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NAFSA - ER SERIES

ER21/C
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- Single acting, spring or load return
- Up to class F winding (155°C)
- Duty cycle from 0 to 100%
- Up to 234N force
- Customer specific version available

PRODUCT DESCRIPTION

The ER series of electromagnets are a single acting solenoid.

When an electrical connection is made to to coil, the plunger moves through the magnetic field and pushes the shaft along its designated stroke.

Upon removing the electrical connection, the shaft is retracted to its rest position using either a mechanical spring or the load applied.

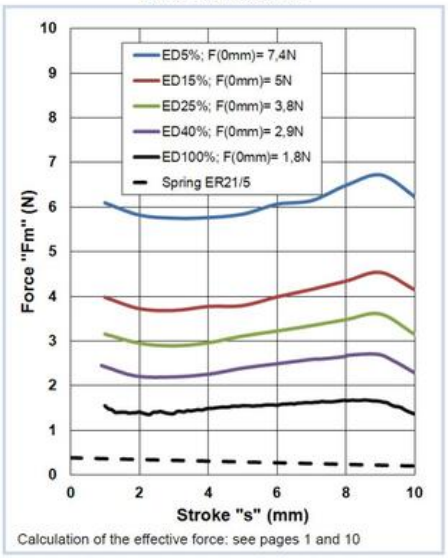
Many different standard versions are available (please see catalogue PDF below) and application specific designs can be provided for larger volume requirements.

TECHNICAL DATA

Absorbed power @ 20°C, 100% duty	6 W
Absorbed power @ 20°C, 15% duty	35 W
Absorbed power @ 20°C, 25% duty	24 W
Absorbed power @ 20°C, 40% duty	14 W
Absorbed power @ 20°C, 5% duty	100 W
Beginning of stroke force at 100% duty	13 N
Beginning of stroke force at 15% duty	41 N
Beginning of stroke force at 25% duty	31 N
Beginning of stroke force at 40% duty	23 N
Beginning of stroke force at 5% duty	62 N
End of stroke force at 100% duty	18 N
End of stroke force at 15% duty	5 N
End of stroke force at 25% duty	38 N
End of stroke force at 40% duty	29 N
End of stroke force at 5% duty	74 N

Function	pull/push
Insulation class	B (130°C)
IP class	IP00
Spring return	Yes
Stroke	10 mm
Total weight	62 g
Voltage ac max	230 V
Voltage ac min	110 V
Voltage dc max	205 V
Voltage dc min	6 V

Force stroke curve



Calculation of the effective force: see pages 1 and 10

Duty-cycle ED%	Standard voltages									Under demand voltages			
	VDC							VAC		VDC		VAC	
	6	12	24	48	100	125	205	110	230	Min	Max	Min	Max
100%	o	o	o	o	o	x	x	x	x	3	110	x	x
40%	o	o	o	o	o	o	x	x	x	4	165	x	x
25%	o	o	o	o	o	o	o	x	x	5	220	x	x
15%	o	o	o	o	o	o	o	x	x	6	230	x	x
5%	x	o	o	o	o	o	o	x	x	9	230	x	x

Layout: o = Available ; x = Unavailable

Solenoid under voltage

