

SC25-HC to SC650-HC

Miniature self compensating shocks for high-speed applications

Self-Compensating

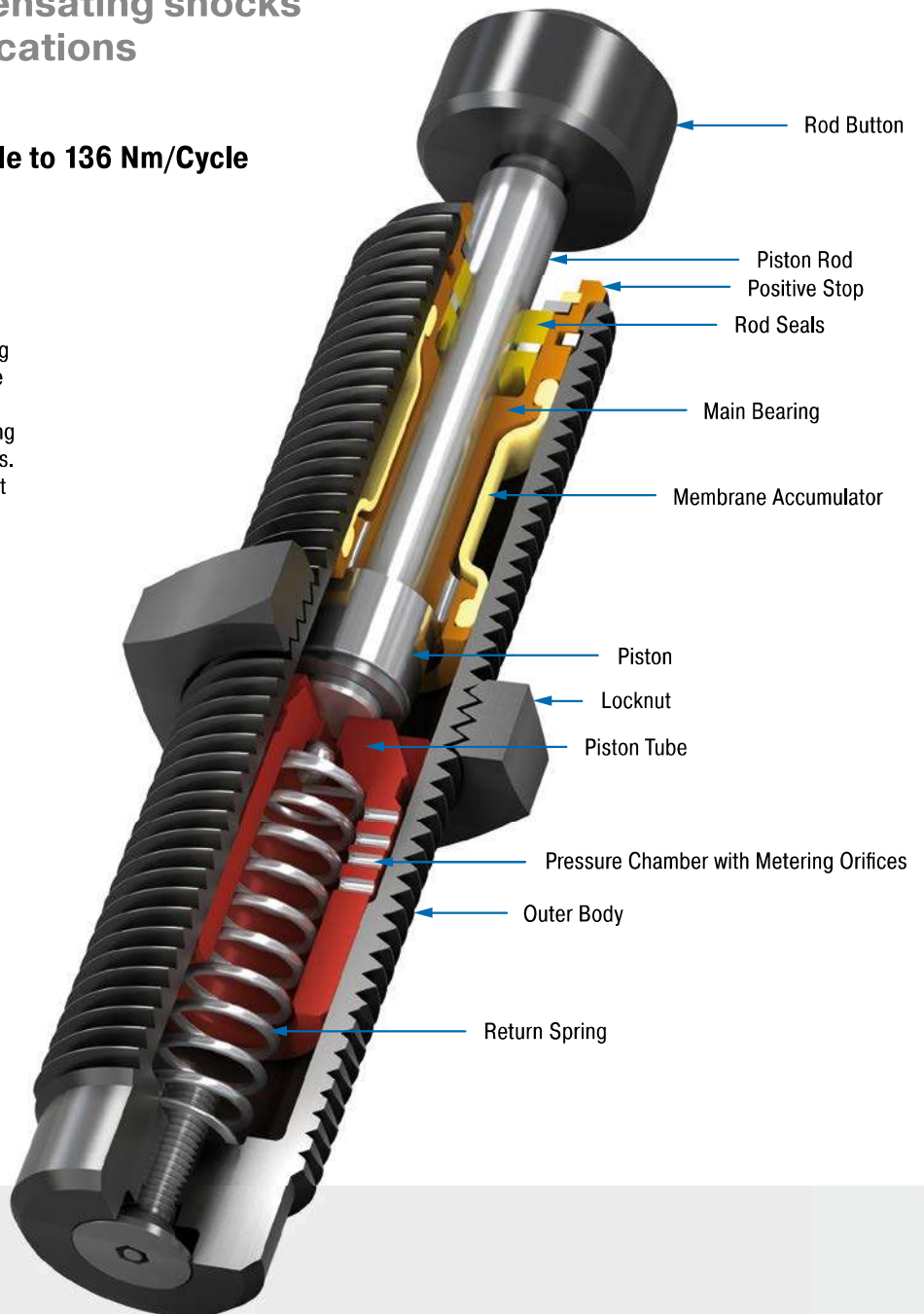
Energy capacity 2.25 Nm/Cycle to 136 Nm/Cycle

Stroke 4 mm to 15 mm

ACE Controls SC25-HC to SC650-HC High-Cycle shock absorbers are engineered for high-speed equipment applications. These rugged performers are ideal for the packaging industry. They offer a short stroke, quick time through stroke and quick rod-ready time. In addition, these dependable self-compensating miniatures are capable of rapid repeat strokes. The result is faster cycling for your equipment and gains in production time for you.

