driving system can be an electric motor, a hydraulic motor or other motor type, directly coupled or by belts and pulleys.

### Casing

In spheroidal cast iron.

### Bearings

Spherical roller bearings, highest quality, rated lifetime in excess of 40000 hours in conditions of maximum load.

### Shafts

In treated steel alloy (Isothermic hardening) resistant to stress.

### Eccentric weights / additional weights

Eccentric weights in steel, additional weights in steel and/or lead.

### Weight covers

All exciters are equipped with two weight covers for protection from rotating parts.

### Painting

Electrostatic surface treatment based on polymerised epoxy polyester powder in oven at +200°C. Tested in salt spray for 500 hours.

Description			Specifications					
Code	Type	Frame	Weights setting	Static moment kgmm	Max RPM	Centrifugal force kN	Weight kg	Motor rating kW
0605033	VU 5000/6-S08	270	Min	3140	1348	63	240	4
			Max	5435	1062	67	265	
0605021	VU 8000/6-S08	280	Min	4130	1470	98	298	5.5
			Max	8065	1100	107	340	
0605020	VU 10000/6-S08	280	Min	4294	1443	98	300	5.5
			Max	9693	1000	107	357	
0605022	VU 14000/6-S08	295	Min	7642	1316	145	430	7.5
			Max	13955	1000	153	490	
0605032	VU 16000/6-S08	295	Min	7963	1293	146	433	11
			Max	15950	956	160	509	
0605023	VU 18000/6-S08	297	Min	8225	1435	186	563	11
			Max	17980	1000	197	649	
0605025	VU 23000/6-S08	297	Min	10410	1410	227	631	15
			Max	22885	1000	252	741	
0605024	VU 27000/8-S08	297	Min	12065	1115	164	629	11
			Max	26635	750	164	758	
0605026	VU 33000/6-S08	310	Min	17650	1220	288	895	18.5
			Max	32583	935	312	1005	
0605028	VU 38000/6-S08	310	Min	20448	1153	298	949	18.5
			Max	37881	882	323	1078	
0605027	VU 42000/8-S08	310	Min	20060	1087	260	949	18.5
			Max	42060	750	260	1116	
0605029	VU 74000/8-S08	320	Min	43580	940	423	1520	30
			Max	73440	750	453	1703	
0605041	VU 103000/6-S08	360	Min	58862	945	576	2232	45
			Max	102955	741	620	2450	
0605042	VU 120000/6-S08	360	Min	65940	900	585	2335	55
			Max	119525	694	632	2600	

Italvibras competence and experience, in the vibration field by over 50 years, are the best guarantee for reliability and safety of the VU series exciters.

The VU linear motion exciters are completely designed, manufactured and tested in Italy.

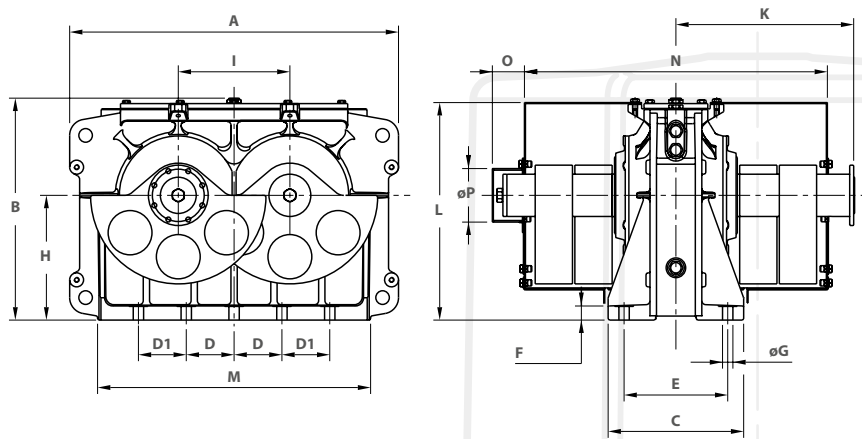


### Other features

- The VU Italvibras exciters are supplied with:
- coupling flange according to DIN standard on the driving shaft (on request a second flange on the opposite side);
  - additional weights, based on the requested weights setting;
  - oil level dipstick, magnetic plugs and breather plug with valve;
  - technical handbook for use and maintenance.

On request Italvibras can supply the complete driving system including joints, shaft extension and electric motor.

**Different mounting bolt patterns are available. Please contact sales office at Italvibras.**



Dimensional features (mm)

Type	A	B	C	D	D1	E	ØG	N°	F	H	I	K	L	M	N	O	ØP
VU 5000/6-S08	655	410	250	1x190	2x110	165	22	8xM20	25	225	210	320.5	407.5	545	530	69.5	97
VU 8000/6-S08	700	453.5	260	1x190	2x110	165	22	8xM20	30	240	232	330.5	442.5	575	555	69.5	97
VU 10000/6-S08	700	453.5	260	1x190	2x110	165	22	8xM20	30	240	232	331.5	442.5	575	555	69.5	97
VU 14000/6-S08	760	508.5	270	1x220	2x110	190	26	8xM24	30	280	256	389	497.5	640	670	69.5	107
VU 16000/6-S08	760	508.5	270	1x220	2x110	190	26	8xM24	30	280	256	389	497.5	640	670	69.5	107
VU 18000/6-S08	825	551.5	340	4x120	-	260	26	10xM24	35	310	280	407	540.5	685	685	80.5	133
VU 23000/6-S08	825	551.5	340	4x120	-	260	26	10xM24	35	310	280	446	540.5	685	760	80.5	133
VU 27000/8-S08	825	551.5	340	4x120	-	260	26	10xM24	35	310	280	476	540.5	685	820	80.5	133
VU 33000/6-S08	925	629	380	5x120	-	300	32	12xM30	35	350	320	476.5	618	770	815	83	143
VU 38000/6-S08	925	629	380	5x120	-	300	32	12xM30	35	350	320	510.5	618	770	885	83	143
VU 42000/8-S08	925	629	380	5x120	-	300	32	12xM30	35	350	320	524.5	618	770	915	83	143
VU 74000/8-S08	1070	708	470	4x120	2x150	390	32	14xM30	35	390	370	592	698.5	920	1045	85	161
VU 103000/6-S08	1280	830	500	1x280	4x160	410	39	12xM36	45	460	440	629.5	821	1135	1075	115.5	200
VU 120000/6-S08	1280	830	500	1x280	4x160	410	39	12xM36	45	460	440	661.5	821	1135	1140	115.5	200