



Product designation				Power contactor
Product type designation				B1600
Contact characteristics				
Number of poles	Nr.			4
Rated insulation voltage U_i IEC/EN	V			690
Rated impulse withstand voltage U_{imp}	kV			8
Operational frequency	min	Hz	25	
	max	Hz	400	
IEC Conventional free air thermal current I_{th}	A			1600
Operational current I_e	AC-1 ($\leq 40^\circ\text{C}$)	A	1600	
	AC-1 ($\leq 55^\circ\text{C}$)	A	1360	
	AC-1 ($\leq 70^\circ\text{C}$)	A	1120	
Rated operational power AC-1 ($T \leq 40^\circ\text{C}$)	230V	kW	550	
	400V	kW	950	
	500V	kW	1200	
	690V	kW	1650	
Short-time allowable current for 10s (IEC/EN60947-1)	A			8300
Protection fuse	gG (IEC)	A	1600	
		A	6300	
Making capacity (RMS value)				6300
Breaking capacity at voltage	440V	A	6300	
	500V	A	5600	
	690V	A	5000	
Resistance per pole (average value)	m Ω			7
Power dissipation per pole (average value)	I_{th}	W	180	
Tightening torque for terminals	min	Nm	35	
	max	Nm	35	
	min	lbin	25.8	
	max	lbin	25.8	
Max number of wires simultaneously connectable	Nr.			2
Power terminal protection according to IEC/EN 60529				IP00
Mechanical features				
Operating position	normal			Vertical plan
	allowable			$\pm 30^\circ$
Fixing				Screw
Weight	g			5890
Auxiliary contact characteristics				
Thermal current I_{th}	A			16

IEC/EN 60947-5-1 designation	A600 - P600		
Operating current AC15	230V	A	3
	400V	A	1.9
	500V	A	1.4
Operating current DC12	110V	A	5.7
	Operating current DC13		
Operating current DC13	24V	A	5.7
	48V	A	2.9
	60V	A	2.3
	125V	A	0.6
	220V	A	0.2
	600V	A	1.2