Self-compensating shock absorbers react to changing energy conditions, without adjustment.

These miniature, self-compensating shock absorbers provide high-speed performance and reliability in a compact footprint. Applications include: Packaging equipment, slides, rotary actuators, small and medium robotics, machine tools, pick and place operations and more.



Technical Data

Energy capacity: 2.25 Nm/Cycle to 136 Nm/Cycle

Impact velocity range: 0.03 m/s to 4.5 m/s.

Operating temperature range: 0 °C to 66 °C

Mounting: In any position

Positive stop: Integrated

Material: Outer body: Steel corrosion-resistant coating; Main bearing: Brass; Piston rod: Steel hardened; Locknut, Accessories: Steel; Rolling diaphragm: Rubber (EPDM); Stretch diaphragm: Rubber (nitrile)

Damping medium: SF 96-500 and others

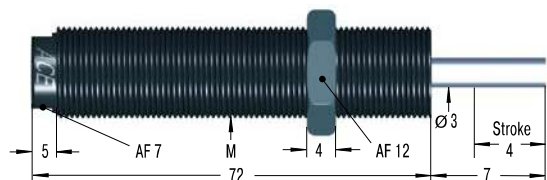
Application field: Linear slides, Tool machines, Handling modules, Production plants

Note: If precise end position is required, consider use of the optional stop collar.

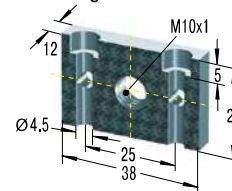
Safety information: External materials in the surrounding area can attack the accumulator and lead to a shorter service life. Please contact ACE for appropriate solution suggestions. Suitable for use in pressure chambers up to 102 psi.

On request: Food grade oils, special threads available on request.

