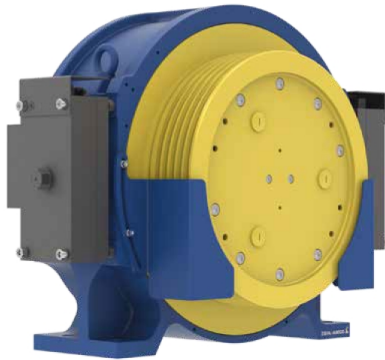


# ZAsyn2 Gearless elevator machine

## SM500



Synchronous motor actuated by permanent magnets and according to the provisions of the Lift Directive 2014/33/EU

### Drive

- NdFeB magnets
- Perfect for mounting in tight spaces
- Noise emissions: < 50 dB(A)
- Insulation class F with temperature monitoring

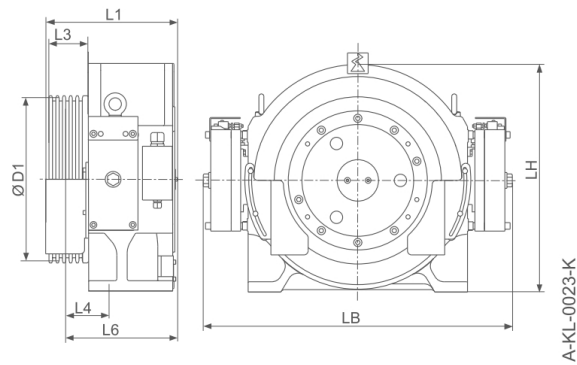
### Brake system

- Safety component according to the Lift Directive 2014/33/EU
- Separately activated brake circuits
- Deployable as an element of the ascending car overspeed protection means
- Deployable as part of the protection against unintended car movement

Motor cables	Page 108
Deflection pulleys	Page 68
ZAlift	Page 73

## Technical data

### SM500



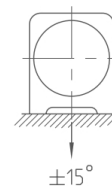
Motor type	Nominal torque Nm	Max. axle load kg	Nominal speed rpm	Rated output power kW	L1 mm	LH mm	L4 mm	L6 mm	LB mm	D1 mm	L3 mm	Weight kg
SM500.12AL-B	510	3000	48 - 167	2.6 - 8.9	318	550	84	265	747	400	90	315
SM500.16AL-B	640			3.2 - 11.0								



## Scope of delivery and options

SM500	Standard	Options
Motor	Gearless elevator machine	-
Traction sheave	See D1	-
Brake	Certified brake system with mechanical hand release	-
Brake monitoring	Microswitch	-
Motor cable	-	10 m
Absolute encoder	EnDat	-
Rope guard	2 pieces	-
Temperature monitoring	Thermal switch	-
Cooling	Surface cooling	-

## Resulting rope force



## Example configurations

Other configurations, also outside of the examples listed below, are possible.

Our calculation software ZAlift is available to you for fast and convenient calculation of your elevator machine.

Suspension	Payload	Speed	Traction sheave	Motor type	Number of ropes	Rope diameter	Motor power	Rated current
	kg	m/s	mm			mm	kW	A
1:1	450	1.0	400	SM500.12AL-B	3	10.0	2.6	7.0
	600	1.6		SM500.16AL-B	5	8.0	6.4	15.0
2:1	800	1.6		SM500.12AL-B	4		8.9	20.5
	1125	1.6		SM500.16AL-B	5		11.0	26.0

Information

ZAtop

ZAtopx

ZAsyn

ZAdisc

ZAtop AM

System components  
motorsControl  
technologySystem components  
control  
technology

Appendix