Operations

Mechanical life cycles 5000000

Electrical life cycles 700000

Safety related data

Performance level B10d according to EN/ISO 13489-1

rated load	cycles	700000
mechanical load	cycles	5000000

Mirror contacts according to IEC/EN 60947-4-1 yes

EMC compatibility yes

AC coil operating

Rated AC voltage at 50/60Hz, 60Hz

min	V	110
max	V	125

AC operating voltage

of 50/60Hz coil powered at 50Hz
pick-up

min	%Us	80
max	%Us	110

drop-out

min	%Us	20
max	%Us	60

of 50/60Hz coil powered at 60Hz
pick-up

min	%Us	80
max	%Us	110

drop-out

min	%Us	20
max	%Us	60

of 60Hz coil powered at 60Hz
pick-up

min	%Us	80
max	%Us	110

drop-out

min	%Us	20
max	%Us	60

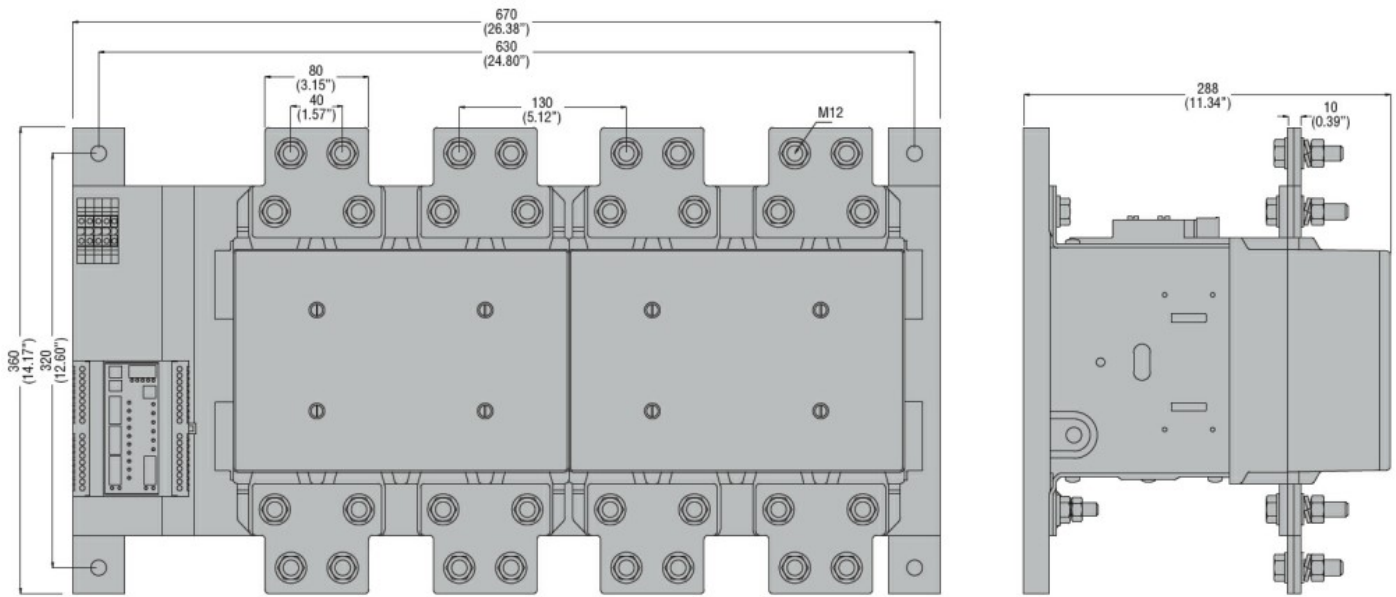
AC average coil consumption at 20°C

of 50/60Hz coil powered at 50Hz

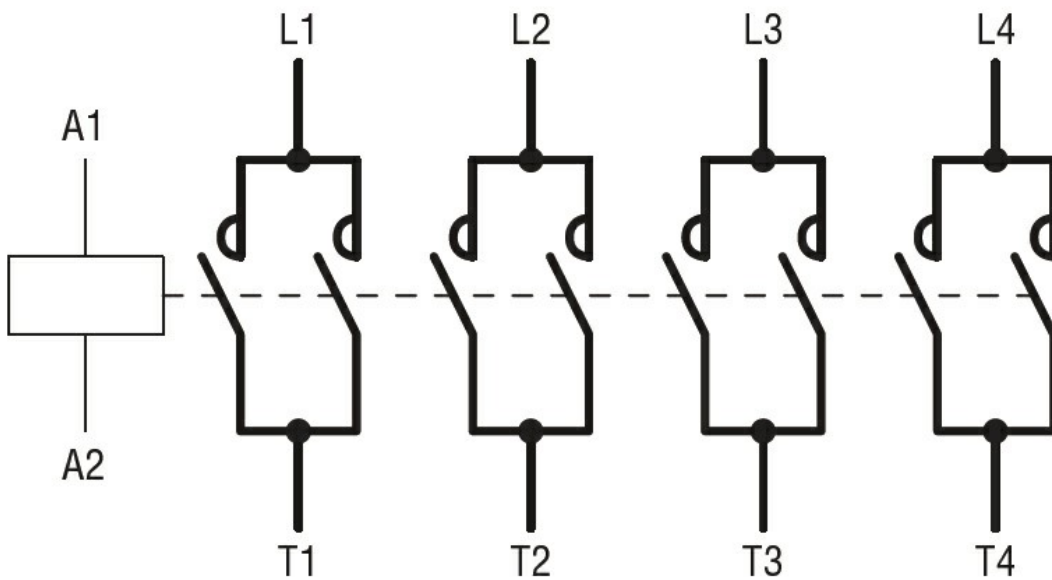
in-rush	VA	800
holding	VA	45

of 50/60Hz coil powered at 60Hz

		in-rush	VA	800	
		holding	VA	45	
Dissipation at holding ≤20°C 50Hz				W	40
DC coil operating					
DC rated control voltage					
		min	V	110	
		max	V	125	
DC operating voltage					
	pick-up				
		min	%Us	80	
Max cycles frequency					
Mechanical operation				cycles/h	1200
Operating times					
Average time for Us control					
	in AC				
		Closing NO			
		min	ms	300	
		max	ms	450	
		Opening NO			
		min	ms	70	
		max	ms	130	
	in DC				
		Closing NO			
		min	ms	300	
		max	ms	450	
		Opening NO			
		min	ms	70	
		max	ms	130	
UL technical data					
Contact rating of auxiliary contacts according to UL				A600 - P600	
Ambient conditions					
Temperature					
	Operating temperature				
		min	°C	-50	
		max	°C	60	
	Storage temperature				
		min	°C	-60	
		max	°C	80	
Max altitude				m	3000
Resistance & Protection					
Pollution degree				3	
Dimensions					



Wiring diagrams



Certifications and compliance

Compliance

CSA C22.2 n° 60947-1
CSA C22.2 n° 60947-4-1
IEC/EN 60947-1
IEC/EN 60947-4-1
UL 60947-1
UL 60947-4-1

Certificates

/

ETIM classification

ETIM 8.0

EC000066 -
Power contactor,
AC switching