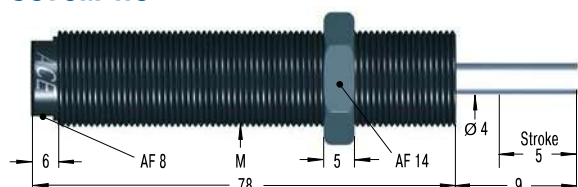
SC25M-HC



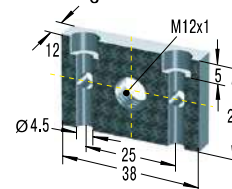
250-0307 Mounting Block



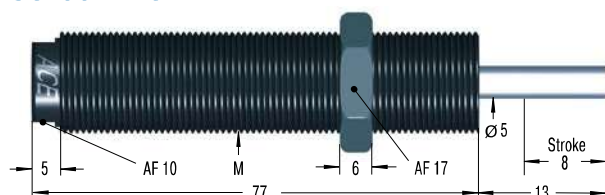
SC75M-HC



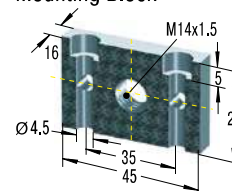
250-0309 Mounting Block



SC190M-HC

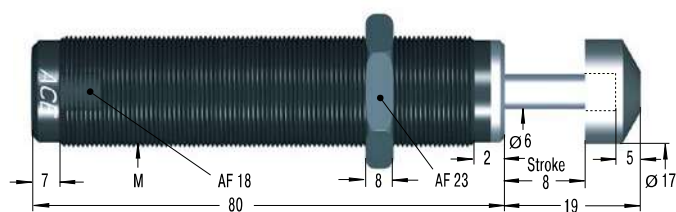


250-0352 Mounting Block

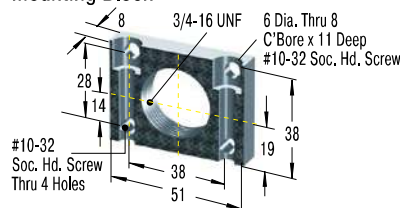


M14x1 also available to special order

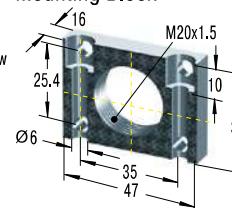
SC300-HC



250-0401 Mounting Block

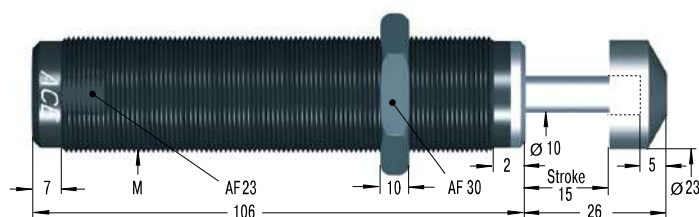


250-0353 Mounting Block

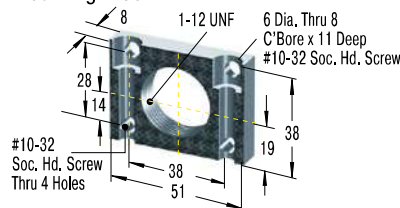


Product available for UNF and metric thread (for metric add suffix -M from part number)

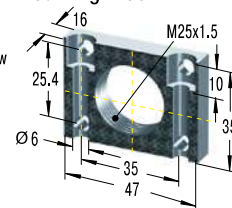
SC650-HC



250-0402 Mounting Block



250-0044 Mounting Block



Product available for UNF and metric thread (for metric add suffix -M from part number)

Additional accessories, mounting, installation ... starting on page 40.

Performance

TYPES	Max. Energy Capacity		Effective Weight		Return Force min.	Return Force max.	Return Time	Side Load Angle max.	M	Weight kg
	E ₃ Nm/cycle	Energy capacity Nm/h	We min. kg	We max. kg						
SC25M-5-HC	2.25	16,000	1	5	9	14	0.3	2	M10x1	0.030
SC25M-6-HC	2.25	16,000	4	44	9	14	0.3	2	M10x1	0.030
SC25M-7-HC	2.25	16,000	42	500	9	14	0.3	2	M10x1	0.030
SC75M-5-HC	8.5	30,000	1	8	8.5	15	0.3	2	M12x1	0.045
SC75M-6-HC	8.5	30,000	7	124	8.5	15	0.3	2	M12x1	0.045
SC75M-7-HC	8.5	30,000	75	800	8.5	15	0.3	2	M12x1	0.045
SC190M-5-HC	20	50,000	2	16	12	25	0.4	2	M14x1.5	0.059
SC190M-6-HC	20	50,000	13	140	12	25	0.4	2	M14x1.5	0.059
SC190M-7-HC	20	50,000	136	1,540	12	25	0.4	2	M14x1.5	0.059
SC300-5-HC	73	45,000	11	45	12	17	0.2	5	3/4-16 UNF / M20x1.5	0.164
SC300-6-HC	73	45,000	34	136	12	17	0.2	5	3/4-16 UNF / M20x1.5	0.164
SC300-7-HC	73	45,000	91	181	12	17	0.2	5	3/4-16 UNF / M20x1.5	0.164
SC300-8-HC	73	45,000	135	680	12	17	0.2	5	3/4-16 UNF / M20x1.5	0.164
SC300-9-HC	73	45,000	318	885	12	17	0.2	5	3/4-16 UNF / M20x1.5	0.164
SC650-5-HC	136	68,000	23	113	22	37	0.3	5	1-12 UNF / M25x1.5	0.315
SC650-6-HC	136	68,000	91	363	22	37	0.3	5	1-12 UNF / M25x1.5	0.315
SC650-7-HC	136	68,000	318	1,090	22	37	0.3	5	1-12 UNF / M25x1.5	0.315
SC650-8-HC	136	68,000	770	2,630	22	37	0.3	5	1-12 UNF / M25x1.5	0.315