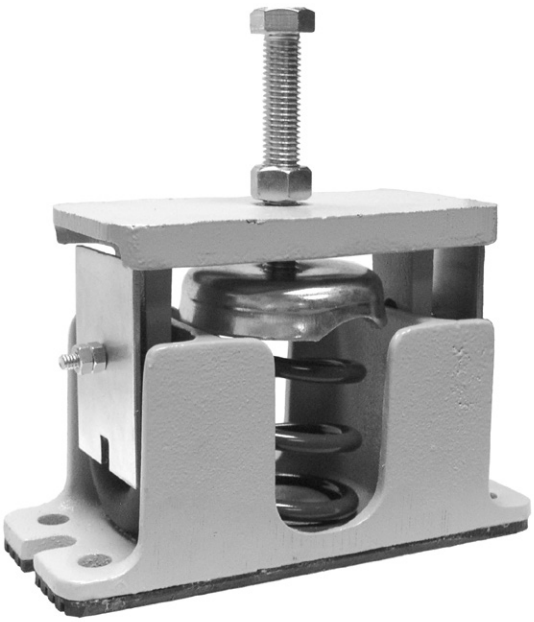
KINETICS™

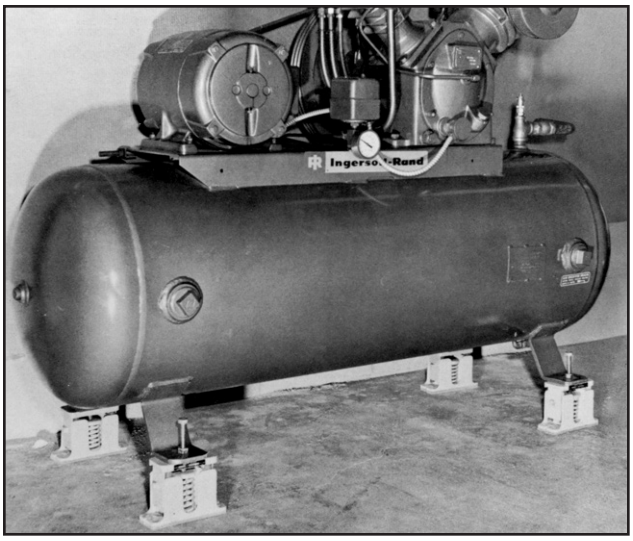
Housed Spring Isolators

Model SM

Description

Model SM spring vibration isolators consist of high deflection, color-coded stabile springs assembled into telescoping cast iron or aluminum housings which are complete with a 1/4" (6 mm) thick ribbed noise isolation pad bonded to the lower load surface, and with an adjusting and leveling bolt as a part of the top assembly. Holes or slots are provided in all isolators for bolting to the structure. Model SM spring isolators are designed with an adjustable snubbing feature to reduce movement during start-up and shut-down. Model SM spring isolators are available in deflections up to 1.79" (46 mm) and with load capacities from 50 to 3500 lbs. (23 to 1588 kg). Springs are polyester powder coated, with a 1000 hour salt spray rating per ASTM B-117. Model SM spring isolators are typically used to isolate vibration produced by mechanical, industrial, or process machinery where more damping is required and less motion can be tolerated than with free-standing spring isolators. Internal leveling can be provided as an option, as can molded fiberglass noise pads.





Application

Model SM housed spring isolators are used to isolate high and low frequency vibration, and to allow adjustable damping of vertical motion, generated by floor-mounted mechanical equipment and industrial machinery located in critical or non-critical areas.

Model SM mounts are typically used to isolate and reduce vertical motion of mechanical and industrial equipment, having lowest operating speeds of 1200 RPM or higher, located on grade-supported slabs or short structural floor spans, when the isolator-to-equipment connection is such that a leveling bolt can extend above the isolator and act as a leveling and attachment bolt for supported equipment.

