

LINEAR ACTUATORS | LAL SERIES

SMAC's original series of linear actuators with stroke up to 150mm and a peak force of up to 500N. As with all SMAC actuators, the LAL has independent control of position, speed, and force.



- ✓ Soft-Land™ capability and precise force control
- ✓ High cycle
- ✓ Data feedback

Part Number	Voltage [DC]	Size: LxWxH [mm]	Stroke [mm]	Peak Force [N]	Continuous Force [N]	Force Constant [N/A]	Maximum Current [Amp]	Moving Mass [kg]	Weight [kg]
LAL35-025-55-2	24	135x90x35	25	31.5	12.6	15.5	2.9	0.19	1.06
LAL35-025-75-1	48	135x90x35	25	18	7	10	1.3	0.12	0.95
LAL35-050-55-1	24	135x90x35	50	10	4	7	1.6	0.13	1.1
LAL35-050-75-1	48	135x90x35	50	12.5	5	10	1.3	0.13	1.1
LAL35-100-55-1	24	135x90x35	100	6	2.4	3.5	1.6	0.1	1.7
LAL55-050-55-1	24	250x110x55	50	25	10	19	1.3	0.3	3
LAL55-050-75-1	48	250x110x55	50	40	16	24.5	1.8	0.3	3
LAL55-100-55-1	24	250x110x55	100	16	6.4	13	1.3	0.3	3.8
LAL55-100-75-1	48	250x110x55	100	25	10	17	1.8	0.3	3.8
LAL55-150-55-1	24	250x110x55	150	13	5	10	1.3	0.4	4.5
LAL55-150-75-1	48	250x110x55	150	19.5	8	12.5	1.8	0.4	4.5
LAL95-015-75-1	48	90x70x95	15	84	33	53	1.7	0.25	2.2
LAL95-015-75-2	48	147x70x95	15	185	74	58	3.2	0.5	3
LAL95-025-75-2	48	180x70x95	25	162	65	52	3.1	0.58	3.75
LAL95-050-75-1	48	147x70x95	50	65	26	41	1.7	0.25	3
LAL300-030-75-1	48	120x85x120	30	115	46	76	1.6	0.45	4.8
LAL300-030-75-2	48	210x85x120	30	250	100	87.3	3	0.8	7.8
LAL300-050-75-2	48	210x85x120	50	202	80	86	3	0.8	8.8
LAL300-100-75-1	48	210x85x120	100	80	32	43	2	0.7	7.9
LAL500-025-75-2	48	300x140x200	25	500	200	166	3	1.6	26.5
LAL500-050-75-2	48	300x140x200	50	500	200	100	4	1.6	26.5

NOTE: For any SMAC Moving Coil Actuators, the maximum recommended continuous duty current is 600mA supplied to the actuator over a 1 second period. For anything beyond this in terms of current draw or time please consult the factory. We manufacture actuators to suit our customers' requirements. Please call us if you do not find the right actuator in this list. Linear actuators are also available as linear slides (see page 21)



LAL35



LAL55



LAL95



LAL300



LAL500

Options & Modifications (Consult factory for availability)

- Linear encoder resolutions ----- 5µm standard. 1µm and 0.1µm optional for most units. Consult factory for availability.
- Shaft ends ----- Male, Female, Blank and Custom (check availability of custom option).
- Return spring ----- Prevents the shaft from dropping during vertical operation when power is cut.
- Vacuum ----- Vacuum through the shaft or on the shaft for pick and place applications.
- Extended nose bushing ----- For tighter shaft run-out and higher side load onto the shaft.
- Increase of force & acceleration ----- 48 volt coil and double coil options are available for some units with 24 volt single coil.
- Increase of force accuracy/lifetime ----- Low-friction linear guide/extra-long preload linear guide.
- Dust/Waterproof ----- IP65/67 protection is available with LAL95 series.