Model SM isolators are available with internal leveling, if the connection to supported equipment must be by a flat plate. Isolators should be specified model SMI.

Model SM isolators are available as model SMP and are used as above except that connections to equipment require a centering pin and level adjustment must be internal to the mount to allow access to adjustment bolts.

Isolator Type	Spring Color	Rated Capacity		Rated Deflection		W		L		H		D		F		G	
		lbs.	kg	in.	mm	in.	mm	in.	mm	in.	mm	in.	mm	in.	mm	in.	mm
SM-50C	Beige	50	23	1.00	25	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11
SM-100C	Chrome	100	45	1.00	25	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11
SM-250C	Blue	250	113	1.79	45	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11
SM-450C	Green	450	204	1.54	39	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11
SM-625C	Black	625	283	1.44	37	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11
SM-800C	Gray	800	363	1.31	33	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11
SM-1000C	Red	1000	454	1.15	29	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11
SM-1250C	Brown	1250	567	1.09	28	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11
SM-1700C	Orange	1700	771	0.95	24	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11
SM-2200C	Org/Gray	2200	998	1.00	26	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11
SM-2465C	Blue	2465	1118	1.00	25	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11
SM-2865C	Blu/Gray	2865	1300	1.00	25	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11
SM-3500C	Blu/Brn	3500	1588	1.00	25	3.50	89	9.00	229	5.00	127	0.63	16	7.50	191	0.44	11

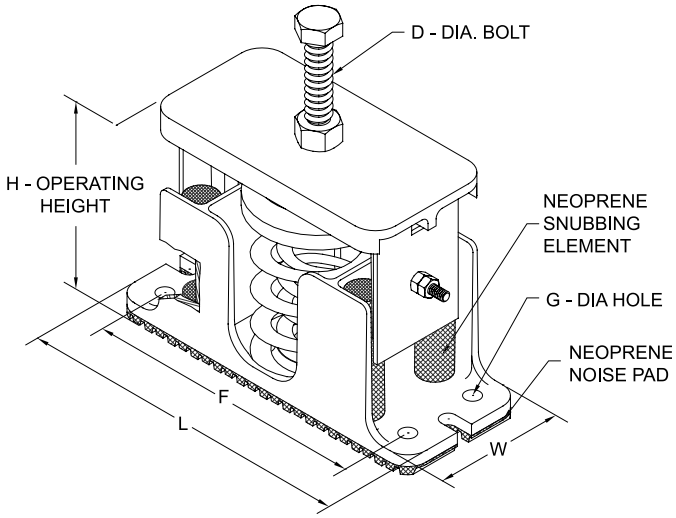
Specifications

Vibration isolators shall be housed springs, and shall consist of a steel spring and load cap housed in a cast semi-steel or aluminum assembly, with adjustable side plate and sponge neoprene snubbers designed to stabilize the isolators and prevent metal-to-metal connection of top and bottom housing sections. The top housing section shall be drilled and tapped and shall include a steel load transfer plate and leveling bolt, and locknut. The bottom housing section shall be bonded to a 1/4" (6 mm) thick ribbed neoprene noise isolation pad and shall be drilled to allow bolting to the supporting structure.

Spring elements shall have a lateral stiffness greater than 1.0 times the rated vertical stiffness and shall be designed to provide a minimum of 50% overload capacity.

Springs shall be selected to provide operating static deflections shown on the vibration isolation schedule or as indicated on the project documents. Springs shall be color coded or otherwise identified to indicate load capacity.

Vibration isolators shall be model SM, as manufactured by Kinetics Noise Control, Inc.



KINETICS Noise Control

kineticsnoise.com/hvac/fls.html
sales@kineticsnoise.com
1-800-959-1229

Manufacturing facilities in Ohio, USA; California, USA; and Ontario, Canada. Sales offices worldwide.

Kinetics Noise Control, Inc. is continually upgrading the quality of our products.
We reserve the right to make changes to this and all products without notice.